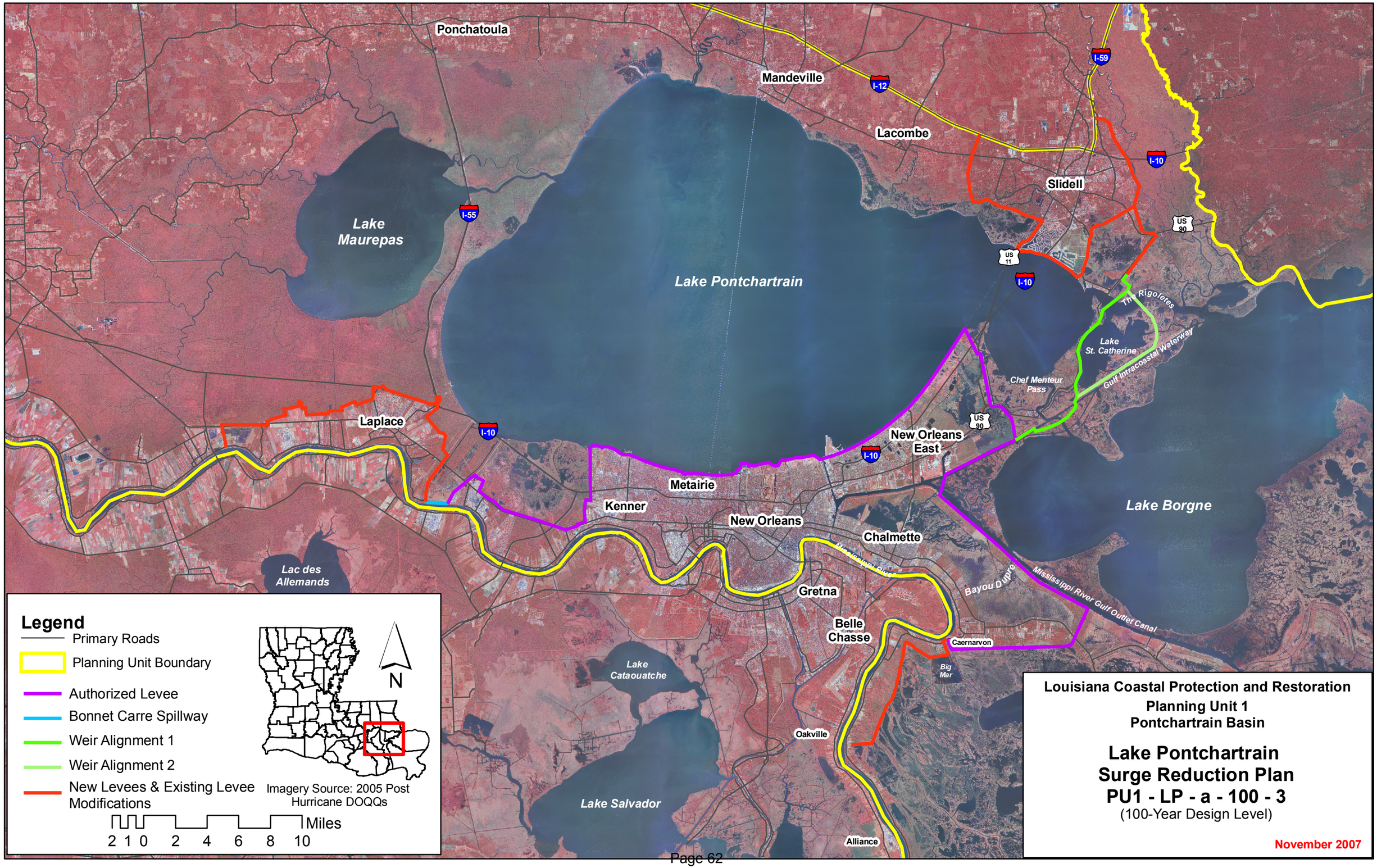
Planning Unit:	1	Alt. No.	PU1-LP-a-100-3	Category	Coastal Restoration + Structural Measures
Alternative Description:	Sustain coastal landscape through restoration and construct barrier-weir and levees to reduce risk to the Lake Pontchartrain area. Raise upper Plaquemines levees and construct new levees around Laplace and Slidell to the 100-year level of risk reduction.				
Coastal Component:	R2 (pulsed diversions)			Nonstructural Component:	None
Structural Component:	See alternative description.				

		Metric Results by Scenario with Uncertainty Bands								
		Life-cycle Cost	Resident Population Impacted	Residual Damages	Gross Regional Output Impacted	Employment Impacted	People's Earned Income Impacted	Archeo. Sites Protected	Historic Properties Protected	Historic Districts Protected
		$ Billions	Ann. Equiv. #	Ann. Equiv ($ 1000's)	Ann. Equiv ($ 1000's)	Ann. Equiv #	Ann. Equiv ($ 1000's)	# Sites	# Properties	# Districts
Scenario 1	Low		50,996	1,133,788	918,836	4,083	249,231	241	127	43
	Mean	30.23	54,018	1,375,920	1,160,067	4,992	310,444	271	133	50
	High		58,747	1,847,725	1,665,446	6,914	440,914	301	143	51
Scenario 2	Low		51,467	1,167,510	964,563	4,223	262,101	241	123	40
	Mean	30.65	54,852	1,427,414	1,231,187	5,181	328,454	271	128	45
	High		59,692	1,954,677	1,951,740	7,606	505,594	301	137	51
Scenario 3	Low		42,624	1,051,555	588,086	3,112	178,071	241	127	43
	Mean	30.23	45,600	1,281,533	803,409	3,978	234,833	271	133	50
	High		49,865	1,723,093	1,263,685	5,831	355,979	301	143	51
Scenario 4	Low		42,903	1,082,296	627,855	3,223	188,659	241	123	40
	Mean	30.65	46,141	1,326,453	860,409	4,134	249,857	271	128	45
	High		50,486	1,824,758	1,502,011	6,351	405,743	301	137	51

Other Metric Results							
Construction Time (years)	14	Wetlands Created/ Protected (acres)	Scen 1&3	Scen 2&4	PV Cost of NS Comp ($ Billions)	Scen 1&2	Scen 3&4
Direct Wetland Impacts (acres)	-3,668		214,687	220,284		N/A	N/A
Indirect Impacts	-8	PV Cost of Coastal Component ($ Billions)	10.67	10.90			
Spatial Integrity	0.478						
		PV Cost of Structural Component ($ Billions)	19.56	19.75			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Gretna
Belle Chasse
Caernarvon
Oakville
Alliance
Lake Borgne
Lake St. Catherine
Chef Menteur Pass
The Rigolets
Gulf Intracoastal Waterway
Mississippi River
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Mississippi River Gulf Outlet Canal
Lac des Allemands
Lake Cataouatche
Lake Salvador
Big Mar
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Authorized Levee
Bonnet Carre Spillway
Weir Alignment 1
Weir Alignment 2
New Levees & Existing Levee Modifications
N
Imagery Source: 2005 Post Hurricane DOQQs
Miles
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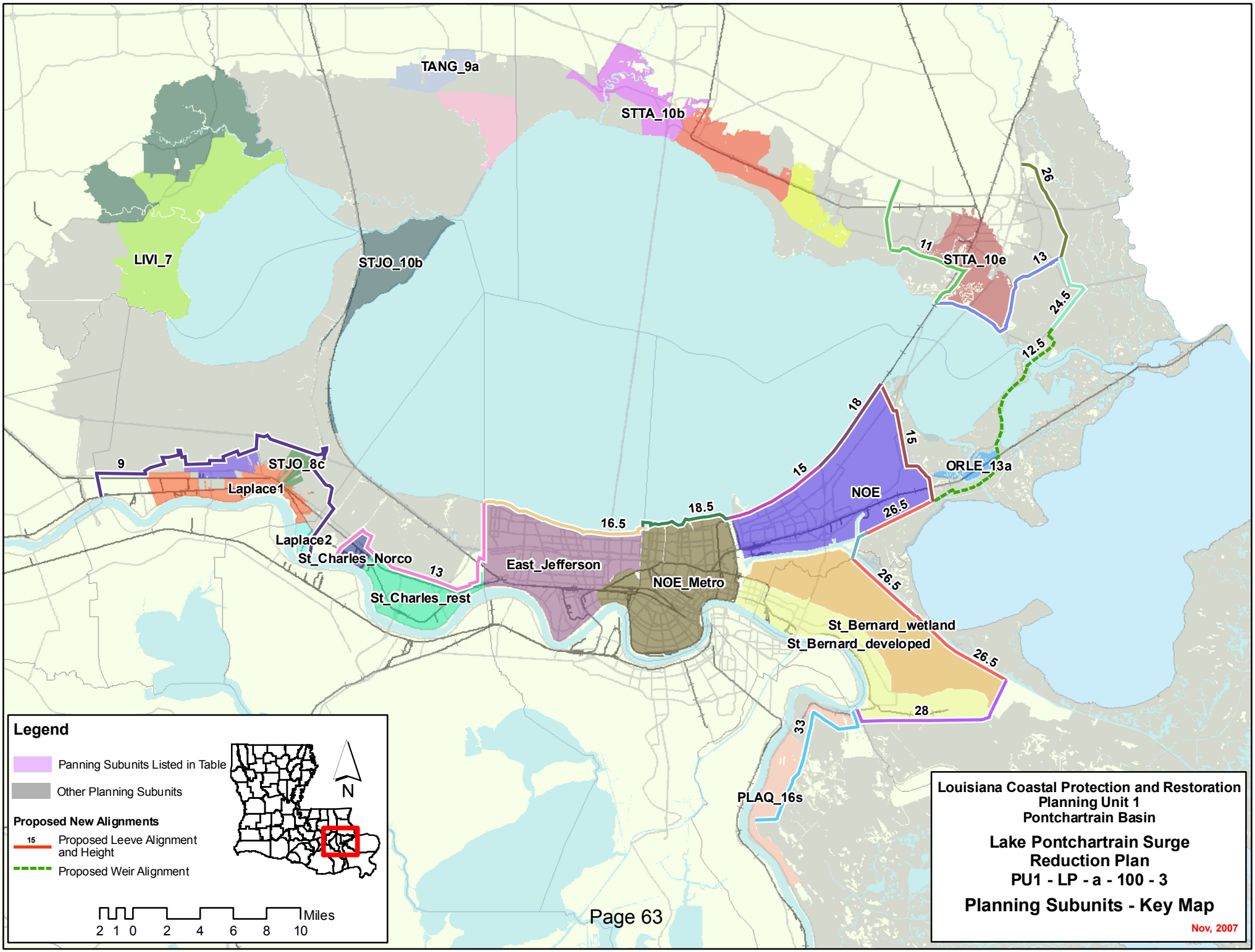
Louisiana Coastal Protection and Restoration
Planning Unit 1
Pontchartrain Basin
Lake Pontchartrain
Surge Reduction Plan
PU1 - LP - a - 100 - 3
(100-Year Design Level)
November 2007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East_Jefferson
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St_Charles_rest
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Proposed Leeve Alignment and Height
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Louisiana Coastal Protection and Restoration
Planning Unit 1
Pontchartrain Basin
Lake Pontchartrain Surge Reduction Plan
PU1 - LP - a - 100 - 3
Planning Subunits - Key Map
Nov, 2007

