

March 2005

Final

**WEST BATON ROUGE
RIVERFRONT DEVELOPMENT
JUSTIFICATION REPORT**



**U.S. Army Corps of Engineers
New Orleans District
New Orleans, Louisiana**



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STUDY AUTHORIZATION

33 USC 2333.

SEC. 515. IRRIGATION DIVERSION PROTECTION AND FISHERIES ENHANCEMENT ASSISTANCE.

(a) **IN GENERAL.**—The Secretary may provide technical planning and design assistance to non-Federal interests and may conduct other site-specific studies to formulate and evaluate fish screens, fish passages devices, and other measures to decrease the incidence of juvenile and adult fish inadvertently entering irrigation systems.

(b) **COOPERATION.**—Measures under subsection (a)—

(1) shall be developed in cooperation with Federal and State resource agencies; and

(2) shall not impair the continued withdrawal of water for irrigation purposes.

(c) **PRIORITY.**—In providing assistance under subsection (a), the Secretary shall give priority based on—

(1) the objectives of the Endangered Species Act of 1973 (16 U.S.C. 1531 et seq.);

(2) cost-effectiveness; and

(3) the potential for reducing fish mortality.

(d) **NON-FEDERAL SHARE.**—

(1) **IN GENERAL.**—The non-Federal share of the cost of measures under subsection (a) shall be 50 percent.

(2) **IN-KIND CONTRIBUTIONS.**—Not more than 50 percent of the non-Federal contribution may be made through the provision of services, materials, supplies, or other in-kind contributions.

(e) **NO CONSTRUCTION ACTIVITY.**—This section does not authorize any construction activity.

(f) **REPORT.**—Not later than 2 years after the date of enactment of this Act, the Secretary shall submit to Congress a report on—

(1) fish mortality caused by irrigation water intake devices;

(2) appropriate measures to reduce fish mortality;

(3) the extent to which those measures are currently being employed in arid States;

(4) the construction costs associated with those measures; and

(5) the appropriate Federal role, if any, to encourage the use of those measures.

Deadline.

33 USC 2334.

SEC. 516. INNOVATIVE TECHNOLOGIES FOR WATERSHED RESTORATION.

The Secretary shall examine using, and, if appropriate, encourage the use of, innovative treatment technologies, including membrane technologies, for watershed and environmental restoration and protection projects involving water quality.

**SEC. 517. EXPEDITED CONSIDERATION OF CERTAIN PROJECTS.**

The Secretary shall expedite completion of the reports for the following projects and, if justified, proceed directly to project preconstruction, engineering, and design:

(1) Sluice Creek, Guilford, Connecticut, and Lighthouse Point Park, New Haven, Connecticut.

(2) Alafia Channel, Tampa Harbor, Florida, project for navigation.

(3) Little Calumet River, Indiana.

(4) Ohio River Greenway, Indiana, project for environmental restoration and recreation.

* (5) Mississippi River, West Baton Rouge Parish, Louisiana, project for waterfront and riverine preservation, restoration, and enhancement modifications.

(6) Extension of locks 20, 21, 22, 24, and 25 on the upper Mississippi River and the La Grange and Peoria locks on the Illinois River, project to provide lock chambers 110 feet in width and 1,200 feet in length.

SEC. 518. DOG RIVER, ALABAMA.

The Secretary shall provide \$1,500,000 for environmental restoration for a pilot project, in cooperation with non-Federal interests, to restore natural water depths in the Dog River, Alabama.

SEC. 519. LEVEES IN ELBA AND GENEVA, ALABAMA.

(a) ELBA, ALABAMA.—

(1) IN GENERAL.—The Secretary may repair and rehabilitate a levee in the city of Elba, Alabama, at a total cost of \$12,900,000.

(2) COST SHARING.—The non-Federal share of the cost of repair and rehabilitation under paragraph (1) shall be 35 percent.

(b) GENEVA, ALABAMA.—

(1) IN GENERAL.—The Secretary may repair and rehabilitate a levee in the city of Geneva, Alabama, at a total cost of \$16,600,000.

(2) COST SHARING.—The non-Federal share of the cost of repair and rehabilitation under paragraph (1) shall be 35 percent.

SEC. 520. NAVAJO RESERVATION, ARIZONA, NEW MEXICO, AND UTAH.

(a) IN GENERAL.—In cooperation with other appropriate Federal and local agencies, the Secretary shall undertake a survey of, and provide technical, planning, and design assistance for, watershed management, restoration, and development on the Navajo Indian Reservation, Arizona, New Mexico, and Utah.

(b) COST SHARING.—The Federal share of the cost of activities carried out under this section shall be 75 percent. Funds made available under the Indian Self-Determination and Education Assistance Act (25 U.S.C. 150 et seq.) may be used by the Navajo Nation in meeting the non-Federal share of the cost of the activities.

(c) AUTHORIZATION OF APPROPRIATIONS.—There is authorized to be appropriated to carry out this section \$12,000,000 for the period beginning with fiscal year 2000.

SEC. 521. BEAVER LAKE, ARKANSAS, WATER SUPPLY STORAGE RE-ALLOCATION.

The Secretary shall reallocate approximately 31,000 additional acre-feet at Beaver Lake, Arkansas, to water supply storage at no cost to the Beaver Water District or the Carroll-Boone Water District, except that at no time shall the bottom of the conservation pool be at an elevation that is less than 1,076 feet, NGVD.

SEC. 522. BEAVER LAKE TROUT PRODUCTION FACILITY, ARKANSAS.

Not later than 2 years after the date of enactment of this Act, the Secretary, in conjunction with the State of Arkansas, shall prepare a plan for the mitigation of effects of the Beaver Dam project on Beaver Lake, including the benefits of and schedule

Deadline.

**VIDEO
TELECONFERENCE
GUIDANCE**



DEPARTMENT OF THE ARMY

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CEMVD-MD-PP

30 MAY 2003

MEMORANDUM FOR CECW-B

SUBJECT: Video Teleconference, 5 May 2003, FY 2003 Congressional Adds for MVD/MRC

1. A video teleconference (VTC) was held on Monday, 5 May 2003, to discuss the FY 2003 Congressional Adds for MVD/MRC. The following were in attendance:

a. OASA (CW) /HQUSACE

<u>Name</u>	<u>Organization</u>
Ms. Claudia Tornblom	OASA (CW)
Mr. Jim Smyth	OASA (CW)
Mr. Mark Mugler	OASA (CW)
Mr. Rob Vining	CECW-B
Mr. John Lucyshyn	CECW-BC
Mr. Cliff Fitzsimmons	CECW-PM
Mr. Kyle Jones	CECW-BC
Mr. Aaron Hostyk	CECC-G
Mr. John Micik	CECC-G

b. MVD/MRC

<u>Name</u>	<u>Organization</u>
Dr. Ed Theriot	CEMVD-MD
Mr. Louis Carr	CEMVD-TD
Mr. Cecil Bryant	CEMVD-MD-B
Mr. Mike Harden	CEMVD-MD-PP
Mr. Buddy Arnold	CEMVD-MD-PP
Ms. Annette Kuz	CEMVD-OC
Ms. Bitsy Sloan	CEMVD-OC
Mr. Tom Leggett	CEMVD-LM
Ms. Lexine Cool	CEMVD-MD-PP
Ms. Susan Smith	CEMVD-MD-PP
Mr. Tommy Shelton	CEMVD-MD-PM
Mr. Les Waguespack	CEMVD-MD-PM
Mr. Stan McAlpin	CEMVD-MD-PM
Ms. Sue Fowler	CEMVD-MD-D
Ms. Terrie Ferguson	CEMVD-MD-D
Mr. Jim Marshall	CEMVD-MD-D
Ms. Glenda Jackson	CEMVD-MD-D
Mr. Tim Ethridge	CEMVD-TD-OP
Ms. Jeanine Miami	CEMVD-RM

2. VTC fact sheets were required on 25 MVD/MRC studies/projects that received Congressional funding adds in FY 2003 (encl 1). Of the 25 fact sheets, seven fact sheets had issues and were discussed at the VTC; four fact sheets had issues which were resolved and approved by OASA(CW) prior to the VTC; eight fact sheets had no remaining issues but were identified for possible discussion if appropriate and, six fact sheets had no issues and were not be discussed at the VTC. An Excel spreadsheet that summarizes all FY 03 Adds is provided as enclosure 2.

3. Discussions during the VTC are summarized below.

a. Bois Brule Levee and Drainage District, MO; Grubbs, AR; and, Farm Creek, IL. The funds added by Congress will not be used on these three projects/studies. The Districts will ensure that the appropriate Congressional members have been informally notified as to the reasons why the added funds are not being used as provided by Congress. HQUSACE will make similar informal notifications to the Appropriation Committee staffers. These three fact sheets have been revised to reflect the above requirements.

b. Devils Lake Emergency Outlet, ND; and, Upper Mississippi & Illinois River Navigation Study, IL, IA, MN, MO, WI. The issue relates to the need to notify and coordinate with OASA(CW) and OMB staff future Committee reprogramming actions prior to HQUSACE seeking Committee approval. HQUSACE and OASA(CW) staffs will review current GI reprogramming procedures for these studies. No action is required by MVD.

c. Mayfield Creek, KY. The issue on Mayfield Creek pertained to the cost-sharing obligations the non-Federal sponsor still has on the existing Mayfield Creek project and whether or not it is appropriate for the Corps to enter into a new FCSA to study changes to the existing project before the non-Federal sponsor clears their outstanding obligations. The non-Federal sponsor is currently working to document actual costs incurred for real estate acquisition expenses on the existing project and is submitting such documentation to Memphis District for review and certification. A reconnaissance-level preliminary evaluation has been prepared by Memphis District to evaluate the causes of the continued flooding in the project area. The draft report is currently under review by MVD staff. Although removal of the weir (an environmental feature of the existing project) could potentially lower flood stages, initial indications are that the residual flooding is largely due to a lack of O&M by the non-Federal sponsor. No changes to the fact sheet are required. The potential scenarios that were discussed are described below.

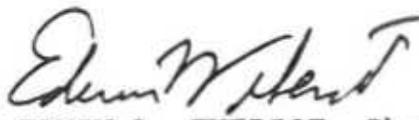
If the preliminary evaluation concludes that the existing project has a design deficiency and further studies are required, a FCSA agreement could be executed once the non-Federal cost-sharing obligations on the existing project have been satisfied.

If the preliminary evaluation concludes that the cause of the residual flooding on the existing project is due to a lack of non-Federal O&M, no further feasibility studies would be warranted and the ongoing preliminary evaluation would be brought to an orderly conclusion. However, the non-Federal sponsor will still have to resolve their outstanding obligation for the existing project.

* d. West Baton Rouge Parish, LA. During Washington-level review of this fact sheet, it was determined that Section 517 of WRDA 1999 does not provide sufficient authority to deviate from the two-phase study process required by WRDA 1986. Therefore, the added funds will be used to expedite completion of the reconnaissance report. The FCSA cannot be executed until the reconnaissance report is certified by HQUSACE or additional Congressional direction or funding is provided. If feasibility studies are conducted, they will be scoped and scheduled for completion in an expeditious manner. The District will ensure that the appropriate Congressional members have been informally notified that the added funds will be used to complete the reconnaissance report, and that PED cannot be initiated until feasibility studies are completed. HQUSACE will make similar informal notifications to the Appropriation Committee staffers. The fact sheet has been revised to reflect the above requirements.

4. Subject to the guidance in paragraph 3, all VTC fact sheets have been concurred in by ASA(CW) and HQUSACE.

2 Encls


EDWIN A. THERIOT, Ph.D
Management Director

CF:

CEMVP-DPM

CEMVR-PM

CEMVS-PM

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CEMVK-PP

CEMVN-DD-P

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CEMVD-MD-D

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CEMVD-MD

CEMVD-LM

SECTION 905(b) ANALYSIS

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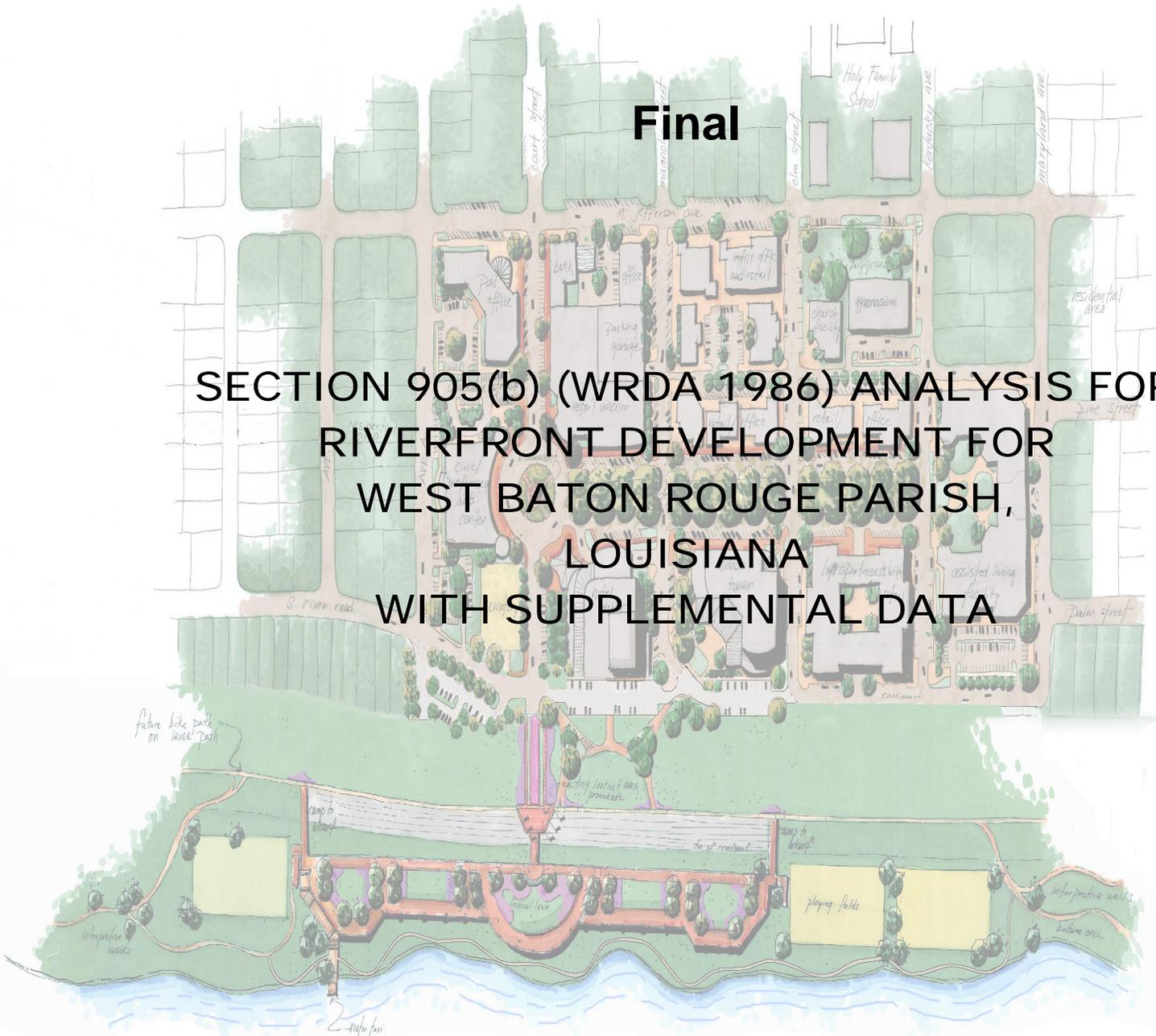
JUSTIFICATION REPORT

SECTION 905(b) ANALYSIS

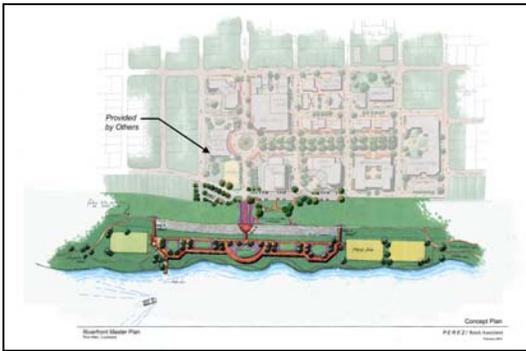
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SECTION 905(b) (WRDA 1986) ANALYSIS FOR
RIVERFRONT DEVELOPMENT FOR
WEST BATON ROUGE PARISH,
LOUISIANA
WITH SUPPLEMENTAL DATA



U.S. Army Corps of Engineers
New Orleans District
New Orleans, Louisiana



March, 2005

Final

**SECTION 905(b) (WRDA 1986) ANALYSIS FOR
RIVERFRONT DEVELOPMENT FOR
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**U.S. Army Corps of Engineers
New Orleans District
New Orleans, Louisiana**

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**SECTION 905(b) ANALYSIS
WEST BATON ROUGE
RIVERFRONT DEVELOPMENT
JUSTIFICATION REPORT**

**SECTION 905(b) ANALYSIS
WEST BATON ROUGE RIVERFRONT DEVELOPMENT
JUSTIFICATION REPORT**

The purpose of this Section 905(b) Analysis is to determine whether continued Federal participation in riverfront development in West Baton Rouge Parish, Louisiana, is warranted.