Alternative: PU1-LP-a-100-3
Water Surface Elevations (feet - NAVD88 2004.65)

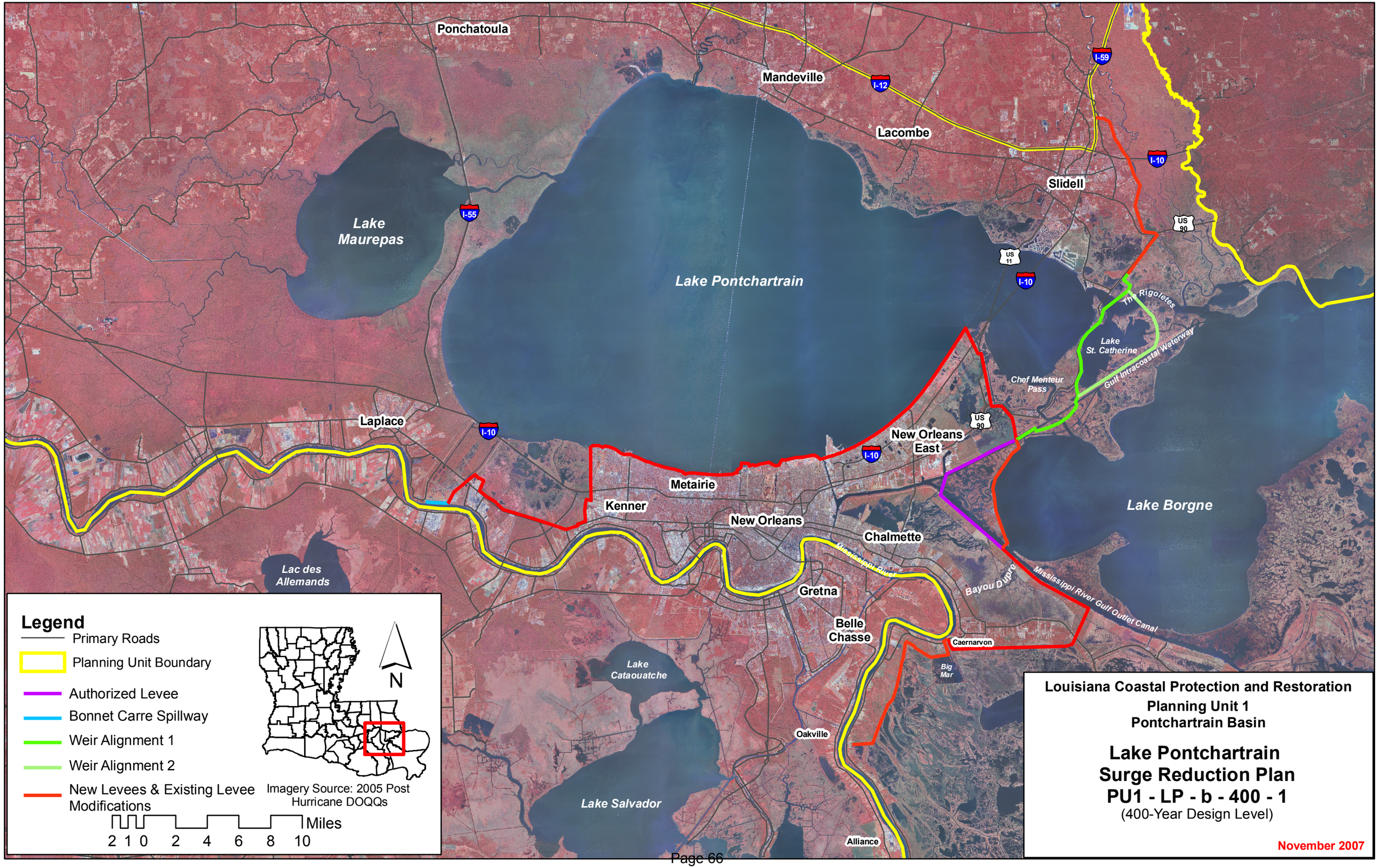
Planning Sub Unit	2010 (Base) Conditions						2060 (Future) Conditions					
	100-yr Event		400-year Event		1,000-yr Event		100-yr Event		400-year Event		1,000-yr Event	
	Without Project	With Project	Without Project	With Project	Without Project	With Project	Without Project	With Project	Without Project	With Project	Without Project	With Project
East_Jefferson	-5.1	-5.2	-1.3	-0.8	4.4	5.7	-2.6	-5.2	16.0	-0.8	16.0	5.7
Laplace1	9.4	4.6	12.2	9.0	14.0	10.9	12.0	4.6	14.8	9.0	16.6	10.9
Laplace2	8.5	4.6	11.0	9.0	12.8	10.9	11.1	4.6	13.6	9.0	15.4	10.9
LIVI_6	7.3	3.8	9.7	5.2	11.1	6.1	11.2	6.4	13.7	7.8	15.2	8.7
LIVI_7	7.5	5.5	9.7	6.9	10.9	7.8	10.1	8.1	12.3	9.5	13.5	10.4
NOE	-5.8	-5.9	0.5	-3.7	10.9	1.7	-0.1	-5.9	16.0	-3.7	16.0	1.7
NOE_Metro	-4.3	-4.3	-3.9	-4.3	-2.1	-2.0	-4.2	-4.3	16.0	-4.3	16.0	-2.0
ORLE_13a	14.6	16.4	17.8	21.8	19.4	26.5	19.0	19.0	22.2	24.4	24.0	29.1
PLAQ_16s	19.2	0.5	25.3	16.4	30.0	18.0	22.2	0.5	31.9	16.4	38.7	18.0
St_Bernard_developed	-0.1	-0.1	4.3	4.8	10.6	12.5	2.3	-0.1	16.0	4.8	16.0	12.5
St_Bernard_wetland	2.4	2.4	5.2	5.4	10.6	12.5	4.5	2.4	16.0	5.4	16.0	12.5
St_Charles_Norco	4.4	4.2	16.0	13.0	16.0	13.5	11.5	4.2	17.3	13.0	18.6	13.5
St_Charles_rest	2.1	2.1	16.0	13.0	16.0	13.5	11.5	2.1	17.3	13.0	18.6	13.5
STJO_10b	10.6	8.9	12.9	11.4	14.1	12.8	13.2	11.5	15.5	14.0	16.7	15.4
STJO_5b	6.3	4.6	8.2	9.0	9.4	10.9	8.9	4.6	10.8	9.0	12.0	10.9
STJO_8c	9.4	4.6	12.2	9.0	14.0	10.9	12.0	4.6	14.8	9.0	16.6	10.9
STTA_10b	11.0	11.5	13.1	12.5	14.3	13.3	13.6	14.1	15.7	15.1	16.9	15.9
STTA_10e	12.2	4.1	16.2	11.0	18.2	11.2	17.1	4.1	22.3	11.0	24.9	11.2
STTA_9a	10.4	8.0	12.7	9.4	14.0	10.4	13.0	10.6	15.3	12.0	16.6	13.0
STTA_9d	10.5	7.4	13.5	10.0	15.0	11.5	14.2	10.0	18.0	12.6	20.2	14.1
TANG_10b	11.0	7.7	13.6	10.6	15.0	12.1	14.4	10.3	18.0	13.2	19.9	14.7
TANG_9a	10.1	6.9	12.3	8.3	13.5	9.3	13.9	9.5	17.6	10.9	19.5	11.9

Evaluation Parameters					
	Confidence Level:	90%	Levee Design:	No Friction Waves	
	Future Sea Level Rise:	High	Levee Overtopping:	No Friction Waves	

Planning Unit:	1	**Alt. No.**	PU1-LP-b-400-1	**Category**	Coastal Restoration + Structural Measures
Alternative Description:	Sustain coastal landscape through restoration and construct barrier-weir and levees to reduce risk to the Lake Pontchartrain area. Raise Lake Pontchartrain and Vicinity and upper Plaquemines levees to 400-year level of risk reduction.				
Coastal Component:	R2 (pulsed diversions)			**Nonstructural Component:**	None
Structural Component:	See alternative description.				

		Metric Results by Scenario with Uncertainty Bands								
		Life-cycle Cost	Resident Population Impacted	Residual Damages	Gross Regional Output Impacted	Employment Impacted	People's Earned Income Impacted	Archeo. Sites Protected	Historic Properties Protected	Historic Districts Protected
		$ Billions	Ann. Equiv. #	Ann. Equiv ($ 1000's)	Ann. Equiv ($ 1000's)	Ann. Equiv #	Ann. Equiv ($ 1000's)	# Sites	# Properties	# Districts
Scenario 1	**Low**		52,603	1,204,912	1,040,170	4,499	277,637	203	131	48
	Mean	36.17	55,825	1,445,571	1,292,708	5,408	338,964	233	137	50
	High		60,678	1,856,381	1,703,939	7,025	447,597	263	142	51
Scenario 2	**Low**		53,593	1,261,451	1,136,560	4,785	303,441	203	129	45
	Mean	36.48	57,272	1,531,642	1,405,109	5,727	367,669	233	133	50
	High		62,190	2,011,339	2,081,046	7,941	533,007	263	138	51
Scenario 3	**Low**		44,344	1,152,173	654,761	3,468	201,415	203	131	48
	Mean	36.17	47,572	1,391,601	882,066	4,408	264,319	233	137	50
	High		52,161	1,797,447	1,270,441	6,077	372,821	263	142	51
Scenario 4	**Low**		45,054	1,209,489	744,767	3,746	227,418	203	129	45
	Mean	36.48	48,720	1,475,860	987,382	4,714	292,655	233	133	50
	High		53,349	1,954,944	1,590,127	6,811	442,995	263	138	51

Other Metric Results							
Construction Time (years)	16	**Wetlands Created/ Protected (acres)**	**Scen 1&3**	**Scen 2&4**	**PV Cost of NS Comp ($ Billions)**	**Scen 1&2**	**Scen 3&4**
Direct Wetland Impacts (acres)	-4,238		214,687	220,284		N/A	N/A
Indirect Impacts	-8	**PV Cost of Coastal Component ($ Billions)**	10.67	10.90			
Spatial Integrity	0.478						
		PV Cost of Structural Component ($ Billions)	25.50	25.58			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Imagery Source: 2005 Post Hurricane DOQQs
Miles
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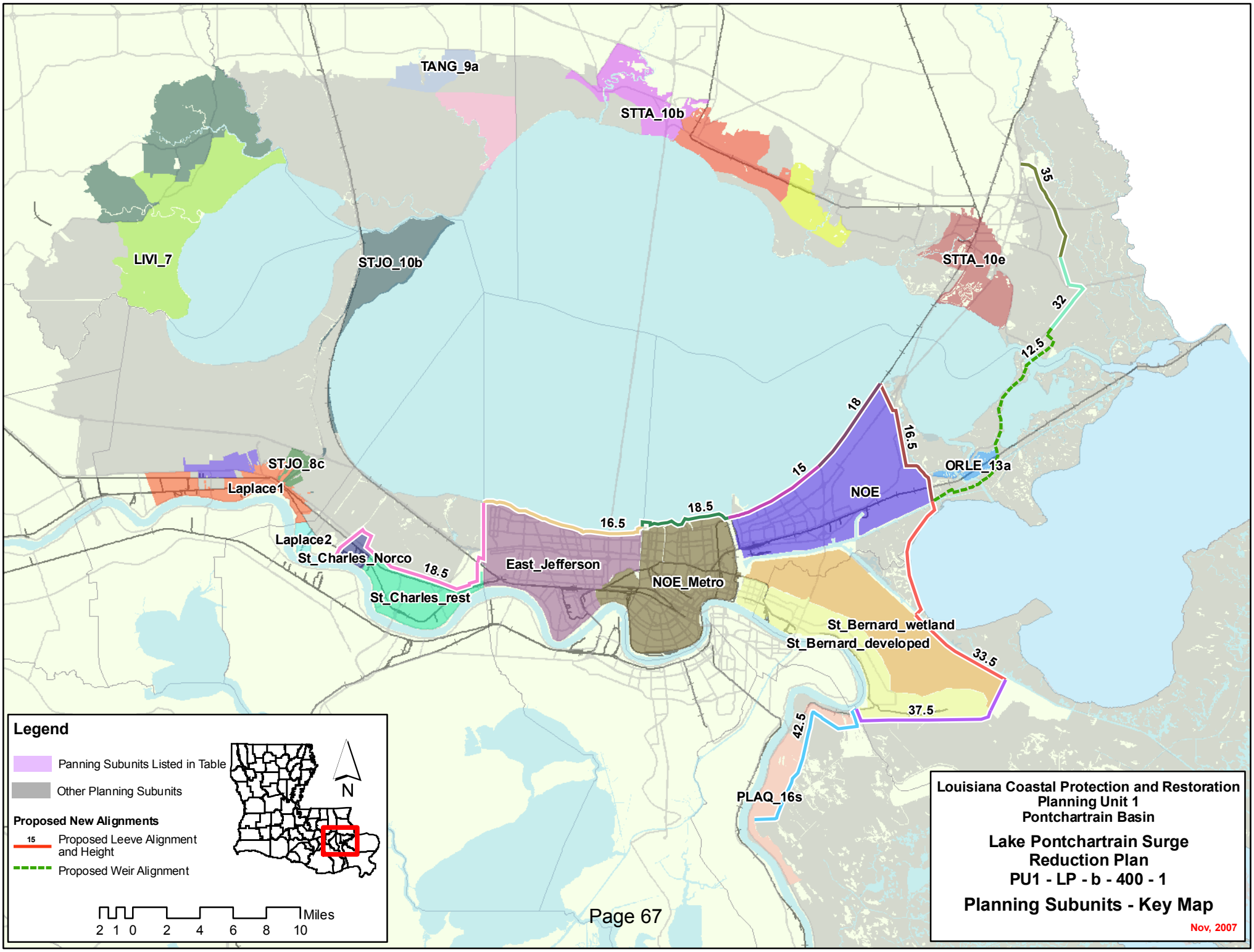
Louisiana Coastal Protection and Restoration
Planning Unit 1
Pontchartrain Basin
Lake Pontchartrain
Surge Reduction Plan
PU1 - LP - b - 400 - 1
(400-Year Design Level)
November 2007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Louisiana Coastal Protection and Restoration
Planning Unit 1
Pontchartrain Basin
Lake Pontchartrain Surge Reduction Plan
PU1 - LP - b - 400 - 1
Planning Subunits - Key Map
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Alternative: PU1-LP-b-400-1

Water Surface Elevations (feet - NAVD88 2004.65)