Corps of Engineers involvement in riverfront development planning in West Baton Rouge Parish began in 1995 with the formation of the West Baton Rouge Riverfront Development Task Force, which included the West Baton Rouge Chamber of Commerce, the City of Port Allen, and the Port of Greater Baton Rouge, as well as other public and private groups. The activities of the task force quickly centered on Port Allen, which is located on the Mississippi River, is the largest city in the parish, has significant riverfront development potentials, and can act as a center from which riverfront development can radiate to the rest of the parish. Maps of West Baton Rouge Parish and Port Allen are contained at the end of this report.

A Planning Assistance to States (PAS) Study was initiated, which led to the production in 1996 of five conceptual design alternatives for the development of Port Allen's riverfront. Congressional authorization was secured through the Water Resources Development Act (WRDA) of 1999 to continue these planning efforts through the development of a justification report, but funding was not available. In 2000, the City of Port Allen and the Corps entered into a PAS agreement to investigate the possibility of constructing a 1,600-foot promenade and river overlook on the levee at Port Allen.

In 2002, the Corps received funding to advance the WRDA '99 directive to pursue a justification report, which was completed in 2003 and is included as an attachment to this 905(b) Analysis. Also in 2002, the City of Port Allen completed a revitalization plan for its old downtown area, which is contiguous to the levee. In 2003, Port Allen successfully applied for TEA-21 funds through the Louisiana Department of Transportation and Development to construct the levee promenade and river overlook, which were completed in mid 2003.

The justification report and the 905(b) analysis were produced through direct Federal appropriations and provide a recommended comprehensive plan for the development of Port Allen's riverfront. The plan contains two parts. A set of recreational features is proposed that would be constructed under Federal authority on the riverside of the levee, including a wharf structure, multiuse recreation areas, playing fields, and bicycle/multipurpose paths that would provide for public access, educational, recreational, and interpretive opportunities. This set of features, along with landside parking, is referred to as the Corps Project. A set of complementary features is recommended for the landside of the levee that would be constructed through private and public investments and that would include such things as street and utility improvements, a hotel, condominiums, apartments, an assisted living facility, retail establishments, offices, and civic buildings. This latter set of features is designated the Port Allen Revitalization Initiative (PARI) to indicate that it is a constituent of Port Allen's downtown revitalization effort. These two sets of features would be joined by the existing levee promenade and river overlook.

This 905(b) Analysis is concerned solely with the features of the proposed Corps Project, which is a stand-alone project that is not dependent on the PARI features. One of the major features of the proposed Corps Project is the bicycle/multipurpose paths, which would incorporate the existing levee promenade and extend to the north to the Highway 190 Bridge and to the south to the Port Allen Lock and the towns of Brusly and Addis, which are located on the river. These linkages would extend riverfront development to a substantial portion of the parish contiguous to the river. Commitment to the Corps Project is indicated by the participation of potential sponsors in the planning effort and the prior acquisition of the levee promenade and river overlook. Beneficiaries of the Corps Project would be the residents of Port Allen, West Baton Rouge Parish, Baton Rouge across the river, the region, and tourists and can be successfully argued as a project with local, regional and national significance.

Although the Corps Project is a stand-alone project, it could serve as a catalyst for the development of the PARI features. Commitment to the revitaliation of the city's downtown area is shown by the participation of the city in the planning effort, the prior acquisition of the levee promenade and river overlook, ongoing land acquisition and clearing, and the recent decision by the city to locate a new municipal building near the levee.

This 905(b) Analysis is structured in keeping with Exhibit G-2 of ER 1105-2-100 and includes sections on study authority, study purpose, location of project/Congressional district, discussion of prior studies and reports, plan formulation, identification of Federal interest, preliminary financial analysis, summary of feasibility study assumptions, feasibility phase milestones, feasibility phase cost estimate, recommendations, potential issues affecting initiation of feasibility phase, views of other resource agencies, and project area maps.

1. STUDY AUTHORITY

The study was authorized through Section 517 of WRDA '99, which states:

The Secretary shall expedite completion of the reports for the following projects and, if justified, proceed directly to project preconstruction, engineering, and design:...(5)Mississippi River, West Baton Rouge Parish, Louisiana Project for waterfront and riverine preservation, restoration, and enhancement modifications.

The restoration component of the authorization relates to the fact that the historic relationship between riverfront communities in West Baton Rouge Parish and the Mississippi River has been broken by Federal construction of the Mississippi River Levee. In addition, the existing levee alignment, which represents a landward setback of the former levee alignment, has resulted in the development of an extensive batture area extending virtually the length of West Baton Rouge Parish. These areas offer the potential for ecosystem restoration and enhancement.

2. STUDY PURPOSE

The primary purpose of the study was to determine whether there is a Federal interest in participating in riverfront development and riverine preservation, restoration, and enhancement in West Baton Rouge Parish. The specific Federal interest emphasized by the study is benefits

that would be generated by recreational features that would be located on the levee and the batture (the land between the levee and the river). Federal interest implies that the National Economic Development (NED) benefits must exceed the project costs for traditional water resource development projects. NED benefits were determined in this study through an economic analysis and the development of a benefit/cost (B/C) ratio in agreement with current regulations and policies. Riverine preservation, restoration, and enhancement benefits do not require a B/C comparison and were considered qualitatively in this analysis. Another major purpose of the study was to determine whether there was a willing and financially capable entity that would serve as the local sponsor for the project and provide the non-Federal cost share, as required. Overall, the major focus of the study was to determine whether riverfront development in West Baton Rouge Parish should proceed to the next phase consistent with the study authority based on preliminary determinations of costs, benefits, engineering considerations, environmental impacts, and local sponsor commitment.

3. LOCATION OF PROJECT/CONGRESSIONAL DISTRICT

The study area is the whole of West Baton Rouge Parish, which is shown on the first map at the end of this report. However, because the Congressional authorization is for a study of riverfront development, the study necessarily concentrates on the portion of the parish fronting the Mississippi River and particularly on the various communities located on the river. West Baton Rouge Parish is located in central Louisiana across the river from Baton Rouge, which is the state capital and is located in East Baton Rouge Parish. The two parishes are connected by the Interstate 10 Bridge on the south and the Highway 190 Bridge on the north. Particular attention is paid to the riverfront of the West Baton Rouge community of Port Allen because it is the largest city in the parish, has a strong historic connection with the river, has significant riverfront development potentials, has already secured some riverfront development features, and can act as a center from which riverfront development can radiate to the rest of the parish. One of the major features of the proposed project is a bicycle/multipurpose path that would extend from Port Allen north to the Highway 190 Bridge and south to the towns of Brusly and Addis. This feature would extend riverfront development to a substantial portion of the parish contiguous to the river and to all of the major communities located along the river.

Congressional representation of the study area is provided by:

- Sen. Mary Landrieu (D)
- Sen. David Vitter (R)
- Rep. Richard Baker (R), Sixth Congressional District

4. DISCUSSION OF PRIOR STUDIES, REPORTS, AND EXISTING WATER PROJECTS

A Riverfront Development Task Force for West Baton Rouge Parish was established in 1995. The task force partnered with the New Orleans District in a PAS study to provide a preliminary determination of opportunities for riverfront development. The resulting report, *Westbank Riverfront Development Studies, West Baton Rouge Parish, Louisiana*, contains five conceptual alternatives with rough costs for riverfront development in Port Allen.

The Westbank riverfront development studies led to the justification report that is the basis for this 905(b) analysis. It also led to a separate PAS study in which the City of Port Allen and the New Orleans District partnered to investigate in detail one of the potential riverfront development features that had been identified in the Westbank studies. This investigation resulted in the report *City of Port Allen, Louisiana, Levee-Top Improvements*, which recommended construction of a river overlook and levee promenade extending 800 feet on both sides of the overlook with ornamental lighting, special paving, benches, interpretive signage, and a levee ramp approach from the main street in Port Allen. These features were completed in 2003 at a cost of \$1.1 million using TEA-21 funds (see photographs on next page). The ramp and overlook provide access from the city to the riverside recreational features that are proposed in the justification report and in this Section 905(b) Analysis, and the promenade on both sides of the overlook provides the initial components of the proposed bicycle/multipurpose paths that would extend north and south of Port Allen.

The *Port Allen Lock Master Plan* was prepared by the New Orleans District in 2002 as a short-term and long-term development plan for the lock properties located immediately south of Port Allen. The plan identifies resource objectives and an overall land and water management plan with associated design and management concepts for the natural and manmade resources on the lock properties. Proposed features for facility development include boardwalks, nature trails, and observation platforms. These features would complement the proposed features for Port Allen and act as an additional attractant for visitors to the area. The lock is intended as one of the destination points of the bicycle/multipurpose path that would extend south from Port Allen. Completion of the proposed features for facility development at the lock would increase the value of the lock as a destination point for the bicycle/multipurpose path.

The 2002 *City of Port Allen Downtown Revitalization Plan* was a community based planning effort that solicited opinions from residents, business leaders, and public officials on their desires for the downtown area of the city and then formulated these desires in terms of an overall plan for revitalization. Port Allen is losing population, and business development has shifted to the outskirts of the city. The consensus of the participants was that the city should rejuvenate its downtown area. The formulated plan recommends modest modifications to structures on two of the city's main streets and redevelopment in the area adjacent to the levee through demolition and land clearing. These processes have already been initiated, and the city plans to construct a new municipal building two blocks from the levee. Land clearing in the redevelopment area provides an opportunity for construction of landside features identified in the justification report as potentials for Port Allen. More importantly from the perspective of the project proposed in this Section 905(b) Analysis, it demonstrates the intention of the city to reestablish its orientation on the river and to use the existing and proposed recreational features as key factors in that reorientation.



River Overlook



Promenade, Batture, and River

5. PLAN FORMULATION

West Baton Rouge Parish is located on the Mississippi River, which is one of the nation's most important Federally maintained navigation channels. Immediately south of Port Allen is the Port of Greater Baton Rouge, which is the head of deepwater navigation on the river. The Port of Greater Baton Rouge is bisected by the Gulf Intracoastal Waterway (GIWW) Alternate, which provides a shortcut to the Mississippi in the vicinity of Baton Rouge from the GIWW in the vicinity of Morgan City, Louisiana. Linkage between the GIWW Alternate and the river is provided by the Port Allen Lock.

The major flood control feature for the parish is the Mississippi River Levee. The levee poses an obstruction for use of the river by parish residents and a perceptual barrier for views of the river, breaking the historic orientation of riverfront communities to the river. This orientation was further reduced by elimination of the need for a ferry between Baton Rouge and Port Allen through the construction of the Mississippi River bridges. The levee and batture provide ideal sites for river-related recreational features. Reestablishing a linkage to the river has been a primary concern of the riverfront communities, and recreational features on the batture and levee are considered to be one of the primary means of reestablishing that linkage. These objectives have been fundamental to riverfront development planning in West Baton Rouge Parish.

a. Identified Problems

(1) Existing Conditions

(a) Social

West Baton Rouge Parish is the smallest parish in Louisiana and is largely rural in character, with the rural areas occupied by agriculture and industry. Sugar cultivation remains the dominant agricultural enterprise. Major industries include petrochemical refining; sugar, flour, and coffee milling; ship building and repair; river and waterway transit; and building materials fabrication. Industry is primarily located in the eastern part of the parish near the Mississippi River. The parish had a population of 21,601 in 2000. Over 80 percent of the population lives in the eastern half of the parish in or near the municipalities of Port Allen, Brusly, and Addis. Although the population of the parish has remained fairly stable, the population of Port Allen has been declining.

(b) Recreation

West Baton Rouge Parish contains 11 parks, two of which are located in Port Allen near the project area: Rivault Park and the West Baton Rouge Community Center. Rivault Park is located in the southern portion of the city, encompasses 13 acres, and contains four ballfields and playground equipment. The West Baton Rouge Community Center is located in the downtown area, encompasses 2.75 acres, and contains a gymnasium, playground with equipment, picnic tables, and two tennis courts. The Port Allen Lock is a popular site, particularly for out-of-state visitors. Access to the Port of Greater Baton Rouge is severely

limited because of security concerns. The only recreational features on the batture and levee are the river overlook and levee promenade.

(c) Climate

The region has a humid, subtropical climate characterized by relatively high rainfall. The annual average temperature is 68° Fahrenheit (F). The monthly average temperature is 54° F in January and 81° F in July. Summers are generally hot and humid. The prevailing winds come from the Gulf of Mexico. Most days in July and August reach temperatures of 90° F or higher. Winters are cool and fairly short. Freezing temperatures seldom last for more than three or four days. Precipitation is fairly frequent and well distributed throughout the year. More than 4 inches of rain normally fall in every month except September and October. The average annual rainfall is about 60 inches.

(d) Soils and Terrain

The eastern portion of West Baton Rouge Parish consists of soils in high and intermediate positions on natural levees of the Mississippi and its distributaries. Silty loam soils are prevalent on the natural levees of the river. These soils are somewhat poorly drained and moderately well suited for urban uses. The Mississippi River levee, which comprises a significant portion of the study area, is made up of dredged and imported fill material.

The slope of the land behind the levee is quite flat – generally less than 1 percent. As is often the case in south Louisiana, the most significant topographic features are the river levees. The top of the levee that forms the barrier between Port Allen and the Mississippi River is about 20 to 25 ft. higher than the terrain on the landside of the levee.

The term batture refers to the land between the river and the levee. Many of the public facilities in the proposed project would be on the batture, including the wharf. The batture at Port Allen can be sizable, averaging about 250 ft. to 350 ft. from the river's edge to the base of the levee. The Mississippi River at Port Allen will experience high (>34 ft. NGVD) and low (<8 ft. NGVD) periods almost every year. During high water conditions, the river will raise enough to completely inundate the batture.

(e) Vegetation and Wildlife

Vegetation in the batture is composed primarily of bottomland hardwoods, including black willow (*Salix nigra*), American sycamore (*Platanus occidentalis*), Eastern cottonwood (*Populus deltoides*), and Chinese tallow (*Sapium sibiricum*). Dominant herbaceous species include lizard's tail (*Saururus cernuus*), alligator weed (*Alternanthera philoxeroides*), *Rubus* sp., *Equisetum* sp., sensitive briar (*Schrankia microphylla*), lance-leaf frog-fruit (*Phyla lanceolata*), ladies eardrop (*Burnnichia cirrhosa*), and pepper-vine (*Ampelopsis arborea*).