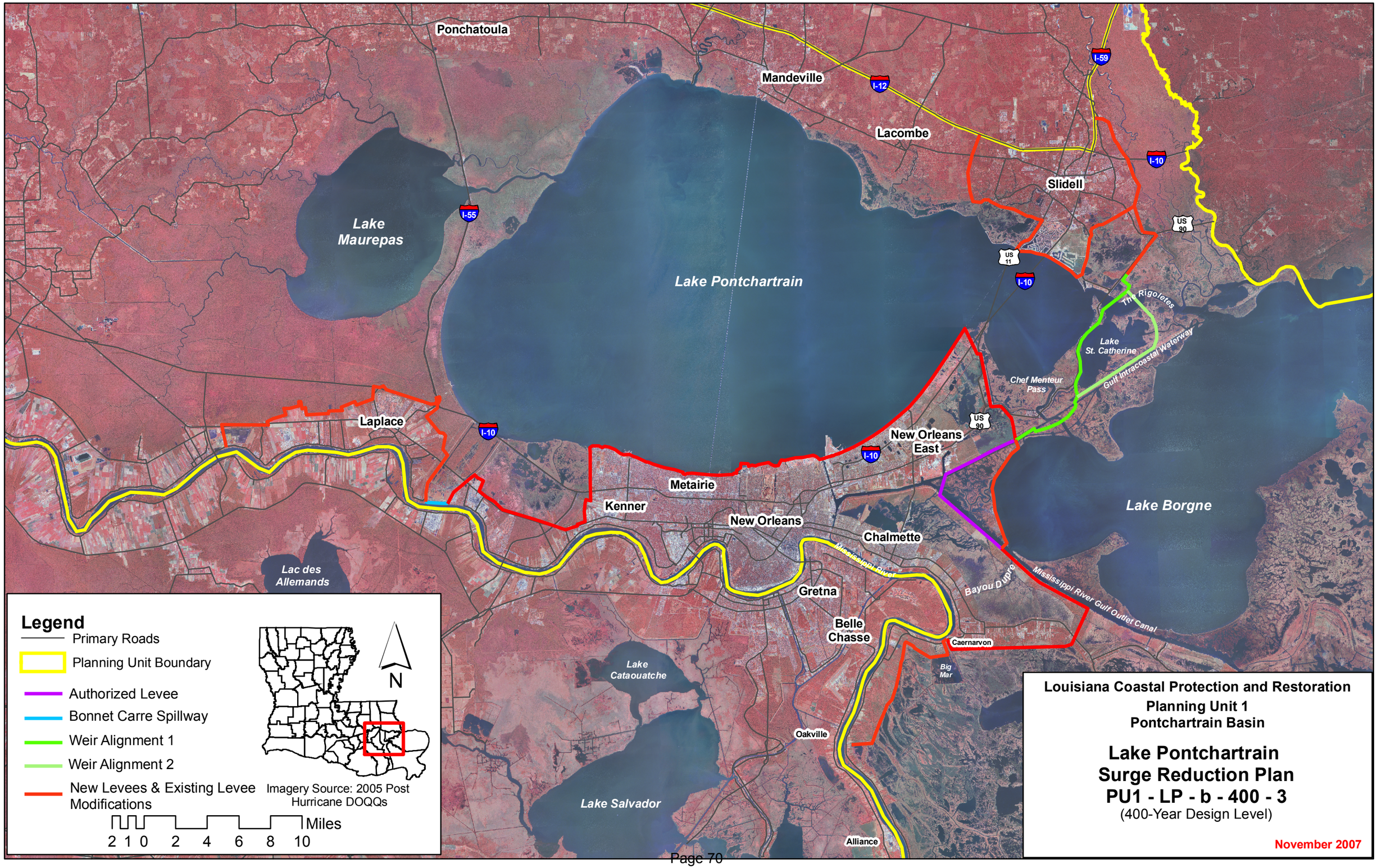
Planning Sub Unit	2010 (Base) Conditions						2060 (Future) Conditions					
	100-yr Event		400-year Event		1,000-yr Event		100-yr Event		400-year Event		1,000-yr Event	
	Without Project	With Project	Without Project	With Project	Without Project	With Project	Without Project	With Project	Without Project	With Project	Without Project	With Project
East_Jefferson	-5.1	-5.3	-1.3	-5.1	4.4	-4.5	-2.6	-5.3	16.0	-5.1	16.0	-4.5
Laplace1	9.4	9.4	12.2	12.2	14.0	14.0	12.0	12.0	14.8	14.8	16.6	16.6
Laplace2	8.5	8.5	11.0	11.0	12.8	12.8	11.1	11.1	13.6	13.6	15.4	15.4
LIVI_6	7.3	3.8	9.7	5.2	11.1	6.1	11.2	6.4	13.7	7.8	15.2	8.7
LIVI_7	7.5	5.5	9.7	6.9	10.9	7.8	10.1	8.1	12.3	9.5	13.5	10.4
NOE	-5.8	-6.0	0.5	-5.9	10.9	-4.6	-0.1	-6.0	16.0	-5.9	16.0	-4.6
NOE_Metro	-4.3	-4.3	-3.9	-4.3	-2.1	-4.3	-4.2	-4.3	16.0	-4.3	16.0	-4.3
ORLE_13a	14.6	16.4	17.8	21.8	19.4	26.5	19.0	19.0	22.2	24.4	24.0	29.1
PLAQ_16s	19.2	17.8	25.3	25.7	30.0	29.9	22.2	20.4	31.9	28.3	38.7	32.5
St_Bernard_developed	-0.1	-0.4	4.3	-0.1	10.6	0.7	2.3	-0.4	16.0	-0.1	16.0	0.7
St_Bernard_wetland	2.4	1.7	5.2	1.8	10.6	2.2	4.5	1.7	16.0	1.8	16.0	2.2
St_Charles_Norco	4.4	3.4	16.0	4.2	16.0	4.5	11.5	3.4	17.3	4.2	18.6	4.5
St_Charles_rest	2.1	1.9	16.0	2.1	16.0	4.3	11.5	1.9	17.3	2.1	18.6	4.3
STJO_10b	10.6	8.9	12.9	11.4	14.1	12.8	13.2	11.5	15.5	14.0	16.7	15.4
STJO_5b	6.3	2.6	8.2	3.8	9.4	4.6	8.9	5.2	10.8	6.4	12.0	7.2
STJO_8c	9.4	6.1	12.2	10.5	14.0	13.6	12.0	8.7	14.8	13.1	16.6	16.2
STTA_10b	11.0	11.5	13.1	12.5	14.3	13.3	13.6	14.1	15.7	15.1	16.9	15.9
STTA_10e	12.2	8.8	16.2	13.1	18.2	15.3	17.1	11.4	22.3	15.7	24.9	17.9
STTA_9a	10.4	8.0	12.7	9.4	14.0	10.4	13.0	10.6	15.3	12.0	16.6	13.0
STTA_9d	10.5	7.4	13.5	10.0	15.0	11.5	14.2	10.0	18.0	12.6	20.2	14.1
TANG_10b	11.0	7.7	13.6	10.6	15.0	12.1	14.4	10.3	18.0	13.2	19.9	14.7
TANG_9a	10.1	6.9	12.3	8.3	13.5	9.3	13.9	9.5	17.6	10.9	19.5	11.9

Evaluation Parameters					
	Confidence Level:	90%	Levee Design:	No Friction Waves	
	Future Sea Level Rise:	High	Levee Overtopping:	No Friction Waves	

Planning Unit:	1	**Alt. No.**	PU1-LP-b-400-3	**Category**	Coastal Restoration + Structural Measures
Alternative Description:	Sustain coastal landscape through restoration and construct barrier-weir and levees to reduce risk to the Lake Pontchartrain area. Raise Lake Pontchartrain and Vicinity and upper Plaquemines levees and construct new levees around Laplace and Slidell to the 400-year level of risk reduction.				
Coastal Component:	R2 (pulsed diversions)			**Nonstructural Component:**	None
Structural Component:	See alternative description.				

		Metric Results by Scenario with Uncertainty Bands								
		Life-cycle Cost	Resident Population Impacted	Residual Damages	Gross Regional Output Impacted	Employment Impacted	People's Earned Income Impacted	Archeo. Sites Protected	Historic Properties Protected	Historic Districts Protected
		$ Billions	Ann. Equiv. #	Ann. Equiv ($ 1000's)	Ann. Equiv ($ 1000's)	Ann. Equiv #	Ann. Equiv ($ 1000's)	# Sites	# Properties	# Districts
Scenario 1	**Low**		51,103	1,149,699	923,096	4,112	249,742	203	141	48
	Mean	54.19	53,518	1,347,470	1,113,354	4,804	296,555	233	146	50
	High		57,545	1,710,434	1,491,284	6,283	396,952	263	149	51
Scenario 2	**Low**		51,597	1,185,686	975,483	4,272	264,462	203	134	45
	Mean	54.56	54,439	1,404,630	1,195,256	5,023	317,209	233	142	50
	High		58,604	1,834,709	1,829,275	7,101	473,299	263	147	51
Scenario 3	**Low**		42,905	1,071,109	596,755	3,173	181,211	203	141	48
	Mean	54.19	45,303	1,261,002	762,804	3,836	224,638	233	146	50
	High		48,956	1,609,346	1,109,618	5,307	320,778	263	149	51
Scenario 4	**Low**		43,211	1,104,669	642,195	3,303	193,515	203	134	45
	Mean	54.56	45,921	1,311,882	828,572	4,017	242,012	233	142	50
	High		49,670	1,728,695	1,391,947	5,922	379,649	263	147	51

Other Metric Results							
Construction Time (years)	16	**Wetlands Created/ Protected (acres)**	**Scen 1&3**	**Scen 2&4**	**PV Cost of NS Comp ($ Billions)**	**Scen 1&2**	**Scen 3&4**
Direct Wetland Impacts (acres)	-7,587		214,687	220,284		N/A	N/A
Indirect Impacts	-8	**PV Cost of Coastal Component ($ Billions)**	10.67	10.90			
Spatial Integrity	0.478						
		PV Cost of Structural Component ($ Billions)	43.52	43.66			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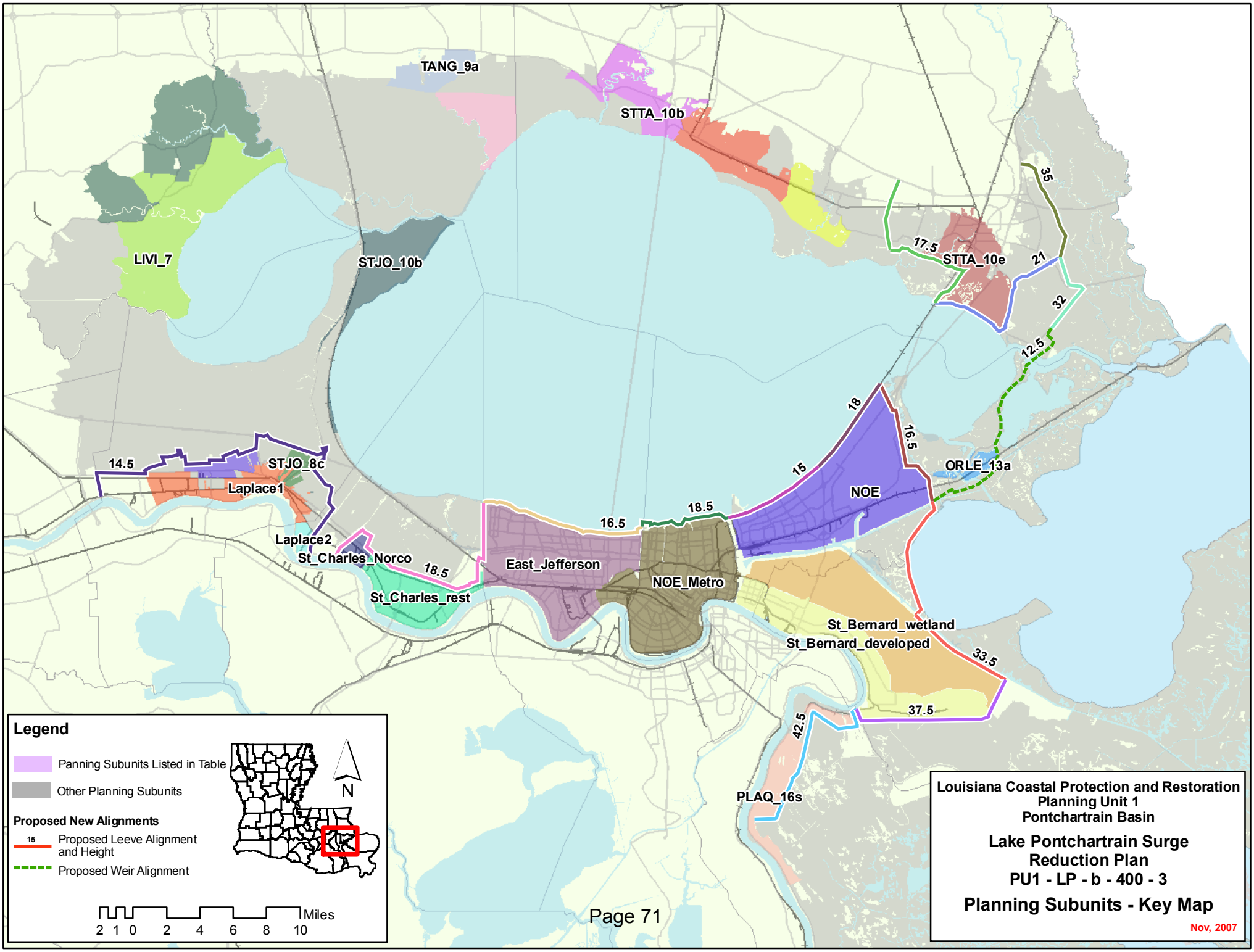
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Miles
2 1 0 2 4 6 8 10
Louisiana Coastal Protection and Restoration
Planning Unit 1
Pontchartrain Basin
Lake Pontchartrain Surge Reduction Plan
PU1 - LP - b - 400 - 3
Planning Subunits - Key Map
Nov, 2007

Alternative: PU1-LP-b-400-3
Water Surface Elevations (feet - NAVD88 2004.65)

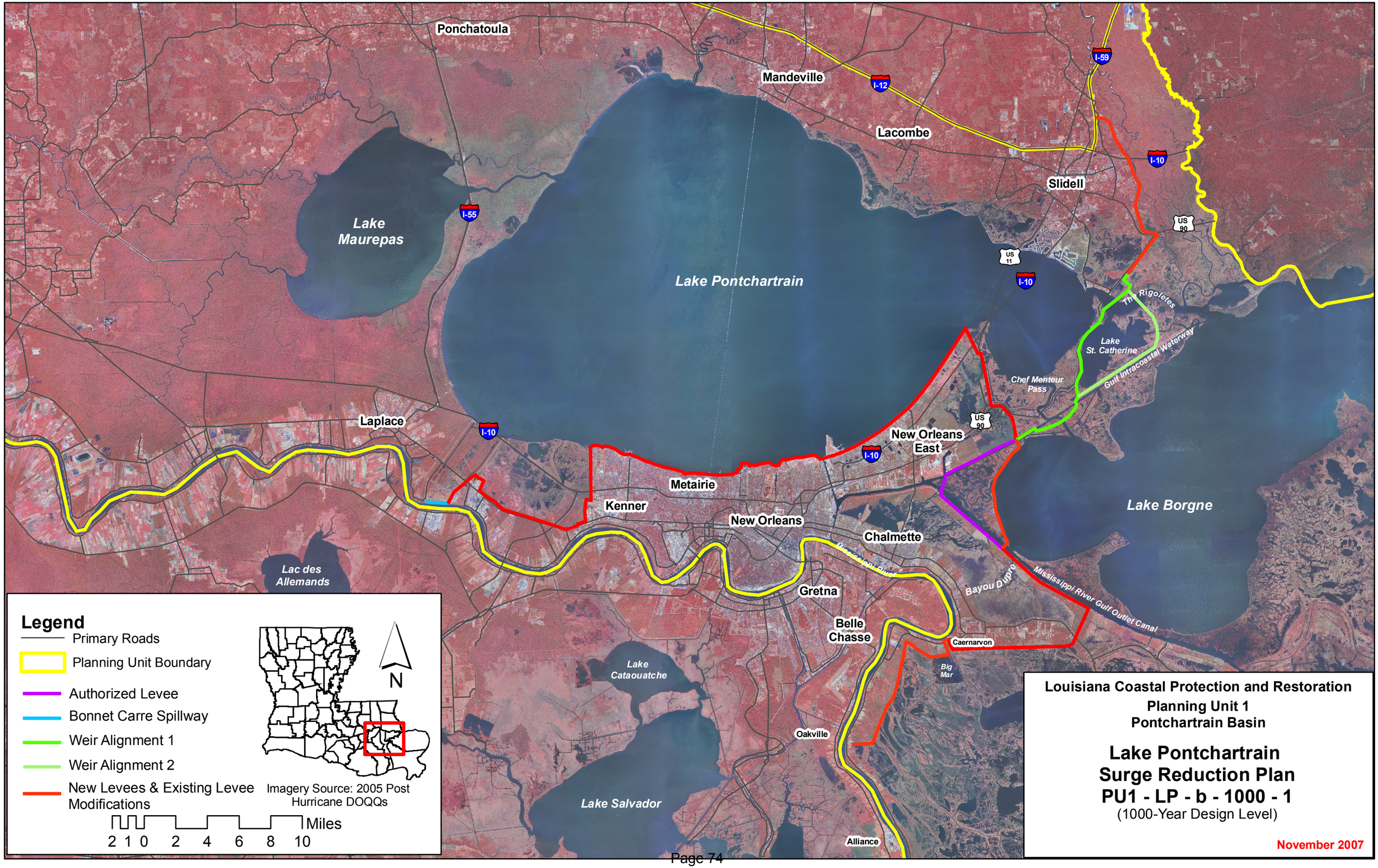
Planning Sub Unit	2010 (Base) Conditions						2060 (Future) Conditions					
	100-yr Event		400-year Event		1,000-yr Event		100-yr Event		400-year Event		1,000-yr Event	
	Without Project	With Project	Without Project	With Project	Without Project	With Project	Without Project	With Project	Without Project	With Project	Without Project	With Project
East_Jefferson	-5.1	-5.3	-1.3	-5.1	4.4	-4.5	-2.6	-5.3	16.0	-5.1	16.0	-4.5
Laplace1	9.4	4.1	12.2	4.5	14.0	9.8	12.0	4.1	14.8	4.5	16.6	9.8
Laplace2	8.5	4.1	11.0	4.5	12.8	9.8	11.1	4.1	13.6	4.5	15.4	9.8
LIVI_6	7.3	3.8	9.7	5.2	11.1	6.1	11.2	6.4	13.7	7.8	15.2	8.7
LIVI_7	7.5	5.5	9.7	6.9	10.9	7.8	10.1	8.1	12.3	9.5	13.5	10.4
NOE	-5.8	-6.0	0.5	-5.9	10.9	-4.6	-0.1	-6.0	16.0	-5.9	16.0	-4.6
NOE_Metro	-4.3	-4.3	-3.9	-4.3	-2.1	-4.3	-4.2	-4.3	16.0	-4.3	16.0	-4.3
ORLE_13a	14.6	16.4	17.8	21.8	19.4	26.5	19.0	19.0	22.2	24.4	24.0	29.1
PLAQ_16s	19.2	-0.1	25.3	0.9	30.0	4.0	22.2	-0.1	31.9	0.9	38.7	4.0
St_Bernard_developed	-0.1	-0.4	4.3	-0.1	10.6	0.7	2.3	-0.4	16.0	-0.1	16.0	0.7
St_Bernard_wetland	2.4	1.7	5.2	1.8	10.6	2.2	4.5	1.7	16.0	1.8	16.0	2.2
St_Charles_Norco	4.4	3.4	16.0	4.2	16.0	4.5	11.5	3.4	17.3	4.2	18.6	4.5
St_Charles_rest	2.1	1.9	16.0	2.1	16.0	4.3	11.5	1.9	17.3	2.1	18.6	4.3
STJO_10b	10.6	8.9	12.9	11.4	14.1	12.8	13.2	11.5	15.5	14.0	16.7	15.4
STJO_5b	6.3	4.1	8.2	4.5	9.4	9.8	8.9	4.1	10.8	4.5	12.0	9.8
STJO_8c	9.4	4.1	12.2	4.5	14.0	9.8	12.0	4.1	14.8	4.5	16.6	9.8
STTA_10b	11.0	11.5	13.1	12.5	14.3	13.3	13.6	14.1	15.7	15.1	16.9	15.9
STTA_10e	12.2	3.9	16.2	4.1	18.2	6.0	17.1	3.9	22.3	4.1	24.9	6.0
STTA_9a	10.4	8.0	12.7	9.4	14.0	10.4	13.0	10.6	15.3	12.0	16.6	13.0
STTA_9d	10.5	7.4	13.5	10.0	15.0	11.5	14.2	10.0	18.0	12.6	20.2	14.1
TANG_10b	11.0	7.7	13.6	10.6	15.0	12.1	14.4	10.3	18.0	13.2	19.9	14.7
TANG_9a	10.1	6.9	12.3	8.3	13.5	9.3	13.9	9.5	17.6	10.9	19.5	11.9

Evaluation Parameters					
	Confidence Level:	90%	Levee Design:	No Friction Waves	
	Future Sea Level Rise:	High	Levee Overtopping:	No Friction Waves	

Planning Unit:	1	**Alt. No.**	PU1-LP-b-1000-1	**Category**	Coastal Restoration + Structural Measures
Alternative Description:	Sustain coastal landscape through restoration and construct barrier-weir and levees to reduce risk to the Lake Pontchartrain area. Raise upper Lake Pontchartrain and Vicinity and upper Plaquemines levees to 1000-year level of risk reduction.				
Coastal Component:	R2 (pulsed diversions)			**Nonstructural Component:**	None
Structural Component:	See alternative description.				