Wildlife within the project area is confined primarily to the batture land and occasionally to the agricultural fields on the landside of the levee. Species likely to be present include squirrel; rabbit; opossum; mink; nutria; beaver; white-tailed deer; various song, wading, and game birds; reptiles; and amphibians. Two aquatic species identified as occurring in

West Baton Rouge Parish are listed as Threatened or Endangered by the U.S. Fish and Wildlife Service (Table 1). No Federally listed species inhabiting terrestrial ecosystems are known to occur in West Baton Rouge Parish.

Table 1. Threatened and Endangered Species Occurring in West Baton Rouge Parish, Louisiana

Common Name	Scientific Name	Status
Fat pocketbook mussel	<i>Potamilus capax</i>	Endangered
Pallid sturgeon	<i>Scaphirhynchus albus</i>	Endangered

Source: U.S. Fish and Wildlife Service, 2002.

The fat pocketbook mussel inhabits sand, mud, and fine gravel bottoms of large rivers. It buries itself in these substrates in water ranging in depth from a few inches to eight feet, with only the edge of its shell and its feeding siphons exposed. The fat pocketbook mussel requires a stable, undisturbed habitat for reproduction and a sufficient population of fish hosts to complete the mussel's larval development. Larvae clamp onto a host fish by means of tiny clasping valves. The larvae remain attached until shell formation is complete, after which they detach from the host fish and settle into the streambed. Fat pocketbook mussels may have a lifespan of up to 50 years.

The pallid sturgeon is found primarily in the Missouri and lower Mississippi rivers. In Louisiana, this species was formerly thought to be restricted to the main channel of the Mississippi River. However, recent data indicate that the species also exists in the Atchafalaya River. The pallid sturgeon is one of the most poorly known and infrequently recorded freshwater fishes in North America. Spawning takes place in the spring or early summer. The species apparently prefers the main channels of excessively turbid rivers in areas with strong currents over firm, sandy bottoms.

Existing flora and fauna in the batture area represent species that can easily adapt to the periodic and extended inundations by Mississippi River floodwaters. Most of the more diverse bottomland hardwood environment is found outside of the Mississippi River levee. The opportunities to preserve and expand bottomland hardwoods and wetland areas present in the batture need to be explored in detail.

(f) Cultural Resources

A search of the National Register of Historic Places was performed, and no registered properties were found in the project area.

(g) Hazardous, Toxic and Radioactive Waste

Extensive industrial development has occurred along the lower Mississippi River in the 20th century, and a number of industrial facilities are found near the river in West Baton Rouge Parish. A preliminary analysis of U.S. Environmental Protection Agency (EPA)

databases revealed six industrial sites in the vicinity of the project area. These are all of the industrial facilities in the vicinity of the project area. The facilities are located near the West Baton Rouge Parish riverfront; however, only one facility, the Barry Moore Landfill, is located adjacent to the project area, and it is located away from the proposed wharf structure and walking trails. Maps at the end of Appendix A in the appended report show the location of the Barry Moore Landfill and other nearby HTRW sites.

Company: Barry Moore Landfill
Facility Type: Landfill
Address: Levee Rd at Hwy 190 Bridge
City: Port Allen, Louisiana

Company: Exxon Anchorage Tank Farm
Facility Type: Petroleum Bulk Stations and Terminals
Address: Hwy 1 and 97 3 W
City: Port Allen, Louisiana

Company: Westwego Galvanizing Services
Facility Type: Coating, Engraving, and Allied Services
Address: 3520 S Riverview
City: Port Allen, Louisiana

Company: Plastic Materials
Address: 8600 S Hwy 1
City: Addis, Louisiana

Company: DSM Copolymer Inc.
Facility Type: Synthetic Rubber
Address: 9263 S Hwy 1
City: Addis, Louisiana

Company: Newpark Industrial Disposal
Facility Type: Industrial Organic Chemicals
Address: 2040 Ft FSL 493
City: Addis, Louisiana

A portion of the current Port Allen levee overlies the former municipal area of historic Port Allen. Consequently, the potential exists for the presence of underground storage tanks and other items of HTRW concern under the levee. Analysis of historic maps and a detailed environmental records review could aid in detecting these items.

The riverfront and adjacent properties of West Baton Rouge Parish have been subjected to occasional toxic releases from shipping traffic and/or industrial accidents. A barge breakaway incident in 1997 required action by the Office of Emergency Preparedness.

(h) Vehicular Transportation

Interstate 10 (I-10) is adjacent to the study area and is the most important and heavily traveled highway in the state. On an average day 76,787 vehicles travel across the I-10 Mississippi River Bridge, and 122,900 vehicles per day are forecast for the year 2020. LA 1 is the major north-south corridor in West Baton Rouge Parish and runs parallel to the river throughout the project area.

(i) Waterways

A 45-foot deep navigation channel is maintained in the Mississippi River adjacent to the project area. This channel may be as close as 100-200 feet from the shore of the study area. In addition to the close proximity of oceangoing vessels, currents average four miles per hour in the lower Mississippi River.

(2) Expected Future Conditions

Without the project, it can be expected that the population of the parish will remain relatively stable, the population of Port Allen will continue to decline, additional land will be converted from farmland to industrial uses, and the level of recreational activity will remain stable and largely community based. Although LA 1 is part of the Atchafalaya Trace Heritage Corridor and the Mississippi River Heritage Corridor, there are no state or local plans for additional recreational facilities in the project area. Planning efforts with respect to modest recreational facilities at the Port Allen Lock are ongoing, but no final determinations have been made.

(3) Problems and Opportunities

From a Federal perspective, one of the major problems in West Baton Rouge Parish is deficiencies in the types and quantities of recreational facilities and particularly those that could be enhanced by a strong water feature. The current *Louisiana Statewide Comprehensive Recreation Plan* (SCORP) indicates that deficits exist across virtually all activities in the number and type of facilities needed to support the level of usage that citizens desire. The recreation analysis conducted in conjunction with the justification report indicated a need for bicycle paths, walking paths, picnic tables, playing fields, and bank and pier fishing. The recreation opportunities that would be provided by the proposed project include most of the 10 most popular recreation opportunities participated in by Louisianans.

The existing levee-top improvements in Port Allen are now used by a modest number of people for walking, sitting, visiting, and riding bicycles. However, the current improvements do not constitute a true path for pedestrians or bicyclists, because they run only a short distance and do not link with any destination points. In addition, the riverfront has far greater potential.

Protection of residents in the Mississippi River Valley from the physical and economic effects of the unconstrained overflow of the Mississippi has been achieved through the

establishment by the Corps of Engineers of the Mainline Mississippi River Levee System. An unfortunate byproduct of the levee system has been the severance of the previous direct connection of many communities along the Mississippi River from the river itself. The Mississippi River has historically afforded communities along its banks transportation, economic, aesthetic, environmental, and recreational benefits. The elimination of the direct connection of many communities to the Mississippi has reduced or eliminated these benefits and has also severed the physical connection of many communities to their origin.

In the U.S. in general and the Mississippi River Valley in particular there has been a resurgence in redevelopment efforts along the river. Most communities along the Mississippi River came into existence in the 1800s as steamboat ports or landings. The transition to railroads for freight movement started the deterioration of riverfront communities. Flood control projects such as levees and floodwalls further restricted public access and views of the river. Communities are now anxious to revitalize their downtown areas, and those located on rivers look to riverfront development as a key ingredient in plans to refocus community life on the traditional primary role of water. The heightened degree of interest in riverfronts is illustrated by the fact that \$4.2 billion in long-term projects in need of funding assistance for riverfront development have been identified in the Lower Mississippi River Valley.

Additional recreational features on the batture and levee would reestablish the lost association between riverfront communities and the river in West Baton Rouge Parish. The existence of these facilities would increase visitation and therefore contribute to the economic development of the parish. If the facilities were able to act as a catalyst for the development of landside features, the economic impact on the parish would be dramatic.

Leveeing of the Mississippi River in West Baton Rouge Parish has also transformed a formerly typical southern bottomland hardwood environment into an area inhabited by only the most flood-tolerant fauna and flora. The reestablishment of a broader scale of bottomland hardwood species would provide both recreational and environmental benefits and should be explored.

b. Alternative Plans

Planning for riverfront development in West Baton Rouge Parish was conducted through extensive discussions that included the New Orleans District, potential project sponsors, other stakeholders, and the general public. The general consensus among the participants was that the planning effort should be directed toward a set of features that would: (1) increase opportunities for public access to the Mississippi River; (2) increase recreational opportunities in the study area; (3) improve environmental conditions and preserve and enhance the historical and cultural characteristics of the study area; (4) provide appropriate infrastructure; and (5) strengthen the economic value of the riverfront.

The planning objectives led to the development of four conceptual design alternatives for riverfront development that included riverside features that could be constructed under Federal authority and landside features that might be constructed through private and other public sources. The landside features included such things as a hotel, apartments, an assisted living

facility, condominiums, townhomes, restaurants, offices, civic buildings, an entertainment complex, a water taxi, and a riverboat. The various alternatives advanced different mixes and locations for these elements.

With respect to the riverside features, Alternative A proposed a wharf structure/plaza, open green space, interpretive trails, an overlook, terraces, parking, entry road improvements, and lighting. Alternative B proposed a bulkhead structure, a riverfront promenade, a riverboat landing, interpretive trails, lawn areas, parking, entry road improvements, and lighting. Alternative C proposed a wharf structure/plaza, a batture trail, green space, entry road improvements, and lighting. Alternative D proposed a wharf structure/plaza, batture trail, green space, entry road improvements, and lighting.

All of the riverside alternatives shared in common a central wharf structure in Port Allen; open green spaces and trails that would be suitable for recreational activities and festivals and that would include interpretation, landscaping, and day-use facilities; and bicycle and pedestrian paths that would extend to the north and south of Port Allen. Variations in the riverside alternatives were largely in the placement and configuration of similar features. Consequently, costs and environmental impacts were expected to be fairly similar, with participants expressing a desire for a mixture of specific features from alternatives A and C. These features were assimilated into a design schematic that was reviewed with the Engineering Division of the New Orleans District and resulted in a schematic depiction of the preferred alternative.

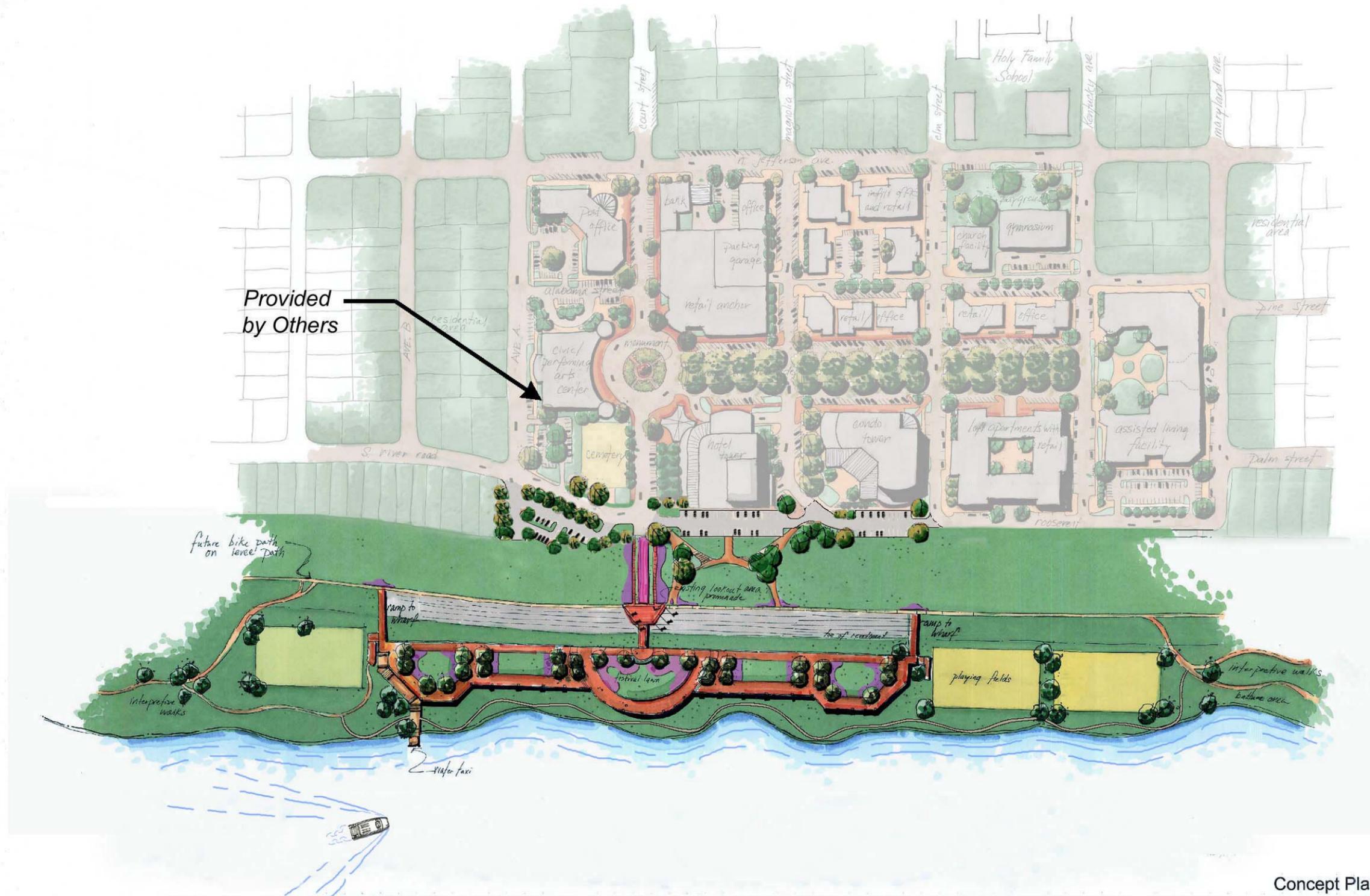
Corps of Engineers regulations on construction on the batture and levee were determinative with respect to the selection of the preferred alternative. These regulations include: (1) a prohibition on driving piles closer than five feet of the landside levee toe or 40 feet of the flood side levee toe and no closer than 50 feet from top of bank; (2) no structures to be located on the Mississippi levee slopes or crown; (3) fill on the batture must not exceed one foot in thickness; (4) no penetrations of the levee slope or crown; and (5) utilities are to be placed above the authorized design levee section. In addition, for facility user and navigation safety, it was determined that the wharf should not extend out into the river.

The features of the preferred alternative are shown in Figure 1. The illustration emphasizes the recreational features and landside parking that would be constructed under Federal authority, but also includes the landside features that might be developed through private and other public initiatives. The illustration shows the linkage between the riverside and landside elements constituted by the existing levee-top improvements and suggests how the riverside recreational features might serve as a catalyst for landside development.

The proposed project features are as follows:

(1) Wharf Structure

The wharf structure will be constructed on pilings. It will be approximately 153,000 square feet. The structure will support several features: lawn areas, walkways, planters, and a water taxi landing. Three pedestrian bridges will be needed, one near the foot of Court Street and one at either end of the wharf structure.



Provided
by Others

Figure 1. Concept Plan

The wharf structure will be the focal point of the Corps project at West Baton Rouge Parish. The wharf structure will provide a platform for viewing the Mississippi River and the skyline of downtown Baton Rouge, access to the Mississippi River, a venue for festivals, and a landing for watercraft such as passenger ferries.

(2) Multiuse Recreation Areas

The multiuse recreation areas are located primarily on the bature, north and south of the wharf. The centerpiece of the areas would be the walking/interpretive trails, which would be two and a half miles of asphalt-surfaced pathways and raised boardwalk. The recreation areas would also feature facilities for day campers, including picnic tables, grills, and appropriate landscaping.

(3) Playing Fields

Three playing fields would be built on the bature. The fields would be graded and leveled and are intended to satisfy multiuse recreation needs in general.

(4) Bicycle/Multipurpose Paths

The levee-top and community bicycle and pedestrian routes would be located on top of the Mississippi River Levee and next to roads. These paths would be generally 10 feet wide and paved with asphalt. The total length would be approximately 12.5 miles. The bicycle/multipurpose paths would extend to the Highway 190 Bridge to the north, the Port Allen Lock to the south, and from the south side of the Port Allen Lock to the Brusly/Addis area.

c. Preliminary Evaluation of Alternatives

In the light of the selection of a preferred alternative based on regulatory and safety considerations, an extensive evaluation of the preferred alternative was prepared and is described in the following paragraphs.

(1) Environmental Impacts

A preliminary environmental investigation indicates there are no major environmental impacts associated with project features in the study area. A comprehensive investigation will need to be performed under the Endangered Species Act and coordinated with the Fish and Wildlife Service (USFWS) and other appropriate agencies.

Prior to any land acquisition, it is recommended that the site be inspected under the guidelines set forth in the American Society for Testing and Materials (ASTM), Standard Practice for Environmental Assessments: Phase I Environmental Assessment Process, as applicable. Phase I site assessments are conducted by visually and physically inspecting the site to form an opinion as to the presence of HTRW. If the Phase I assessment indicates there is a potential concern, or if a higher level of confidence is required, physical sampling and laboratory analysis would be required.

Based upon available data, the proposed project will enhance the environmental, recreational, historical, and cultural resources of the area. The project will comply with Section 106 of the National Historic Preservation Act. The National Register of Historic Places lists several sites in the portion of the parish fronting the Mississippi River and particularly in the riverfront communities as worthy of preservation. None of these sites are within the project area.

(2) Navigation Impacts

There is commercial river traffic adjacent to the area. Tugboat pilots currently use the river adjacent to the study area to arrange their barge fleets. This activity is in tension with the proposed wharf structure. In the feasibility phase, modifications of current river usage patterns in the vicinity of the wharf structure and/or modification of design features will need to be addressed.

The impacts of the project on commercial navigation will need to be addressed as the project features are further developed. Any altering of the river's edge with respect to such things as the water taxi landing and protective dolphins will need to be analyzed in terms of its effects on navigation patterns. The project will require authorization in accordance with Section 10 of the Rivers and Harbor Act of 1899.

(3) Real Estate

The non-federal sponsor will be required to acquire all lands, easements, and rights-of-way required for the construction, operation, and maintenance of the project. The Corps Real Estate Division will prepare a Real Estate Plan (REP) during the next phase of study. The REP will address land classification types, types of estates required, gross estimate of acreage and land value, facility and utility relocations, and Public Law 91-646 requirements. The Real Estate Division has not performed any reconnaissance level investigations for this report. The land value estimate of \$10,000 is not based on appraisal principles. Estimated costs for real estate will need to be refined during the next study phase. It is expected that the non-federal sponsor will seek credit for the land value of the sponsor-owned property that will be required for the project. The estimate presented here should not be used by the non-federal sponsor to determine future funding requirements for the construction phase.

(4) Cost Estimate

A preliminary cost estimate was prepared as part of the master plan. The total cost of the proposed Corps Project at the current pricing level is \$21,565,756, including a wharf structure on piles located entirely on batture lands. These estimates are based upon very conceptual information. A 10 percent Engineering and Design Cost, an 8 percent Supervision and Administration Cost, a 20 percent contingency estimate, interest during construction, major replacements, and operation and maintenance costs are included in the cost estimates. When these costs are discounted at 5-5/8 percent for a 50-year project life, an annual equivalent cost of \$2,231,381 is produced.

(5) Benefits

The economic value of the increased recreational opportunities and participation in those opportunities created by the project was made for the 50-year life of the project. Since there is a significant deficit in outdoor recreation opportunities in the Baton Rouge area, participation was assumed to equal capacity. The value per unit of recreation was based on a standardized Corps of Engineers measure of willingness to pay for the recreational opportunities created.

Average annual benefits are estimated to be \$5,068,265. These benefits are attributable to general recreation benefits. There are also \$787,803 of incidental recreation benefits (benefits to those using the recreational facilities but not actually participating in the recreational opportunities), which are not considered in the benefit/cost ratio. Dividing the average annual equivalent project benefits of \$5,068,265 by the average annual project costs of \$2,231,381 results in a benefit/cost ratio of 2.3 to 1.

The project would reopen access to the Mississippi River and bature areas for active and passive recreational, water transportation, and environmental viewing pursuits. The NED benefits associated with the project are recreational and quality-of-life benefits resulting from active and passive use of the project features.

6. FEDERAL INTEREST

The economic analysis conducted as part the justification report identified National Economic Development (NED) benefits that substantially exceed the cost of construction and operation and maintenance of the recommended facilities. The NED benefits are from recreational opportunities and the public's willingness to pay for those opportunities. Since recreational benefits are recognized as viable NED benefits, there is a Federal interest in conducting a feasibility study to advance the development of the project.

7. PRELIMINARY FINANCIAL ANALYSIS

The potential local sponsors for any future work include, but are not limited to, the City of Port Allen and West Baton Rouge Parish. The City and Parish have participated with the New Orleans District on the existing levee-top projects, and the City and Parish intend to enter into a FCSA with the Corps of Engineers.

8. SUMMARY OF FEASIBILITY STUDY ASSUMPTIONS

In developing the tasks, budget, and schedule for the Feasibility Study, the following assumptions were made:

- Public involvement would be achieved through continuing public meetings.
- A real estate evaluation will be conducted to determine the necessary rights and costs associated with acquiring rights-of-way for this project.

- Consideration for hydrodynamic sediment transport studies and safety concerns will be included.

- The study will comply with the Clean Water Act, as amended. A NEPA document will be prepared, as appropriate, to address any proposed action.

- Additional HTRW surveys will be conducted to update existing data and to access areas of interest not previously studied.

- The selected plan will consider maintaining the value of the existing levee-top bicycle route.

9. FEASIBILITY PHASE MILESTONES

In order to move into the feasibility phase of study, the following steps will be required:

- Justification report approval
- Development of a detailed Project Management Plan/Plan of Study
- Signing of a FCSA

Table 2 shows the milestones and the duration of each in a typical feasibility study. As indicated, a feasibility study for a project such as West Baton Rouge Riverfront Development can be expected to take approximately 36 months from initiation to project authorization. A detailed schedule will be developed in the Project Management Plan (PMP).

10. FEASIBILITY PHASE COST ESTIMATE

The preliminary estimate of the cost of the feasibility study is \$775,000. A detailed cost estimate will be developed in the Project Management Plan.

11. CONCLUSIONS

The West Baton Rouge Riverfront Development Study indicates that the recommended plan is strongly supported at various levels, as evidenced by recently completed interim construction, and can be constructed at a cost of \$21.6 million. These improvements are anticipated to produce average annual national economic development (NED) benefits of about \$5.1 million, resulting in a B/C ratio of greater than 2.3 to 1. This reported B/C ratio is based upon recreational benefits alone and warrants future Federal participation. Additional benefits (quality of life, regional, and local) significantly add to the overwhelming support for this project.

Table 2. Typical Milestones and Durations

Milestone	Description	Duration (mo)	Cumulative (mo)
F1	Initiate Study	0	0
F4	Kick off meeting	1	1
F5	Initiate Plan Formulation	2	3
F6	Public Meeting	1	4
F7	Complete Plan Formulation	4	8
F8	Select NED Plan	1	9
F9	Engineering Design	4	13
F10	Submit Draft Feasibility Report	1	14
F11	MVD Review	1	15
F12	Submit Draft EA to Public	1	18
F13	Final Report to MVD	0	18

This report recognizes that projects based solely on recreational benefits currently receive a low priority by the administration when compared to flood control, ecosystem restoration, and navigation improvements. Since recreational benefits are recognized as an NED category, and given the fact that the recommended plan under this West Baton Rouge Riverfront Development Study produces a healthy B/C ratio, it is recommended that a Feasibility Cost Sharing Agreement (FCSA) be pursued and negotiated with the potential non-Federal Sponsor. The preliminary cost estimate to perform the feasibility study is \$775,000, and the duration is approximately 18 months.

The proposed project offers an excellent opportunity for the Corps of Engineers to utilize its expertise to reestablish the social and economic connections of riverfront communities by providing public access back to the Mississippi River and capitalizing on recreational, educational, and interpretive opportunities. The benefits to the community, the region, and the Nation would be significant.

12. POTENTIAL ISSUES AFFECTING INITIATION OF FEASIBILITY PHASE

There are no apparent issues at this time that would prevent the execution of the FCSA.

The schedule for signing the FCSA is March 2005. Based on the schedule of milestones in paragraph 9, completion of the feasibility report would occur in September 2006, with potential Congressional authorization in WRDA 2007.

13. VIEWS OF OTHER RESOURCE AGENCIES

As the master plan is further developed, the views of other resource agencies will be solicited. These will include:

- Louisiana Department of Transportation and Development
- Louisiana Department of Natural Resources
- U.S. Coast Guard
- Pilots Association
- Atchafalaya Basin Levee District
- Land Owners
- U.S. Fish and Wildlife Service
- USGS
- Louisiana Department of Wildlife and Fisheries

14. PROJECT AREA MAPS

Maps (figures 2 and 3) of the project area appear on the following pages.



Figure 2. Study Area

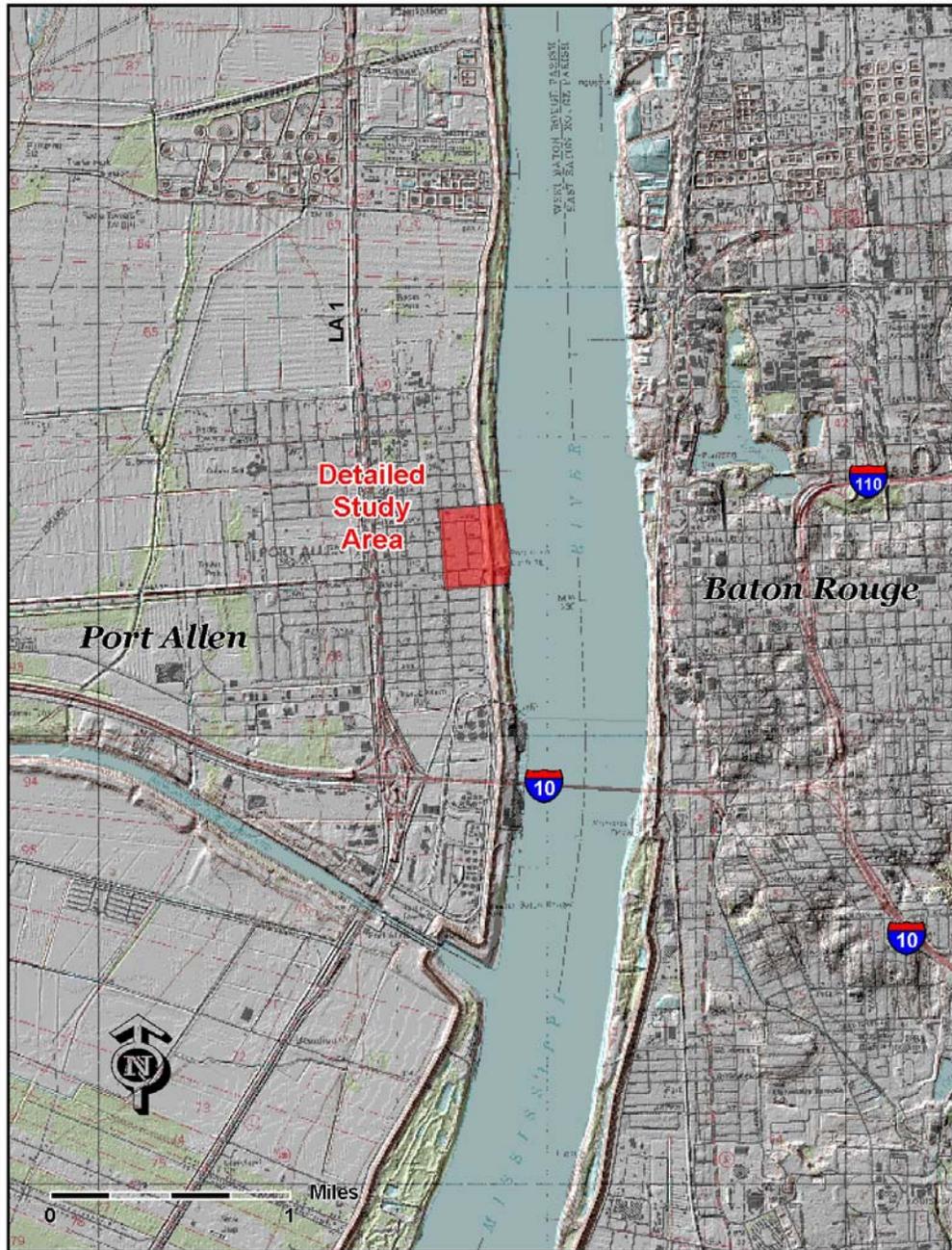
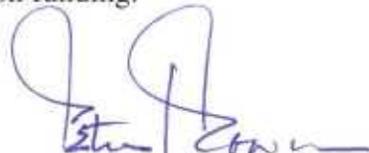


Figure 3. Detailed Study Area

15. RECOMMENDATIONS

After review of the proposed plans for the West Baton Rouge Riverfront Development, West Baton Rouge Parish, Louisiana, I do not recommend that the study continue into the feasibility stage. The proposed plan for development would be solely a recreation-based project. The plan for recreational development is, in and of itself, economically justified based upon NED recreational benefits yielding a benefit to cost ratio of 2.3. However, there are no other identified purposes, such as flood control, navigation, and/or environmental restoration associated with the plan. Current Army and budgetary policies only prescribe recreation-based development when other purposes such as navigation, flood control, and/or environmental restoration have been identified and are economically justified. The current administration of the Corps of Engineers places recreation-based projects at a much lower funding priority than flood control, navigation, and environmental restoration projects. It is recommended that the City of Port Allen, the local sponsor, pursue alternative funding and development of any of the five major elements of the recommended plan. I have included a Draft Feasibility Cost Sharing Agreement (FCSA) and Project Management Plan (PMP) to advance the project given that Congressional funds were added in the FY 2005 Energy and Water Development Appropriations Act. This will allow the project to proceed in accordance with the Video Teleconference (VTC) guidance dated 30 May 2003.

The recommendations contained herein reflect the information available at this time and current Departmental policies governing formulation of individual projects. They do not reflect programming and budgeting priorities inherent in the formulation of a National Civil Works construction program or the perspective of higher level review within the Executive Branch. Consequently, the recommendations may be modified by the Assistant Secretary of the Army prior to approval and/or implementation funding.