		Metric Results by Scenario with Uncertainty Bands								
		Life-cycle Cost	Resident Population Impacted	Residual Damages	Gross Regional Output Impacted	Employment Impacted	People's Earned Income Impacted	Archeo. Sites Protected	Historic Properties Protected	Historic Districts Protected
		$ Billions	Ann. Equiv. #	Ann. Equiv ($ 1000's)	Ann. Equiv ($ 1000's)	Ann. Equiv #	Ann. Equiv ($ 1000's)	# Sites	# Properties	# Districts
Scenario 1	**Low**		52,603	1,204,911	1,040,170	4,499	277,637	243	131	48
	Mean	43.87	55,815	1,445,322	1,292,603	5,407	338,928	273	137	50
	High		60,542	1,848,515	1,694,231	6,986	444,898	303	142	51
Scenario 2	**Low**		53,593	1,261,450	1,136,560	4,785	303,441	243	129	45
	Mean	44.35	57,262	1,531,394	1,405,004	5,726	367,634	273	133	50
	High		62,053	2,003,473	2,071,338	7,903	530,308	303	138	51
Scenario 3	**Low**		44,334	1,152,172	654,761	3,468	201,415	243	131	48
	Mean	43.87	47,561	1,391,367	881,961	4,407	264,280	273	137	50
	High		52,045	1,790,537	1,261,743	6,043	370,535	303	142	51
Scenario 4	**Low**		45,054	1,209,488	744,767	3,746	227,418	243	129	45
	Mean	44.35	48,708	1,475,626	987,277	4,713	292,617	273	133	50
	High		53,233	1,948,035	1,581,430	6,778	440,708	303	138	51

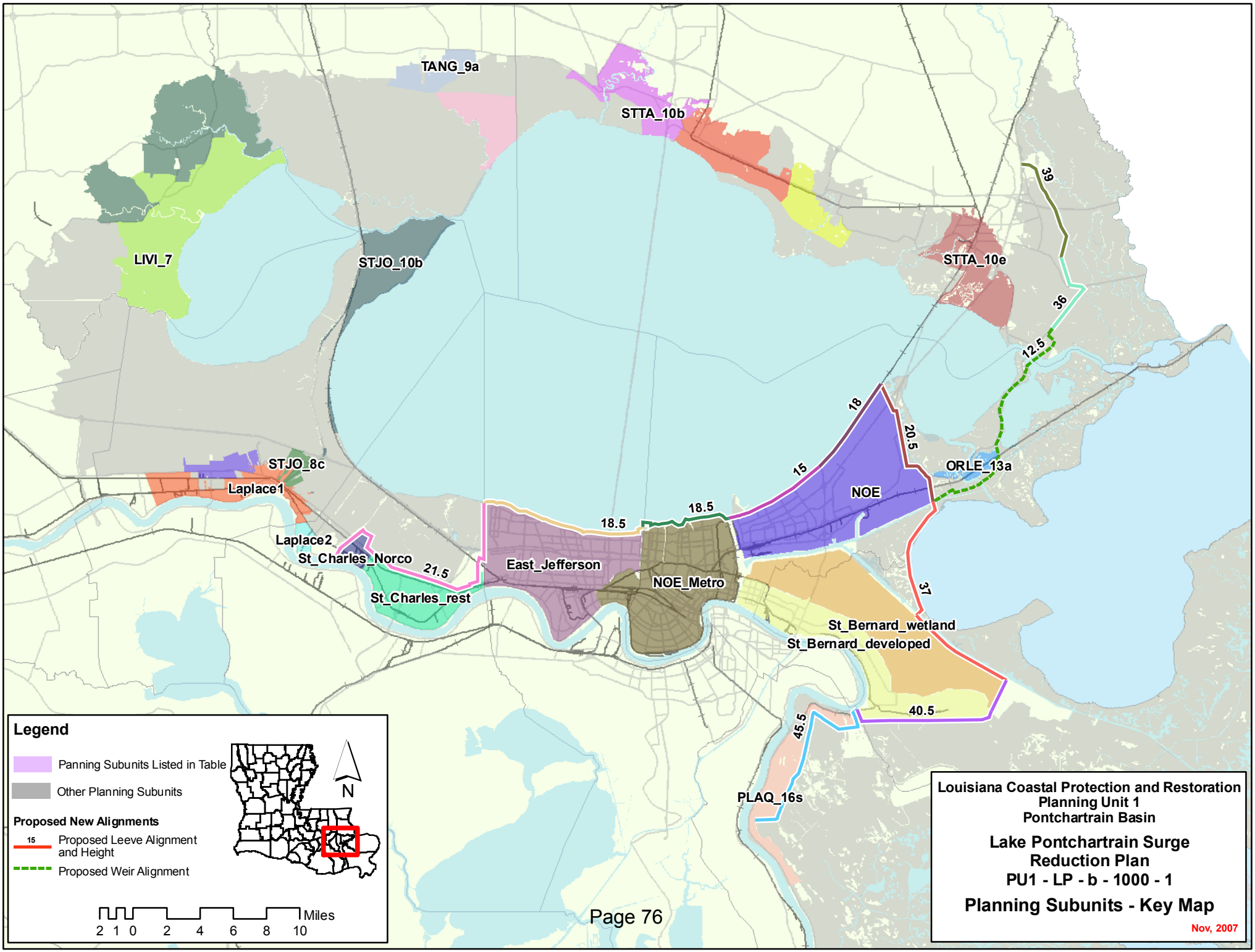
Other Metric Results							
Construction Time (years)	16	**Wetlands Created/ Protected (acres)**	**Scen 1&3**	**Scen 2&4**	**PV Cost of NS Comp ($ Billions)**	**Scen 1&2**	**Scen 3&4**
Direct Wetland Impacts (acres)	-5,100		214,687	220,284		N/A	N/A
Indirect Impacts	-8	**PV Cost of Coastal Component ($ Billions)**	10.67	10.90			
Spatial Integrity	0.478						
		PV Cost of Structural Component ($ Billions)	33.20	33.45			


Ponchatoula
Mandeville
Lacombe
Slidell
Lake Maurepas
Lake Pontchartrain
Laplace
New Orleans East
Metairie
Kenner
New Orleans
Chalmette
Gretna
Belle Chasse
Caernarvon
Big Mar
Oakville
Alliance
Lake Cataouatche
Lake Salvador
Lac des Allemands
Lake Borgne
Lake St. Catherine
Chef Menteur Pass
The Rigolets
Gulf Intracoastal Waterway
Mississippi River
Bayou Dupre
Mississippi River Gulf Outlet Canal
I-12
I-59
I-10
I-55
US 90
US 11
Legend
Primary Roads
Planning Unit Boundary
Authorized Levee
Bonnet Carre Spillway
Weir Alignment 1
Weir Alignment 2
New Levees & Existing Levee Modifications
N
Imagery Source: 2005 Post Hurricane DOQQs
Miles
2 1 0 2 4 6 8 10
Louisiana Coastal Protection and Restoration
Planning Unit 1
Pontchartrain Basin
Lake Pontchartrain
Surge Reduction Plan
PU1 - LP - b - 1000 - 1
(1000-Year Design Level)
November 2007

Alternative: PU1-LP-b-1000-1
Water Surface Elevations (feet - NAVD88 2004.65)

Planning Sub Unit	2010 (Base) Conditions						2060 (Future) Conditions					
	100-yr Event		400-year Event		1,000-yr Event		100-yr Event		400-year Event		1,000-yr Event	
	Without Project	With Project	Without Project	With Project	Without Project	With Project	Without Project	With Project	Without Project	With Project	Without Project	With Project
East_Jefferson	-5.1	-5.3	-1.3	-5.2	4.4	-5.0	-2.6	-5.3	16.0	-5.2	16.0	-5.0
Laplace1	9.4	9.4	12.2	12.2	14.0	14.0	12.0	12.0	14.8	14.8	16.6	16.6
Laplace2	8.5	8.5	11.0	11.0	12.8	12.8	11.1	11.1	13.6	13.6	15.4	15.4
LIVI_6	7.3	3.8	9.7	5.2	11.1	6.1	11.2	6.4	13.7	7.8	15.2	8.7
LIVI_7	7.5	5.5	9.7	6.9	10.9	7.8	10.1	8.1	12.3	9.5	13.5	10.4
NOE	-5.8	-6.0	0.5	-6.0	10.9	-5.9	-0.1	-6.0	16.0	-6.0	16.0	-5.9
NOE_Metro	-4.3	-4.3	-3.9	-4.3	-2.1	-4.3	-4.2	-4.3	16.0	-4.3	16.0	-4.3
ORLE_13a	14.6	16.4	17.8	21.8	19.4	26.5	19.0	19.0	22.2	24.4	24.0	29.1
PLAQ_16s	19.2	17.8	25.3	25.7	30.0	29.9	22.2	20.4	31.9	28.3	38.7	32.5
St_Bernard_developed	-0.1	-0.4	4.3	-0.3	10.6	0.1	2.3	-0.4	16.0	-0.3	16.0	0.1
St_Bernard_wetland	2.4	1.7	5.2	1.7	10.6	1.8	4.5	1.7	16.0	1.7	16.0	1.8
St_Charles_Norco	4.4	3.4	16.0	3.5	16.0	4.5	11.5	3.4	17.3	3.5	18.6	4.5
St_Charles_rest	2.1	1.9	16.0	1.9	16.0	2.1	11.5	1.9	17.3	1.9	18.6	2.1
STJO_10b	10.6	8.9	12.9	11.4	14.1	12.8	13.2	11.5	15.5	14.0	16.7	15.4
STJO_5b	6.3	2.6	8.2	3.8	9.4	4.6	8.9	5.2	10.8	6.4	12.0	7.2
STJO_8c	9.4	6.1	12.2	10.5	14.0	13.6	12.0	8.7	14.8	13.1	16.6	16.2
STTA_10b	11.0	11.5	13.1	12.5	14.3	13.3	13.6	14.1	15.7	15.1	16.9	15.9
STTA_10e	12.2	8.8	16.2	13.1	18.2	15.3	17.1	11.4	22.3	15.7	24.9	17.9
STTA_9a	10.4	8.0	12.7	9.4	14.0	10.4	13.0	10.6	15.3	12.0	16.6	13.0
STTA_9d	10.5	7.4	13.5	10.0	15.0	11.5	14.2	10.0	18.0	12.6	20.2	14.1
TANG_10b	11.0	7.7	13.6	10.6	15.0	12.1	14.4	10.3	18.0	13.2	19.9	14.7
TANG_9a	10.1	6.9	12.3	8.3	13.5	9.3	13.9	9.5	17.6	10.9	19.5	11.9

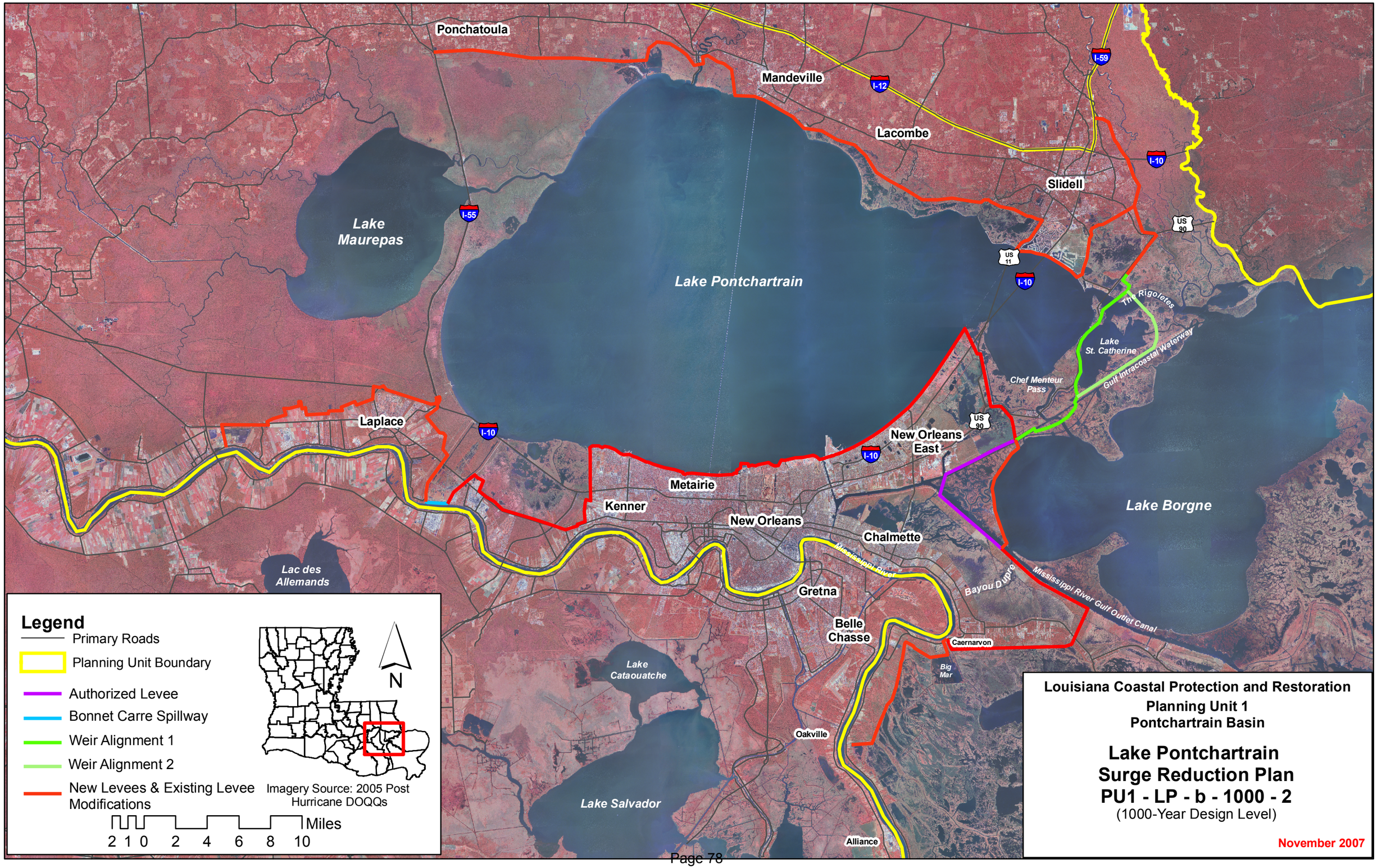
Evaluation Parameters					
	Confidence Level:	90%	Levee Design:	No Friction Waves	
	Future Sea Level Rise:	High	Levee Overtopping:	No Friction Waves	


TANG_9a
STTA_10b
LIVI_7
STJO_10b
STTA_10e
39
36
12.5
18
20.5
15
ORLE_13a
NOE
STJO_8c
Laplace1
18.5
18.5
Laplace2
St_Charles_Norco
21.5
East_Jefferson
NOE_Metro
St_Charles_rest
37
St_Bernard_wetland
St_Bernard_developed
40.5
45.5
PLAQ_16s
Legend
Panning Subunits Listed in Table
Other Planning Subunits
Proposed New Alignments
15
Proposed Leeve Alignment and Height
Proposed Weir Alignment
N
Miles
2 1 0 2 4 6 8 10
Louisiana Coastal Protection and Restoration
Planning Unit 1
Pontchartrain Basin
Lake Pontchartrain Surge Reduction Plan
PU1 - LP - b - 1000 - 1
Planning Subunits - Key Map
Nov, 2007

Planning Unit:	1	**Alt. No.**	PU1-LP-b-1000-2	**Category**	Coastal Restoration + Structural Measures
Alternative Description:	Sustain coastal landscape through restoration and construct barrier-weir and levees to reduce risk to the Lake Pontchartrain area. Raise upper Lake Pontchartrain and Vicinity and upper Plaquemines levees and construct new levees around Laplace and across the Northshore to the 1000-year level of risk reduction.				
Coastal Component:	R2 (pulsed diversions)			**Nonstructural Component:**	None
Structural Component:	See alternative description.				

		Metric Results by Scenario with Uncertainty Bands								
		Life-cycle Cost	Resident Population Impacted	Residual Damages	Gross Regional Output Impacted	Employment Impacted	People's Earned Income Impacted	Archeo. Sites Protected	Historic Properties Protected	Historic Districts Protected
		$ Billions	Ann. Equiv. #	Ann. Equiv ($ 1000's)	Ann. Equiv ($ 1000's)	Ann. Equiv #	Ann. Equiv ($ 1000's)	# Sites	# Properties	# Districts
Scenario 1	**Low**		50,437	1,132,749	887,027	3,992	239,308	243	156	48
	Mean	67.16	52,697	1,320,717	1,073,807	4,666	284,866	273	159	50
	High		56,455	1,662,006	1,426,672	6,021	377,642	303	159	52
Scenario 2	**Low**		50,834	1,162,587	935,952	4,143	253,185	243	144	45
	Mean	67.73	53,472	1,371,903	1,148,150	4,865	303,373	273	157	50
	High		57,359	1,781,140	1,750,810	6,812	450,804	303	159	51
Scenario 3	**Low**		42,561	1,057,226	574,643	3,108	175,857	243	156	48
	Mean	67.16	44,867	1,240,226	737,980	3,757	218,425	273	159	50
	High		48,307	1,570,383	1,060,992	5,121	308,258	303	159	52
Scenario 4	**Low**		42,833	1,086,036	618,737	3,234	187,699	243	144	45
	Mean	67.73	45,434	1,286,691	797,720	3,925	234,294	273	157	50
	High		48,955	1,685,980	1,334,020	5,718	364,990	303	159	51