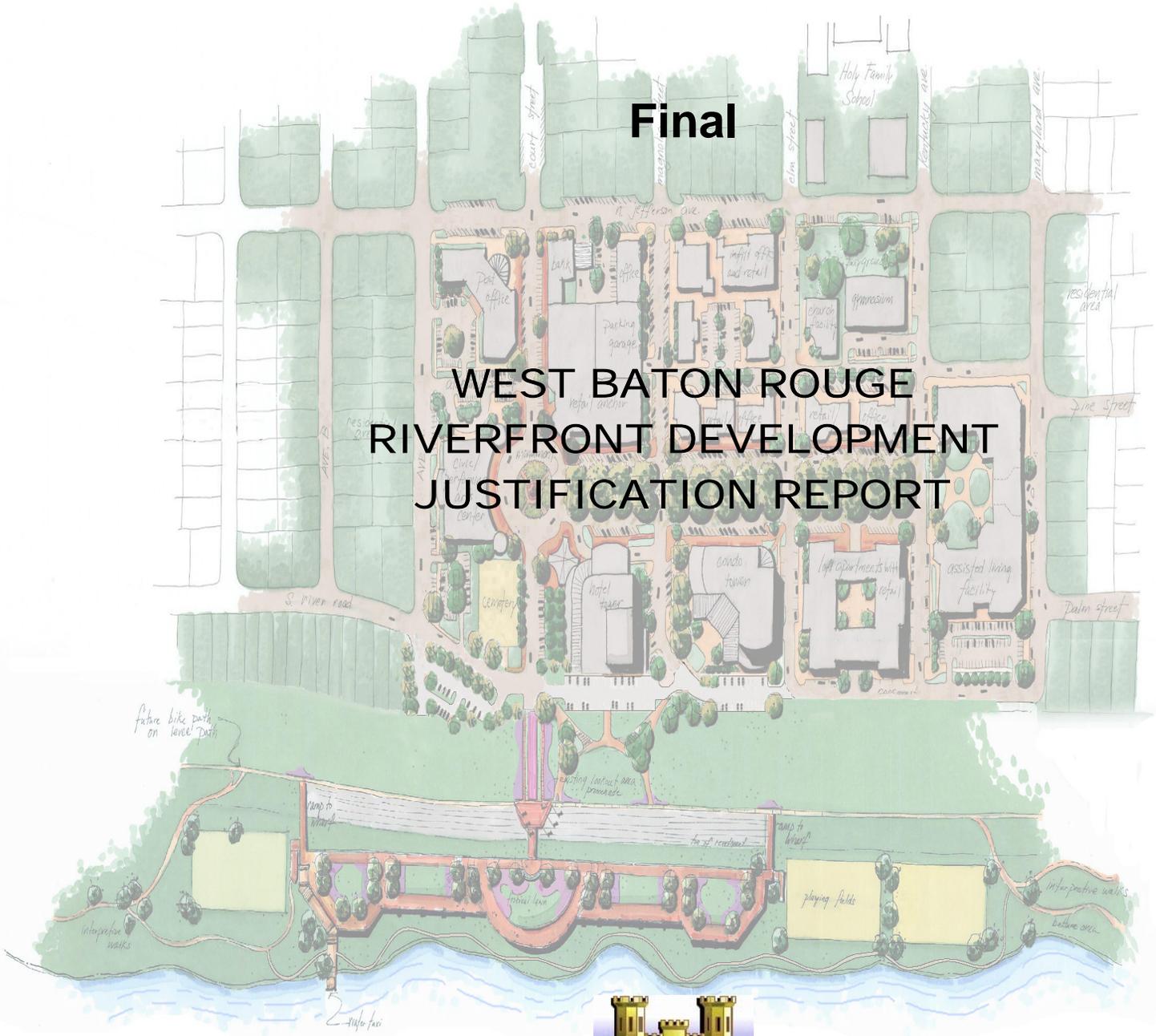
Peter J. Rowan
Colonel, U.S. Army
District Engineer

JUSTIFICATION REPORT
[Supplemental Data to 905(b)]

April 2004

Final

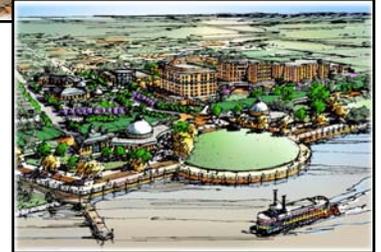
WEST BATON ROUGE
RIVERFRONT DEVELOPMENT
JUSTIFICATION REPORT



U.S. Army Corps of Engineers
New Orleans District
New Orleans, Louisiana



April 22, 2004



Final

Contract No. DACW29-00-D-0001
Delivery Order No. 0036
GEC Project No. 22316636

WEST BATON ROUGE RIVERFRONT DEVELOPMENT JUSTIFICATION REPORT

Prepared for

U.S. Army Corps of Engineers
New Orleans District
New Orleans, Louisiana

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EXECUTIVE SUMMARY

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A. PROJECT AUTHORITY AND PURPOSE

The West Baton Rouge Riverfront Development Justification Report was authorized through the Water Resources Development Act of 1999 (WRDA '99), Section 517, "Expedited Consideration of Certain Projects." Section 517 states:

*The Secretary shall expedite completion of the reports for the following projects and, if justified, proceed directly to project preconstruction, engineering, and design: . . .
(5) Mississippi River, West Baton Rouge Parish, Louisiana. Project for waterfront and riverine preservation, restoration, and enhancement modifications.*

The purpose of this study is to determine if riverine preservation, restoration, and enhancement modifications are justified in West Baton Rouge Parish. The study will include the formulation of development alternatives on the Port Allen riverfront. A recommended plan shall be analyzed for constraints and opportunities. This plan will then be used to conduct a feasibility analysis of identified waterfront development opportunities and a more comprehensive evaluation of riverine preservation, restoration, and enhancement modifications for construction that will be consistent with all necessary U.S. Army Corps of Engineers (USACE) regulations and policies such as ER 1110-2-1150, ER 1105-2-100, and ER 5-7-1.

The proposed plan under this initial study shall be one that is economically feasible based on NED benefits and supported by the people of West Baton Rouge Parish and Port Allen. The plan, upon implementation, is primarily focused on providing NED recreation benefits, and will also yield quality of life benefits to those living in and visiting West Baton Rouge Parish.

B. DESCRIPTION OF STUDY PROCESS

This study began with an inventory and analysis of onsite and offsite conditions in the regional (West Baton Rouge Parish/Greater Baton Rouge) and local (Downtown Port Allen) context. Past planning and development initiatives in Port Allen and Baton Rouge were reviewed. A variety of riverfronts and waterfronts around the country were analyzed in terms of the primary design principles that guided their development.

A facilities program for Port Allen's riverfront was formulated based on site opportunities and limitations identified in the initial phase and findings from previous studies. Site design alternatives were developed on the basis of the facilities program. The alternatives were presented to the local sponsor (the West Baton Rouge Riverfront Development Task Force) and to the general public to establish consensus in support of a final concept plan.

Following completion of a final concept plan, cost estimates for project construction were generated. The economic benefits derived from the proposed facilities were compared to development and operational costs to determine the economic feasibility of the project.

C. DESCRIPTION OF RECOMMENDED PLAN

In the early stages of the planning process, several conceptual alternatives were presented to the potential local sponsors, stakeholders, general public, and USACE representatives. Each of these alternatives consisted of the conceptual layout of the features of a Corps Project and a conceptual layout of the features of a Port Allen Riverfront Initiative (PARI). The result was a Comprehensive Plan that features a wharf structure extending from the levee to the river, with the entrance to the wharf on axis with Court Street. A hotel, condominiums, apartments, an assisted living facility, retail, offices, public services, and a performing arts center are proposed for the landside of the levee.

From the conceptual alternatives came the eventual Comprehensive Plan. The primary element of the Comprehensive Plan is the proposed Corps Project, which concentrates on development on the levee top and on the river side of the levee. A wharf structure is the centerpiece of the design for the Corps Project. Except for parking, the development of areas on the landside of the levee are part of the Port Allen Riverfront Initiative (PARI). It is expected that the Corps Project will provide benefits that will act as a catalyst for private initiative for PARI.

The total estimated capital cost of the recommended Corps Project is \$21,565,756, inclusive of contingencies, design and management fees. The average annual cost for a 50-year project life is estimated to be \$2,231,381. Construction costs for PARI are estimated at \$171.95 million. PARI elements are to be developed by others.

D. IMPACTS/BENEFITS

Riverfront development in West Baton Rouge Parish will create significant recreational, educational, and quality-of-life benefits to residents of West Baton Rouge Parish, the Baton Rouge Urban area, and out-of-region visitors. Riverfront development will accomplish a number of objectives, including: (1) provide new recreational opportunities to West Baton Rouge and other area residents; (2) establish a new town center for the City of Port Allen; (3) reestablish an important historic connection to the Mississippi River for West Baton Rouge Parish and points west; (4) provide an important connection to the Baton Rouge Riverfront and urban area; and (5) reestablish the growth of residential and commercial development in the City of Port Allen.

Using *Unit Day Values for Recreation, Fiscal Year 2003*, average annual recreation benefits were averaged at \$5,068,265 for a 50-year project life. Average annual equivalent costs for development and operation and maintenance of the project are \$2,231,381. Dividing average annual equivalent project benefits by average annual equivalent project costs results in a benefit/cost (B/C) ratio of 2.3 to 1. There would be additional, incidental, recreational benefits amounting to \$787,803 accruing as a benefit to employees and patrons of the induced development, which are not counted in the B/C ratio.

The cost of construction of the Corps Project on the levee top and river bature and landside parking is expected to total \$21.57 million. Construction of the Corps Project is expected to generate \$28.71 million in business volume, \$9.27 million in personal income, and 278 jobs. These are one-time construction costs and would occur over the entire construction period and

not in any one year. The operation and maintenance of the Corps Project is projected to generate \$799,000 in business volume, \$430,000 in personal income, and 13 jobs. Unlike construction impacts that occur only during the construction phase, these impacts will recur annually as long as the project is in operation.

The \$193.52 million in public and private construction should generate total construction impacts of an increase of \$256.7 million in business volume, \$75.5 million in personal income, and 2,328 jobs. There is expected to be an annual impact (annual sales/revenue) of \$43.9 million. This annual direct business impact is expected to generate total annual economic impacts of \$42.29 million in business volume, \$17.19 million in personal income, and 733 jobs.

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JUSTIFICATION REPORT

I. INTRODUCTION

This document contains a plan of development for the riverfront at Port Allen, Louisiana, as a focal point for the development of West Baton Rouge Parish. The plan (referred to throughout the document as the Comprehensive Plan) contains two parts: (1) a set of recreational features that would be constructed under Federal authority primarily on the river side of the levee, including a pier, playing fields, bike paths, nature trails, and signage (referred to throughout this document as the Corps Project); and (2) a set of complementary features primarily on the land side of the levee that would be constructed through private and public investments (referred to throughout this document as the Port Allen Revitalization Initiative or PARI). The linkage between these two sets of features is an existing promenade and overlook spanning the levee that was constructed under Federal authority. The document contains a National Economic Development (NED) analysis of the Corps Project.

This plan of development is the result of a series of cooperative endeavors between the Corps of Engineers and various public and private groups in West Baton Rouge Parish beginning in 1995. Planning Assistance to States (PAS) studies were conducted that produced a riverfront development plan for West Baton Rouge Parish and eventually led to construction of the levee promenade and overlook at Port Allen and the initiation of the present study as part of the West Baton Rouge Parish riverfront development efforts.

Port Allen was chosen as the focal point for the present study because it is the largest city in the parish and has significant riverfront development potentials. The Corps project is intended as an initial step in the development of West Baton Rouge Parish. The proposed bike paths would provide linkages to the Port of Greater Baton Rouge and to riverfront communities to the north and south.

Emphasis in this document is on the Corps Project, which is a stand-alone effort. However, the document contains sufficient information to indicate how the Corps Project might serve as a catalyst for the development of Port Allen and West Baton Rouge Parish.

A. AUTHORITY

The West Baton Rouge Riverfront Development Justification Report was authorized through the Water Resources Development Act of 1999 (WRDA '99), Section 517, "Expedited Consideration of Certain Projects." Section 517 states:

The Secretary shall expedite completion of the reports for the following projects and, if justified, proceed directly to project preconstruction, engineering, and design: . . .
(5) Mississippi River, West Baton Rouge Parish, Louisiana. Project for waterfront and riverine preservation, restoration, and enhancement modifications.

B. STUDY PURPOSE

The purpose of this study is to determine if riverine preservation, restoration, and enhancement modifications are justified in West Baton Rouge Parish. This study concentrates on Port Allen as a focal point for new riverside development in the parish because Port Allen (1) is the largest municipality, containing 25 percent of the parish's population; (2) is centrally located; (3) has a large bature area; (4) has begun to acquire some property adjacent to the river; (5) is directly across the Mississippi River from the capital of Louisiana; (6) is very close to Interstate 10; and (7) has existing infrastructure that could make it attractive for development. The study addresses linkages to the towns of Brusly and Addis, which are potential destination points that would be connected to Port Allen through a system of trails and pathways. Connections to Highway 190 and beyond into the northern area of the parish are also explored, which would entail linkages with places such as Poplar Grove Plantation, Lobdell, and Smithfield.

The study is designed to include the formulation of development alternatives on the river side of the levee (Corps Project) and on the land side of the levee (PARI). The Corps of Engineers is only responsible for the development of features on or in direct support of the levee-top and riverside developments that would lead to public access, recreation, preservation, and enhancement. The Corps Project will have independent utility and be economically justified as a stand-alone project. In this phase of the study, the project focuses on elements that produce economic benefit such as a riverfront structure, playing fields, bicycle trails and walking trails. Although recreational features extend to Brusly and Addis, the focus of this phase of the study is Port Allen because of its proximity to the population of the City of Baton Rouge and Interstate 10. Future studies will more clearly define recreational features in Brusly and Addis as well as environmental enhancement and riverine preservation elements.

Upon determining a recommended plan, it shall be analyzed to determine if a Federal interest exists for the Corps Project. This report does not address the feasibility of landside development by others, although it does contain a Regional Economic Development analysis to indicate how implementation of both portions of the plan would impact the economy of West Baton Rouge Parish. This plan will ultimately be used to conduct a feasibility analysis for the Corps portion consistent with all U.S. Army Corps of Engineers regulations and policies.

The proposed plan under this initial study shall be one that is economically feasible based on NED benefits and supported by the people of West Baton Rouge Parish and Port Allen. The plan will provide NED recreation benefits and will also yield quality of life benefits for those living in or visiting West Baton Rouge Parish. These issues are stated in the Mission Statement for the West Baton Rouge Riverfront Development:

It is the mission of the West Baton Rouge Riverfront Development Task Force to promote increased understanding, appropriate use, responsive development and sustained environmental management of the Mississippi River's edge and its associated land and resources. Among the intended purposes which the Task Force foresees for this enhanced cultural, visual and natural landscape are economic development, flood control, maritime, transportation, tourism, recreation, open space, conservation, preservation, education, and interpretation for the benefit of this and future generations.

This study represents a continuation of previous and existing cooperative efforts between the Corps of Engineers and the potential local sponsors and other interested parties to improve the access, use, and understanding of the riverfront in West Baton Rouge Parish.

C. STUDY PROCESS

This study began with an inventory and analysis of onsite and offsite conditions in the regional (West Baton Rouge Parish/Greater Baton Rouge) context. The riverfront at Port Allen was chosen as the hub or center of development due to a number of factors. Past planning and development initiatives for West Baton Rouge, Port Allen, and the City of Baton Rouge were reviewed. A variety of riverfronts and waterfronts around the country were analyzed in terms of design principles that guided their development.

A facilities program for Port Allen's riverfront was formulated based on site opportunities and limitations identified in the initial phase and findings from previous studies. Site design alternatives were developed on the basis of the facilities program. The alternatives were presented to potential local sponsors and to the general public to establish consensus in support of a final concept plan.

The Comprehensive Plan considered potential environmental roadblocks throughout the planning process. Biological and cultural resources, HTRW concerns, and land use analysis were factored into the preferred alternative. Following completion of a final concept plan, cost estimates for plan construction were generated. The economic benefits derived from the proposed facilities were compared to development and operational costs to determine the economic feasibility of the Corps portion of the plan.

D. STUDY GOALS

The purpose of this study is to determine if riverine preservation, restoration, and enhancement modifications are justified in West Baton Rouge Parish (WRDA '99). Two study goals were established in order to fulfill the study's purpose:

- Development of a concept plan that will promote public access and recreation and significantly enhance the physical and perceptual characteristics of the Mississippi River within West Baton Rouge Parish.
- Develop a concept plan that is complementary to the ongoing and future efforts of others.

E. PARTICIPATION

The study was completed by a team of potential local sponsors, recreation planners, landscape architects, engineers, economists, and developers; Federal and local governmental representatives; and members of the local population who were identified as stakeholders.

The potential local sponsors and U.S. Army Corps of Engineers representatives participated in several meetings with the design team between May 2002 and February 2003. Meetings were held generally once every month to track progress and provide input and guidance to the design team. Potential local sponsors consisted of West Baton Rouge Parish, the City of Port Allen, and the Port of Greater Baton Rouge, which formed a West Baton Rouge Riverfront Development Task Force. The USACE team consisted of members from project management, engineering, economics, and outdoor recreation planning. In addition, the Corps of Engineers and the local sponsor have collaborated for a number of years on efforts that have culminated in the construction of the existing levee-top improvements at Port Allen through the TEA-21 Program, FHWA, and Louisiana Department of Transportation and Development (LaDOTD).

F. STUDY AREA

The study area is constituted by West Baton Rouge Parish. West Baton Rouge Parish lies on the west bank of the Mississippi River in southeastern Louisiana. The Port of Greater Baton Rouge and the towns of Brusly and Addis are located south of Port Allen along the Mississippi River (Figure 1). The study focuses on the riverfront at the City of Port Allen (Figure 2). Port Allen is the largest city and parish seat and is located directly across from downtown Baton Rouge. Most of the development features recommended in this report will be in the vicinity of the Court Street corridor and the Old Ferry Landing (Figure 3).

G. WEST BATON ROUGE PARISH AND PORT ALLEN

1. History

The area presently occupied by West Baton Rouge Parish was first explored in the late 1600s by Pierre d'Iberville. Iberville was sent by the French government to lead an expedition to rediscover the mouth of the Mississippi River. Land in the vicinity of the parish was then inhabited by the Bayagoula tribe of Native Americans, then at war with the neighboring Houmas. A truce between the tribes was established the following year, paving the way for French colonization of the territory. Ancient Indian mounds still exist in some areas.

Land grants were first issued to private individuals in Louisiana in 1717. The area encompassed by present-day West Baton Rouge Parish was granted to Paris Duvernay, who sent workmen to clear and colonize the land, which consisted of forested river bottoms and natural levees. The Louisiana Territory west of the Mississippi was ceded to Spain in 1762. Shortly after assuming control of the territory, the Spanish colonial government authorized the settlement of the Mississippi River and its distributaries by Acadian refugees, newly displaced from their homeland in Nova Scotia. Present-day West Baton Rouge Parish was almost entirely settled by Acadians during this period.

The new settlers immediately began to clear the land and produce crops. Frequent floods were a constant danger to crop production, and the colonial government required all landholders to build and maintain riverfront levees. Indigo was the first crop grown in West Baton Rouge Parish, but a crop failure in 1793 forced planters to attempt the cultivation of sugarcane, which subsequently dominated parish agricultural enterprises.



Figure 1. West Baton Rouge Parish, Louisiana

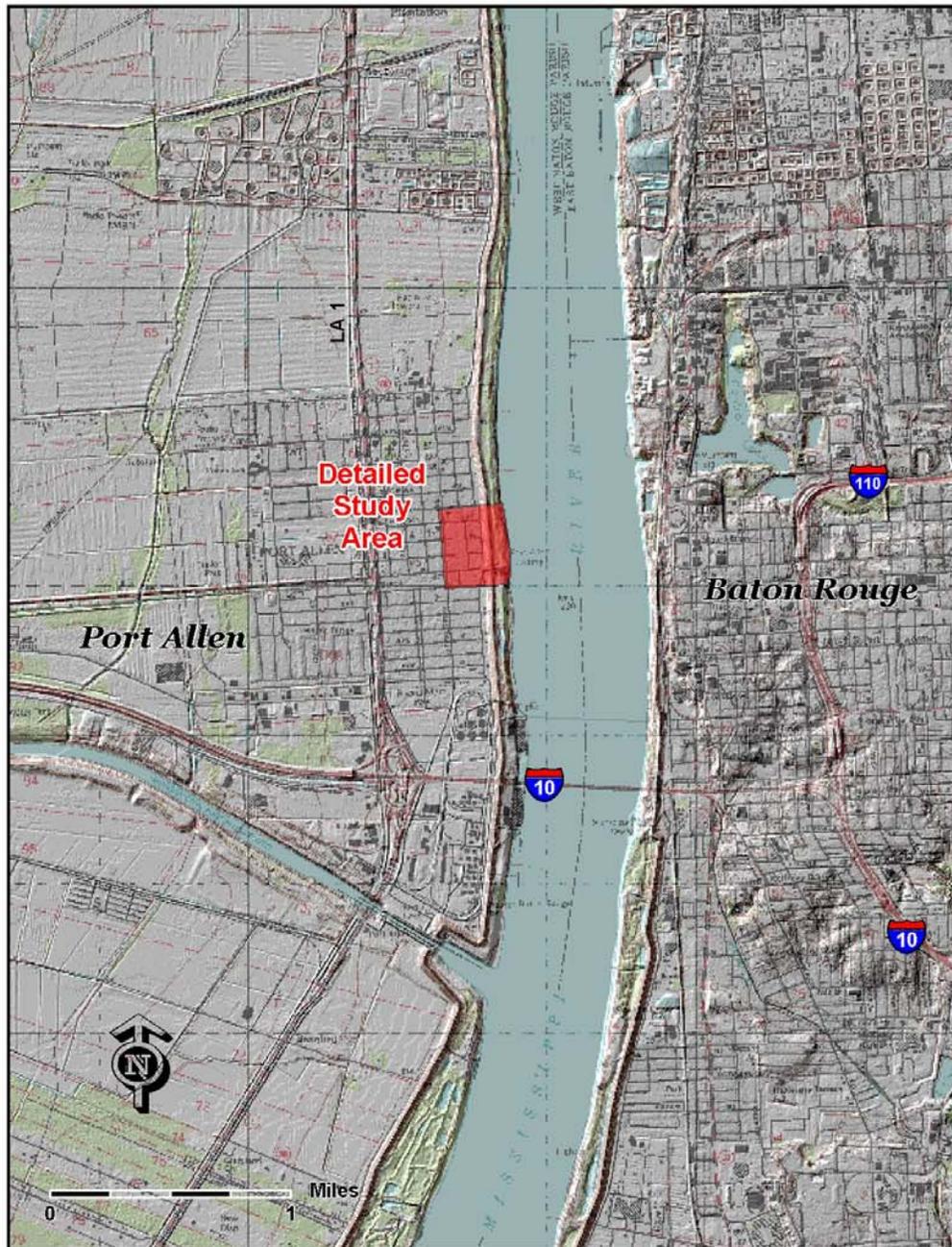


Figure 2. Location of Detailed Study Area

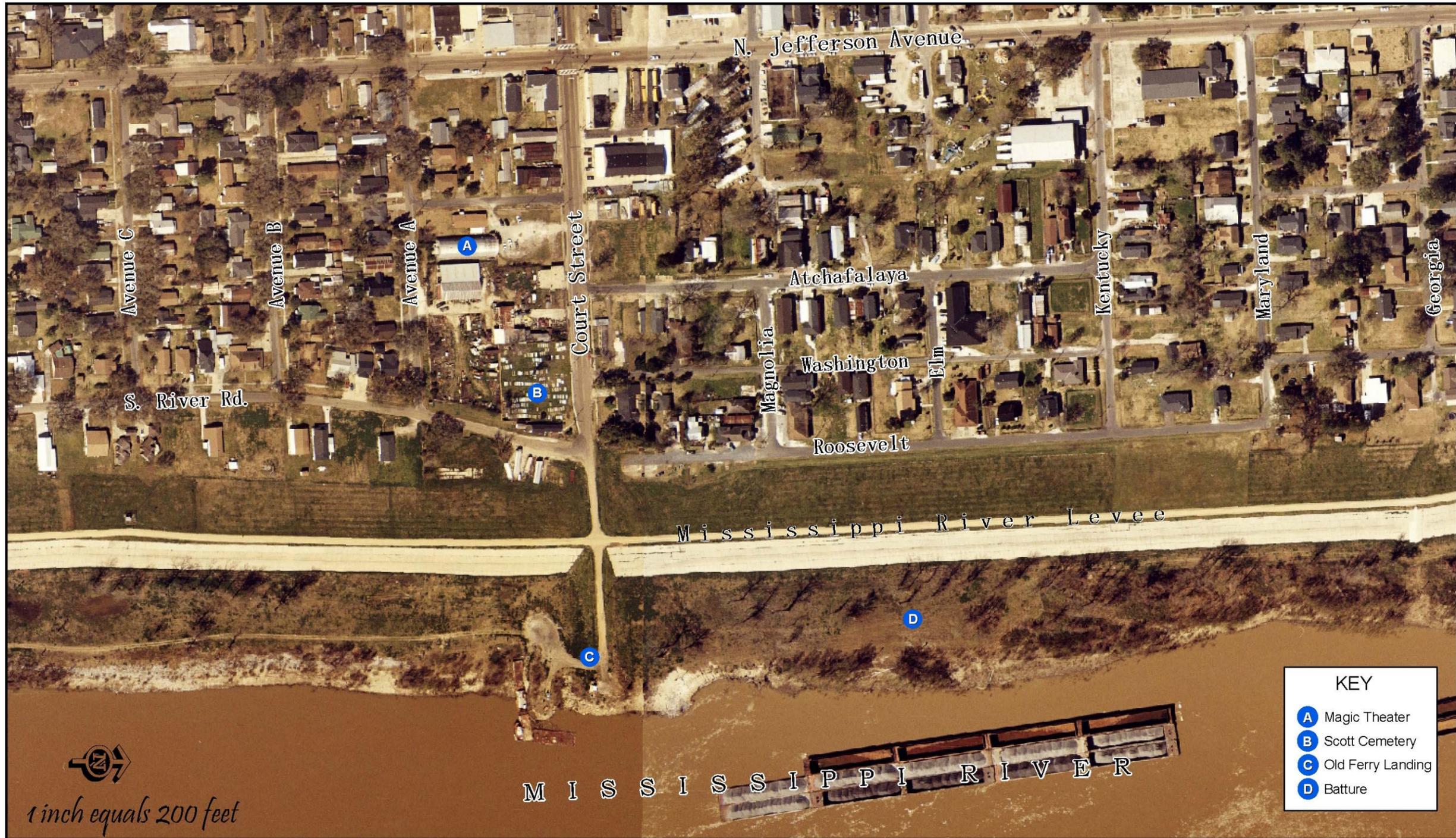


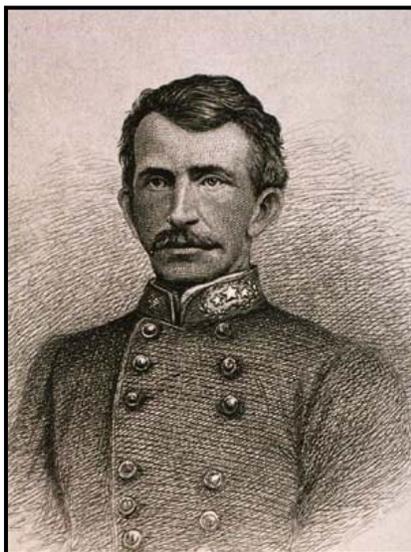
Figure 3. Central Study Area Showing Key Locations

With the Battle of Baton Rouge in 1779, the Spanish colonial government seized control of British West Florida, effectively ending the British presence in the Louisiana Territory. French creoles from the Gulf Coast began to establish a presence in the area at this time, and the plantation system of agriculture was established by the more successful planters. The establishment of the plantation system at the end of the 18th century resulted in the introduction of large numbers of slaves to the colony for crop cultivation. The proliferation of large-scale sugar plantations continued until the onset of the Civil War, at which time 24 sugar plantations existed within the parish.

The first settlement established in West Baton Rouge Parish was that of Brusly, which first began as the settlement of Molaisonville in the late 18th century. The settlement remained small throughout the 18th and 19th centuries and was eventually renamed Brusle, which was later Anglicized to Brusly.

Spain ceded the Louisiana Territory to France in 1800. In 1803 the United States purchased the Louisiana Territory from France. The Louisiana Territory was divided in 1804 for administrative purposes. The land south of 33 degrees North Latitude, which encompasses the present state of Louisiana, was initially known as the Territory of New Orleans. Various internal restructurings occurred within the territory as it was prepared for statehood. The Parish of Baton Rouge was divided into East and West Baton Rouge parishes in 1810. The Territory of New Orleans was admitted to the Union in 1812 as the state of Louisiana.

The town of Port Allen originated around this time as the settlement of St. Michel, established by Michel Mahier in 1809. The former site of St. Michel is now occupied by the Mississippi River. The town served as a service center and export point for plantations in the vicinity. The ferry provided a linkage between Baton Rouge and Port Allen and was a component of the road from Baton Rouge to Opelousas, which was one of the earliest settlements in Louisiana.



Governor Henry W. Allen.

In 1810 Frederick Arbour obtained a license to operate a ferry at St. Michel. Although exact dates are not available, records indicate that by 1843 the ferry service had begun to use a steamboat to ferry passengers across the river.

The town expanded throughout the early 19th century, until the property was sold by Michel Mahier's family in 1824. A mercantile presence remained in the area after the sale, however. The town of West Baton Rouge was established in 1854 on the site of St. Michel. West Baton Rouge expanded rapidly throughout the mid-18th century and was renamed Port Allen in 1878 in honor of Governor Henry W. Allen. The city was incorporated in 1916.

The secession of Louisiana and other southern states in 1861 and the subsequent formation of the Confederate States of America led to the onset of the Civil War. Records of West Baton Rouge during the

Civil War are scarce. The local newspaper, *The Sugar Planter*, ceased publication for the duration of the war. West Baton Rouge's agricultural economy was devastated by the war and the subsequent loss of its slave labor force through emancipation. The West Baton Rouge ferry apparently ceased operation during the war, when the Union navy controlled river traffic. The Civil War ended in 1865 with the surrender of the Confederate States of America, and the residents of West Baton Rouge Parish attempted to revive the local economy, which had been crippled by the war. The Reconstruction Era was marked by economic depression, political corruption, and a series of devastating floods in 1865, 1866, and 1867.

The floods of the late 19th century destroyed or irreparably damaged most of the levees in the parish. Parish levee maintenance was eventually begun in earnest under the administration of the Atchafalaya Levee District in 1890, but the levees were further damaged by flooding in 1892, 1903, 1912, and 1913. The Great Flood of 1927 was the greatest recorded flood in the lower Mississippi Valley. Damage from the flood resulted in the creation of the Flood Control Act, which empowered the U.S. Army Corps of Engineers to construct and maintain flood control structures, including levee maintenance, along the Mississippi River.

The current Port Allen levee was constructed by the Corps in 1931. The levee was placed atop the eastern portion of the original town of Port Allen, resulting in the removal or submergence of many landmark structures within the town. Riverfront plantations in the vicinity of Brusly and Addis were also destroyed by levee construction.

The Port Allen ferry remained the primary source of transportation across the Mississippi River until 1940, when a bridge was constructed across the river at Highway 190 north of Port Allen. The Interstate 10 Bridge was completed in 1968. Since its completion, the I-10 Bridge has remained as the primary river crossing.

Once the land adjacent to the river became populated, the settlers moved farther inland to densely wooded areas. These areas were burned off for use as cropland. The parish is still largely agricultural today. The chemical industry began to establish a presence in the parish in the later half of the 20th century when plastics and chemical plants were constructed along the lower Mississippi River.