Other Metric Results							
Construction Time (years)	16	**Wetlands Created/ Protected (acres)**	**Scen 1&3**	**Scen 2&4**	**PV Cost of NS Comp ($ Billions)**	**Scen 1&2**	**Scen 3&4**
Direct Wetland Impacts (acres)	-10,081		214,687	220,284		N/A	N/A
Indirect Impacts	-8	**PV Cost of Coastal Component ($ Billions)**	10.67	10.90			
Spatial Integrity	0.478						
		PV Cost of Structural Component ($ Billions)	56.49	56.83			


Ponchatoula
Mandeville
Lacombe
Slidell
Lake Maurepas
Lake Pontchartrain
Laplace
Metairie
Kenner
New Orleans
New Orleans East
Chalmette
Gretna
Belle Chasse
Caernarvon
Oakville
Alliance
Lake Borgne
Lake St. Catherine
Chef Menteur Pass
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2 1 0 2 4 6 8 10
Louisiana Coastal Protection and Restoration
Planning Unit 1
Pontchartrain Basin
Lake Pontchartrain
Surge Reduction Plan
PU1 - LP - b - 1000 - 2
(1000-Year Design Level)
November 2007

Alternative: PU1-LP-b-1000-2
Water Surface Elevations (feet - NAVD88 2004.65)

Planning Sub Unit	2010 (Base) Conditions						2060 (Future) Conditions					
	100-yr Event		400-year Event		1,000-yr Event		100-yr Event		400-year Event		1,000-yr Event	
	Without Project	With Project	Without Project	With Project	Without Project	With Project	Without Project	With Project	Without Project	With Project	Without Project	With Project
East_Jefferson	-5.1	-5.3	-1.3	-5.2	4.4	-5.0	-2.6	-5.3	16.0	-5.2	16.0	-5.0
Laplace1	9.4	4.1	12.2	4.1	14.0	4.5	12.0	4.1	14.8	4.1	16.6	4.5
Laplace2	8.5	4.1	11.0	4.1	12.8	4.5	11.1	4.1	13.6	4.1	15.4	4.5
LIVI_6	7.3	3.8	9.7	5.2	11.1	6.1	11.2	6.4	13.7	7.8	15.2	8.7
LIVI_7	7.5	5.5	9.7	6.9	10.9	7.8	10.1	8.1	12.3	9.5	13.5	10.4
NOE	-5.8	-6.0	0.5	-6.0	10.9	-5.9	-0.1	-6.0	16.0	-6.0	16.0	-5.9
NOE_Metro	-4.3	-4.3	-3.9	-4.3	-2.1	-4.3	-4.2	-4.3	16.0	-4.3	16.0	-4.3
ORLE_13a	14.6	16.4	17.8	21.8	19.4	26.5	19.0	19.0	22.2	24.4	24.0	29.1
PLAQ_16s	19.2	-0.1	25.3	0.3	30.0	2.0	22.2	-0.1	31.9	0.3	38.7	2.0
St_Bernard_developed	-0.1	-0.4	4.3	-0.3	10.6	0.1	2.3	-0.4	16.0	-0.3	16.0	0.1
St_Bernard_wetland	2.4	1.7	5.2	1.7	10.6	1.8	4.5	1.7	16.0	1.7	16.0	1.8
St_Charles_Norco	4.4	3.4	16.0	3.5	16.0	4.5	11.5	3.4	17.3	3.5	18.6	4.5
St_Charles_rest	2.1	1.9	16.0	1.9	16.0	2.1	11.5	1.9	17.3	1.9	18.6	2.1
STJO_10b	10.6	8.9	12.9	11.4	14.1	12.8	13.2	11.5	15.5	14.0	16.7	15.4
STJO_5b	6.3	4.1	8.2	4.1	9.4	4.5	8.9	4.1	10.8	4.1	12.0	4.5
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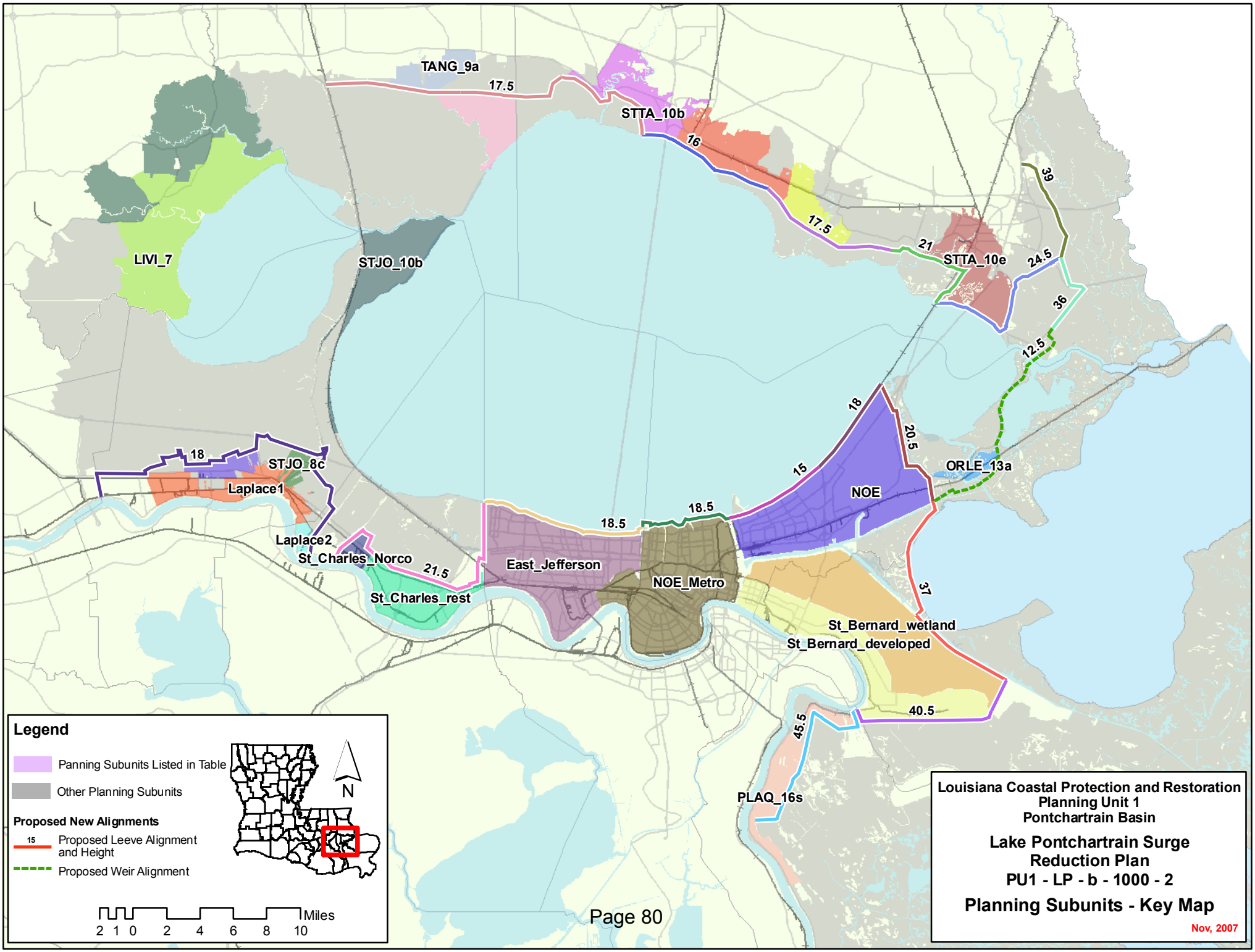
STTA_10b	11.0	4.1	13.1	4.1	14.3	4.3	13.6	4.1	15.7	4.1	16.9	4.3
STTA_10e	12.2	3.9	16.2	3.9	18.2	4.2	17.1	3.9	22.3	3.9	24.9	4.2
STTA_9a	10.4	4.1	12.7	4.1	14.0	4.3	13.0	4.1	15.3	4.1	16.6	4.3
STTA_9d	10.5	7.4	13.5	10.0	15.0	11.5	14.2	10.0	18.0	12.6	20.2	14.1
TANG_10b	11.0	7.7	13.6	10.6	15.0	12.1	14.4	10.3	18.0	13.2	19.9	14.7
TANG_9a	10.1	4.2	12.3	4.3	13.5	4.6	13.9	4.2	17.6	4.3	19.5	4.6

Evaluation Parameters					
	Confidence Level:	90%	Levee Design:	No Friction Waves	
	Future Sea Level Rise:	High	Levee Overtopping:	No Friction Waves	


TANG_9a
17.5
STTA_10b
16
17.5
21
STTA_10e
24.5
39
36
12.5
LIVI_7
STJO_10b
18
STJO_8c
Laplace1
Laplace2
St_Charles_Norco
21.5
St_Charles_rest
18.5
East_Jefferson
18.5
NOE_Metro
15
18
20.5
NOE
ORLE_13a
37
St_Bernard_wetland
St_Bernard_developed
40.5
45.5
PLAQ_16s
Legend
Panning Subunits Listed in Table
Other Planning Subunits
Proposed New Alignments
15
Proposed Leeve Alignment and Height
Proposed Weir Alignment
N
Miles
2 1 0 2 4 6 8 10
Louisiana Coastal Protection and Restoration
Planning Unit 1
Pontchartrain Basin
Lake Pontchartrain Surge Reduction Plan
PU1 - LP - b - 1000 - 2
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