2. Present Conditions

At 191.2 square miles, West Baton Rouge Parish is the smallest parish in Louisiana. The population in 2000 was 21,601, ranking the parish 43rd out of 64 parishes in the state. With a population of 5,278 in 2000, Port Allen is the largest municipality in the parish and is the parish seat. Over 80 percent of the population lives in the eastern half of the parish in or near the municipalities of Port Allen, Brusly, and Addis (Figure 4).

West Baton Rouge Parish is largely rural in character, with the rural areas occupied by agriculture and industry. Sugar cultivation remains the dominant agricultural enterprise, and the parish continues to be an important source of Louisiana sugar and related products. Major industries include petrochemical refining; sugar, flour, and coffee milling; ship building and repair; river and waterway transit; and building materials fabrication. Industry is mainly situated

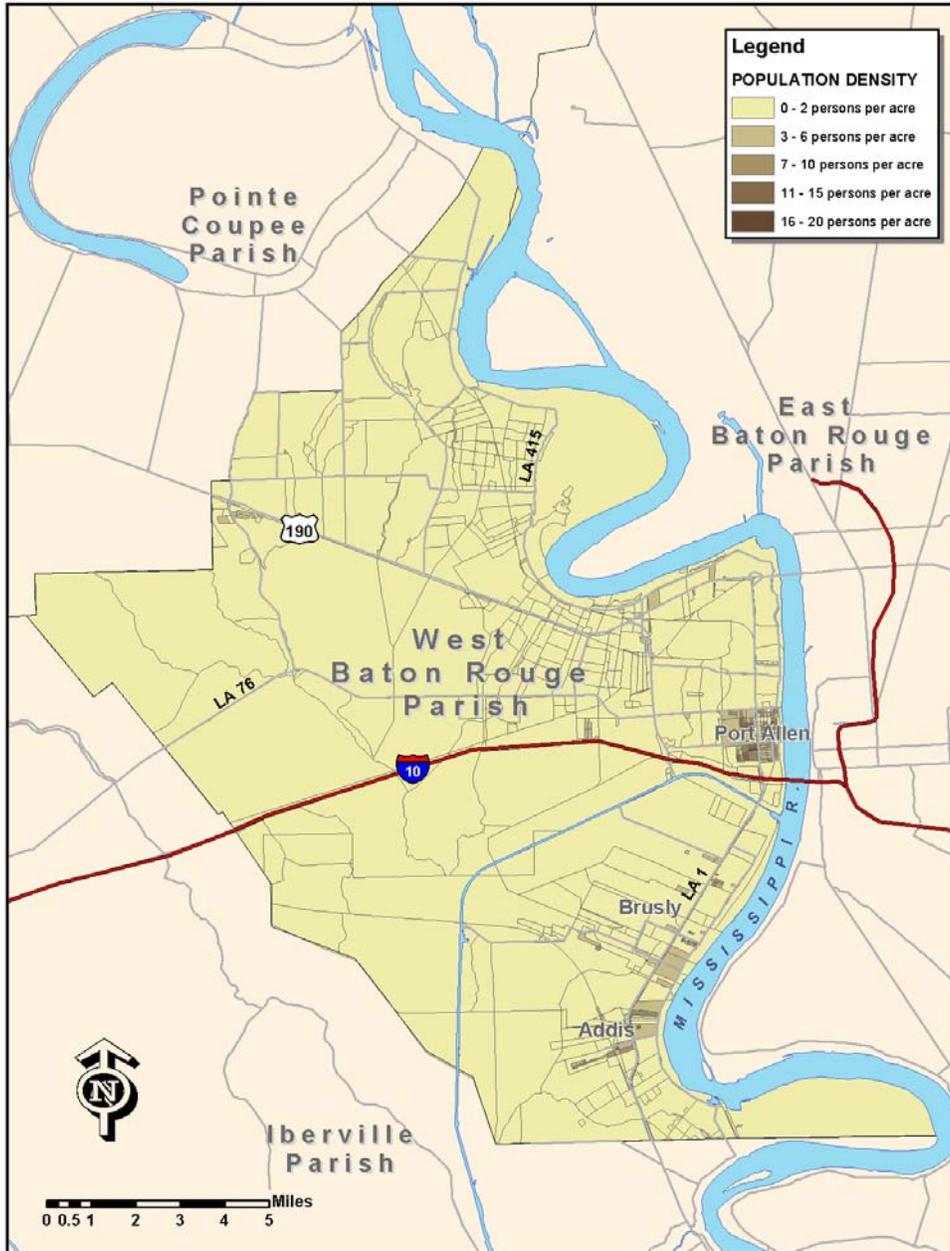


Figure 4. Population Density, West Baton Rouge Parish, Louisiana

in the eastern part of the parish near the Mississippi River. The western half of the parish is primarily forested swampland that is not suitable for settlement or agriculture.

The Port Allen Lock opened in 1961. The lock provides passage for vessels between the Gulf Intracoastal Waterway Alternate and the Mississippi River. The Intracoastal Waterway Alternate provides commercial barge traffic a 160-mile shortcut from the Mississippi River to the Houston Ship Channel and the Gulf of Mexico. The Port of Greater Baton Rouge was constructed at this key location to facilitate the transfer of loads between ocean-going vessels, barges, railroad cars, and trucks. The port provides 6,000 feet (ft) of deep-water frontage on the west bank of the Mississippi River. A grain facility capable of unloading 3 million bushels of grain per hour was constructed at the port in 1955. The Port of Greater Baton Rouge is currently ranked seventh in the nation in total tonnage.

II. EXISTING CONDITIONS

A. CLIMATE

The region has a humid, subtropical climate characterized by relatively high rainfall. The annual average temperature is 68° Fahrenheit (F). The monthly average temperature is 54° F in January and 81° F in July. Summers are generally hot and humid. The prevailing winds come from the Gulf of Mexico. Most days in July and August reach temperatures of 90° F or higher. Winters are cool and fairly short. Freezing temperatures seldom last for more than three or four days. Precipitation is fairly frequent and well distributed throughout the year. More than 4 inches of rain normally falls in every month except September and October. The average annual rainfall is about 60 inches.

Planning for facilities along the riverfront should take into account the generally hot climate of the region. Adequately shaded areas should be provided.

B. SOILS AND TERRAIN

The eastern portion of West Baton Rouge Parish consists of soils in high and intermediate positions on natural levees of the Mississippi and its distributaries. Silty loam soils are prevalent on the natural levees of the river. These soils are somewhat poorly drained and moderately well suited for urban uses. The Mississippi River levee, which comprises a significant portion of the study area, is made up of dredged and imported fill material.

1. Levee

The slope of the land behind the levee is quite flat – generally less than 1 percent. As is often the case in south Louisiana, the most significant topographic features are the river levees. The top of the levee that forms the barrier between Port Allen and the Mississippi River is about 20 to 25 ft higher than the terrain on the landside of the levee. Interestingly, directly across the river in Downtown Baton Rouge, the landside of the levee rises higher than the top of the levee. Third Street in downtown Baton Rouge is generally 2 to 4 ft higher in elevation than the top of the levee. In contrast, most of the land west of the levee in downtown Port Allen is about 25 ft lower than the top of the levee.

The levees that parallel the Lower Mississippi River are physical and perceptual barriers. Many people who live just blocks from the river have not visited it in years. This results from a variety of reasons. Traditionally, the levees have not



View of Roosevelt Street looking north. The protection levee is 20 to 25 feet higher than the road.

been “user-friendly,” and there has been very little development to promote human activity atop the levees. The levees have had few paths, few handicapped-accessible features, and few amenities such as picnic areas and overlooks. In many instances, levee police have discouraged people from being near the river. In 2003, the utility of the levee was significantly upgraded upon completion of a levee-top overlook and promenade as a TEA-21 project.

The height and massive nature of the levees have worked against riverfront visitation in the past. For the future, though, the levee can be considered an asset if utilized properly. It is essentially an existing overlook onto the river. The levee is a linear feature near the river, ideal for trails and promenades. Riverfront design elements placed at or near the top of the levee will remain dry, even at times of high water.

2. Batture

The term batture refers to the land between the river and the levee. This land is important as a buffer that can withstand the constantly fluctuating river levels. The Mississippi River at Baton Rouge/Port Allen will experience high (>34 ft NGVD) and low (<8 ft NGVD) periods almost every year. The batture in Port Allen can be sizable, averaging about 250 ft to 350 ft



View of the batture in Port Allen. Baton Rouge gage of the Mississippi River reads about 26 ft NGVD. Photo taken March 27, 2003.

The recommended plan must properly site design elements that can withstand the realities of the riverside of the levee. Specifically, any element sited at the batture elevation must be able to withstand the seasonal inundation. Ballfields and picnic areas are suitable elements for batture land. Hardscaping and construction of certain facilities that would be damaged by inundation should be limited.

from the river’s edge to the base of the levee during average to low water conditions. During high water conditions, the river water will rise high enough to completely inundate the batture land. The batture is primarily vegetated with grasses and bottomland hardwoods able to cope with the alternating periods of dryness and inundation.



View of the batture in Port Allen. Baton Rouge gage of the Mississippi River reads just below 35 ft NGVD. Photo taken May 30, 2003.

C. BIOLOGICAL RESOURCES

Vegetation in the batture is composed primarily of bottomland hardwoods, including black willow (*Salix nigra*), American sycamore (*Platanus occidentalis*), Eastern cottonwood (*Populus deltoides*), and Chinese tallow (*Sapium sibiricum*). Dominant herbaceous species include lizard's tail (*Saururus cernuus*), alligator weed (*Alternanthera philoxeroides*), *Rubus* sp., *Equisetum* sp., sensitive briar (*Schrankia microphylla*), lance-leaf frog-fruit (*Phyla lanceolata*), ladies eardrop (*Burnnichia cirrhosa*), and pepper-vine (*Ampelopsis arborea*).

Wildlife within the study area is confined primarily to the batture land and occasionally to the agricultural fields on the landside of the levee. Species likely to be present include squirrel; rabbit; opossum; mink; nutria; beaver; white-tailed deer; various song, wading, and game birds; reptiles; and amphibians. Two aquatic species identified as occurring in West Baton Rouge Parish are listed as Threatened or Endangered by the U.S. Fish and Wildlife Service (Table 1). No Federally listed species inhabiting terrestrial ecosystems are known to occur in West Baton Rouge Parish.

Table 1. Threatened and Endangered Species Occurring in West Baton Rouge Parish, Louisiana

Common Name	Scientific Name	Status
Fat pocketbook mussel	<i>Potamilus capax</i>	Endangered
Pallid sturgeon	<i>Scaphirhynchus albus</i>	Endangered

Source: U.S. Fish and Wildlife Service, 2002.

The fat pocketbook mussel inhabits sand, mud, and fine gravel bottoms of large rivers. It buries itself in these substrates in water ranging in depth from a few inches to eight feet, with only the edge of its shell and its feeding siphons exposed. The fat pocketbook mussel requires a stable, undisturbed habitat for reproduction and a sufficient population of fish hosts to complete the mussel's larval development. Larvae clamp onto a host fish by means of tiny clasping valves. The larvae remain attached until shell formation is complete, after which they detach from the host fish and settle into the streambed. Fat pocketbook mussels may have a lifespan of up to 50 years.

The pallid sturgeon is found primarily in the Missouri and lower Mississippi rivers. In Louisiana, this species was formerly thought to be restricted to the main channel of the Mississippi River. However, recent data indicate that the species also exists in the Atchafalaya River. The pallid sturgeon is one of the most poorly known and infrequently recorded freshwater fishes in North America. However, it is possible that the pallid sturgeon may inhabit portions of the study area during its spawning season (May through June).

In terms of flora, there is little vegetation in the study area except for existing vegetation on the batture. Bottomland hardwoods and wetland areas present in the batture would be preserved when possible. In order to preserve possible pallid sturgeon in the area, dredging (if required for

construction of some portion of the riverfront development) windows may be required during May through June to allow successful spawning of the species. Since dredging causes direct impacts to water quality such as increased turbidity and reduced dissolved oxygen levels which may significantly affect essential fish habitats and fisheries resources, it would be more environmentally friendly if the project would be constructed from the land side rather than from the water side to reduce the need for dredging.

D. HAZARDOUS, TOXIC, AND RADIOACTIVE WASTE (HTRW) SITES

Extensive industrial development has occurred along the lower Mississippi River in the 20th century, and a number of industrial facilities are found near the river in West Baton Rouge Parish. A preliminary analysis of U.S. Environmental Protection Agency (EPA) databases revealed six industrial sites in the vicinity of the project area (see maps in Appendix A). These are all of the industrial facilities in the vicinity of the project area. The facilities are located near the West Baton Rouge Parish riverfront; however, only one facility, the Barry Moore Landfill, is located adjacent to the levee.

Company: Barry Moore Landfill
Facility Type: Landfill
Address: Levee Rd at Hwy-190 Bridge
City: Port Allen, Louisiana

Company: Exxon Anchorage Tank Farm
Facility Type: Petroleum Bulk Stations and Terminals
Address: Hwy 1 and 97 3 W
City: Port Allen, Louisiana

Company: Westwego Galvanizing Services
Facility Type: Coating, Engraving, and Allied Services
Address: 3520 S Riverview
City: Port Allen, Louisiana

Company: Plastic Materials
Address: 8600 S Hwy 1
City: Addis, Louisiana

Company: DSM Copolymer Inc.
Facility Type: Synthetic Rubber
Address: 9263 S Hwy 1
City: Addis, Louisiana

Company: Newpark Industrial Disposal
Facility Type: Industrial Organic Chemicals
Address: 2040 Ft FSL 493
City: Addis, Louisiana

A portion of the current Port Allen levee overlies the former municipal area of historic Port Allen. Consequently, the potential exists for the presence of underground storage tanks and other items of HTRW concern under the levee. Analysis of historic maps and a detailed environmental records review could aid in detecting these items.

The riverfront and adjacent properties of West Baton Rouge Parish have been subjected to occasional toxic releases from shipping traffic and/or industrial accidents. Ms. Sharlot Edwards, Chairperson of the West Baton Rouge Parish Emergency Planning Committee, stated that one incident has occurred in recent history that required action by the Office of Emergency Preparedness.

On March 17, 1997, 25 barges broke loose from their tow in the Mississippi River. A number of the barges collided with the Highway 190 Bridge north of Port Allen. One barge, which carried an undetermined amount of benzene and other toxic chemicals, capsized and released chemicals into the air and water. Residents of West Baton Rouge Parish were urged to remain inside, shut off their air conditioners, and close their windows. Approximately 65 residents were kept from their houses during cleanup operations, which lasted several weeks. Remediation efforts for the incident are believed to be complete. Riverfront development must be mindful that the area is an important industrial corridor. Evacuation plans must be integrated with those of the City of Port Allen.

A Phase I Initial Site Assessment (ISA) is required to facilitate early identification and appropriate consideration of potential HTRW problems. The purpose of the Phase I ISA is to ensure that HTRW and contamination issues are properly considered in project planning and implementation. The ISAs generally consist of a review of all properties in the project area to determine the potential for HTRW concerns on each property. In addition, a complete review of appropriate state and Federal environmental enforcement agencies' records should be conducted, prior to a site reconnaissance to identify any potential hazardous situation. Appendix A presents a listing of potential sites contained in USEPA and LDEQ environmental databases identified by Banks Information Solutions, Inc., during the environmental database review. The results of the ISA provide early detection of HTRW and determine viable options to avoid HTRW problems and establish procedures for resolution of HTRW concerns, issues, or problems. Should an ISA discover HTRW problems within a project area, a Phase II assessment should be conducted to further investigate areas of concern identified by the Phase I ISA. A Phase II assessment consists of sampling and testing various media (oil, water, air, soil, containers, substances, etc.) that were identified in the ISA as areas of concern.

E. CULTURAL RESOURCES

It appears that previous levee construction and community development activities in the project area have severely altered or destroyed original soil deposits that may have existed along the river shoreline. It is very unlikely that intact and undisturbed subsurface archaeological material is present. However, proposed pier construction has the potential to impact submerged cultural resources, such as shipwrecks, small vessels, or other historic waterfront structures, that could be present off riverbank. Therefore, initial project consultation under Section 106 of the National Historic Preservation Act (NHPA) with the Louisiana State Historic Preservation Office (LA

SHPO) is required. This consultation may include the preparation of a preliminary Phase I cultural resources study in order to identify previously recorded sites, document historic shoreline construction activity, determine the potential for submerged cultural resources, and if warranted, provide recommendations for further investigations, which could include a remote-sensing survey of the proposed pier construction area. Section 106 consultation must be concluded prior to any construction activity.

F. VEHICULAR TRANSPORTATION

1. Interstate 10

Interstate 10 (I-10) is the most important and heavily traveled highway in Louisiana. It extends from the Atlantic coast to the Pacific coast in the southern United States, with termini at Jacksonville, Florida, and Los Angeles, California. Within Louisiana, it serves as the primary corridor that links the cities of New Orleans, Baton Rouge, Lafayette, and Lake Charles. The interstate bisects West Baton Rouge Parish and passes immediately south of Port Allen, approximately one mile south of the center of the study area. The I-10 Bridge, completed in 1968, spans the Mississippi River between Port Allen and Baton Rouge. The bridge is one of only two transportation links between the two cities.



Heading west from Baton Rouge to Port Allen on I-10 Mississippi River Bridge.

The Average Annual Daily Traffic (AADT) statistics for 2000 illustrate the significance of I-10 to the state. The 10 road segments in the state with the highest AADT counts are all segments of I-10. Two of the 10 busiest segments are in Baton Rouge, with the other eight in the New Orleans metro area. On an average day in 2000, 76,787 vehicles traveled across the Mississippi River Bridge; and 122,900 vehicles per day are forecast for the year 2020.

Although an increase in bridge traffic may not be welcomed by commuters, it may signal a great opportunity for Port Allen's riverfront in terms of exposure. According to the AADT statistics, 46,113 more vehicles will pass within viewing distance of the riverfront per day in 2020 than in 2000. This holds intriguing implications for Port Allen and the importance of I-10 to the project. According to the *Louisiana State Parks Master Plan 1997-2012*, there are two types of retirees: "rovers" and "settlers." Rovers are defined as those who traverse the interstates, primarily by automobile or RV. This user group spends a significant amount of time using the road system to travel across the country. The State Parks Master Plan states that to make a state park a true destination for this market, it must be easily accessed and actively

promoted. Promotion could be accomplished by providing information at visitor centers, in state tourism literature, and with highway signage. The easier it is to stop, the more likely visitors will choose a facility as the temporary landing place. Once they have stopped the benefit is multifaceted. This idea that ease of access and promotion will benefit state recreational facilities can be extended to municipal recreational developments such as Port Allen's riverfront because the same concept applies. The number of traveling retirees will increase as the baby boom generation enters the retirement years. The "rovers" classification of retirees can also be extended to vacationing families and other groups. The proximity of I-10 to the study area gives this location a great advantage that many other recreational developments do not enjoy. The interstate will be one of the riverfront's great assets, because it should supply a steady stream of visitors.

The problems that I-10 creates must also be acknowledged. The major weakness currently is that the interstate's two eastbound lanes converge into one on the Baton Rouge side of the river. This bottleneck creates congestion at various times of the day and year. There are also numerous traffic accidents on both sides of the bridge and on the bridge itself. There does not seem to be a viable short-term solution right now. In fact, the general consensus of area residents is that the fundamental cause of the I-10 traffic problem will not be corrected until a crossing is built in another location.

2. Highways and Local Roads

There are several other important highways and roads in the Port Allen area. U.S. Highway 190 parallels I-10 to the north. U.S. 190 was the primary east-west corridor prior to the completion of I-10. The U.S. 190 Bridge, commonly known as the "Old Bridge," is about 4.5 miles north of the "New Bridge." The Highway 190 Bridge is the second viable transportation link between Port Allen and Baton Rouge, but has only one-fifth the usage of the I-10 Bridge. On an average day in 2000, only 13,421 vehicles traveled across the U.S. 190 Mississippi River Bridge.



A view of U.S. Highway 190 Mississippi River Bridge.



LA 1 in Port Allen.

LA 1 and LA 415 are the major north-south corridors in West Baton Rouge Parish. LA 1 is more significant because of its proximity to the study area and its comparatively heavy usage. It parallels the Mississippi River and is the major road on the west side of the river linking the petrochemical plants and waterborne commerce. LA 1 is the primary corridor that passes through Port Allen and has given rise to a "strip" development.

Court Street has always been recognized as Port Allen’s “Main Street.” It runs perpendicular from LA 1 to the river and is the primary transportation axis to the Port Allen riverfront. North Jefferson Avenue runs north-south and serves as a collector street for the surrounding residential neighborhoods. In recent times, most north-south traffic has shifted from Jefferson to LA 1.

Other local roads in the study area are Roosevelt, Washington, Atchafalaya, Magnolia, Elm, Kentucky, and Maryland streets. These are typically low-volume residential streets. There is a striking axial relationship between Maryland Street and the State Capitol across the river. Washington Street is narrow.



Court Street looking towards the Mississippi River.



Highway 1.



Washington Street.



Maryland Street in Port Allen showing view of State Capitol.

Court Street and North Jefferson Avenue are the major streets in Port Allen. The existing commercial and residential makeup of Court Street, its axial orientation to the river, and its historic value as a Main Street make it the outstanding choice as an entrance or portal to the riverfront. Access to the river from Court Street is direct and simple. What is missing, though, is the feeling that this is an entranceway, or gateway, to the riverfront and the celebration of values inherent in the Mississippi River. However, with the construction of levee-top amenities in 2003, the relationship between Court Street and the Mississippi River has been strengthened. But, even with completion of the first phase of levee-top improvements, there will be no vehicular access onto the levee. Access and parking should be considered in further planning for the riverfront.

3. Parking

Parking in downtown Port Allen and along the riverfront is largely limited to on-street parallel parking. There is very little parking even for businesses. A revitalized riverfront and downtown would draw many more motorists and would require many more parking opportunities. Parking areas will be needed adjacent to the activity areas they service. Overflow and bus parking and dropoffs would need to be implemented.

G. WATERWAYS

1. The Mississippi River

The Mississippi River is one of the most important waterways in the world in terms of size, commerce, and recognizability. The “Mighty Mississippi” is more than 2,350 miles long and has the world's second largest drainage basin, encompassing 30 states and two provinces. It ranks fifth in the world in terms of water volume, discharging an average of 612,000 cubic feet per second into the Gulf of Mexico. The Upper Mississippi (the portion above the confluence with the Ohio River) is tightly controlled, with 26 locks and dams above St. Louis. The Lower Mississippi is larger and faster-moving and flows unimpeded to the Gulf of Mexico.

The Mississippi River has made immense contributions to America’s heritage and folklore, which has been conveyed by generations of explorers, Native Americans, steamboat pilots, engineers, writers, painters, and musicians. It is the river that inspired Mark Twain and continues to inspire others and is one of the enduring symbols of American culture.

Port Allen’s relationship to the Mississippi River should be the focus of the city’s riverfront. Over time, the increasing reliance on the automobile as the primary means of transportation and the construction of the levee have tended to erode the connection. Reestablishing the site of the old ferry landing as Port Allen’s link with the river is important to the revitalization of the riverfront and the downtown area.

This reconnection of the city to the river could also extend to Baton Rouge. The separation between the two sides of the river needs to be “bridged,” without actually building another bridge. This can be done by creating a waterborne transportation link and features that are complementary to existing and planned features on the Baton Rouge side of the river. Although beyond the scope of this study, reestablishing the Port Allen ferry is a possibility. The riverboat casinos could also play a part in transporting people across the river.

Planning for the riverfront must also take into account the hazardous nature of the Mississippi. The river is maintained at a 45-foot depth from approximately mile marker 233 (four miles north of the Port and three miles north of the study area) at Baton Rouge to the mouth at Head of Passes. This depth allows navigation of large oceangoing vessels in this stretch of the Mississippi. The 45-foot deep navigation channel lies near the west bank of the river and may be as close as 100-200 feet from the shore of the study area (Figure 5). In addition to the close proximity of oceangoing vessels, currents average 4-5 miles per hour in the Lower Mississippi. Boils and turbulence can be treacherous, especially for small craft.

The river exhibits a great deal of vertical fluctuation on a seasonal basis. The bature is flooded almost every year, primarily during the months of February through June, with March and April generally exhibiting the highest levels of inundation. The Project Design Flowline, or flood stage, at this location of the Mississippi River is +46.7 ft NGVD. Certain elements of the riverfront development will have to be placed higher than this elevation to be out of harm's way during extreme high-water events. Low water may be as low as +1 ft NGVD.

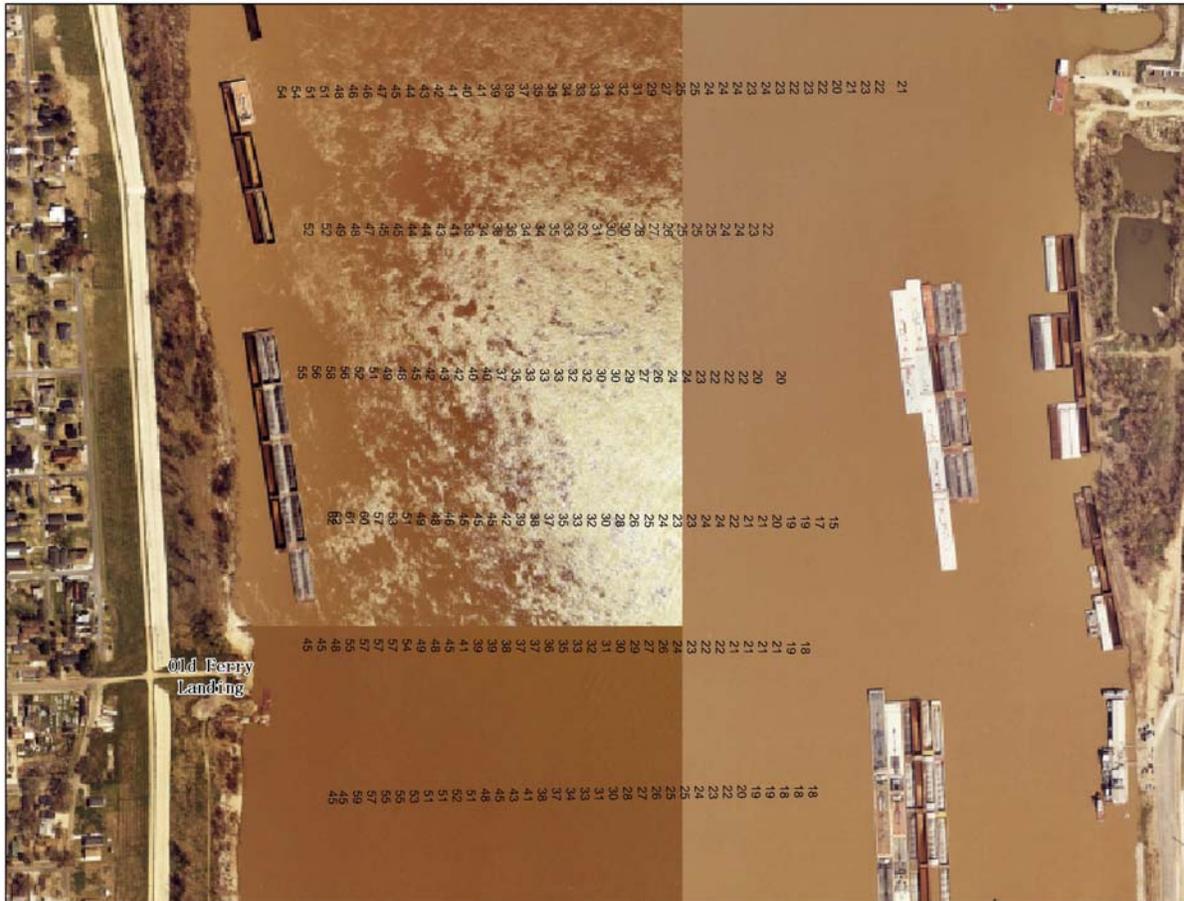


Figure 5. A Survey of Mississippi River Depth Readings, April 2003

2. The Port Allen Lock/Gulf Intracoastal Waterway

The Port Allen Lock was opened in July 1961 when the Plaquemine Lock was closed. The lock is located beyond the city limits, south of I-10. The Port Allen Lock facilitates the movement of vessels from the Gulf Intracoastal Waterway Alternate to the Mississippi River and vice versa. The lock itself is 84 ft wide and approximately 1,250 ft long. The gates are designed for a maximum lift of 45 ft. Vessels can be raised 40 ft to reach the level of the Mississippi River in 15 minutes.

The Port Allen Lock services over 27,000 barges carrying over 20 million tons of cargo each year. The lock operates 24 hours a day, 365 days a year, at no cost to navigation. The lock has the potential to be a tourist attraction and could include boardwalks, picnic areas, and nature trails.

3. Port of Greater Baton Rouge

The Port of Greater Baton Rouge, located just south of Port Allen, is the head of deepwater navigation on the Mississippi River. The port ranks among the top 10 ports in the United States in terms of annual tonnage, handling 61,400,000 short tons of cargo each year at 3,000 ft of dock and 550,000 square feet of warehousing.

Direct transfers from rail, barge, truck, and ship are handled at the port. Rail is served by three Class 1 railroads, with 18 miles of track located within the main port complex. The Port of Greater Baton Rouge also provides the only publicly owned midstream mooring buoy operation on the lower Mississippi.



Wharf and warehouses at Port of Greater Baton Rouge.

The busy activity in and around the port would impart a sense of riverborne activity to riverfront visitors. However, the connection between the riverfront and the port is an issue, particularly in the case of a proposed connection in the form of a levee-top path. Because of security issues arising from the events on September 11, 2001, recreational features must avoid secured port facilities. The Port of Greater Baton Rouge and the Port Allen Lock have implemented significant restrictions on their respective properties.

H. PEDESTRIAN AND BICYCLE ACCESS

Until recently, there has been a lack of pedestrian and bicycle-friendly infrastructure in the parish. Sidewalks along the sides of roads are uncommon. However, the City of Port Allen is implementing the first phase of a levee-top improvement program, which includes the construction of 1,600 ft of linear path. This pedestrian/bicycle path is 12-ft wide and uses a mixture of brick and patterned concrete as a surface. The Corps of Engineers, New Orleans District, provided planning assistance through the Planning Assistance to State Program, and improvements have been constructed with TEA-21 funds through the LaDOTD and FHWA. In 2004, this path will be extended to Rivault Park, which is north of I-10 and east of LA 1. If funding can be obtained, the path will be extended during the same year northward to the city limits at



Recently completed levee-top walkway.

Rosedale Road (LA 986). Section VII of this report recommends the creation of a physical connection between the City of Port Allen and the lock and the towns of Addis and Brusly farther to the south.

If current plans are implemented over the next few years, Port Allen will have advanced from minimal riverfront facilities to very good facilities for pedestrians and bicyclists. Baton Rouge is also creating opportunities along its levees with plans to enable pedestrians and bicyclists to move between downtown and Louisiana State University by 2005. Although the communities on both sides of the river are committed to providing good riverfront access, little consideration has been given to linking the riverfronts for pedestrians and bicyclists. The bridges in the Baton Rouge area do not accommodate pedestrians or bicyclists. A passenger ferry or water taxi would enable these recreationalists to travel back and forth across the river.

I. LAND USE

West Baton Rouge Parish is agriculturally based with urban and industrial land near the Mississippi River. The western part of the parish is primarily forested wetland. Figure 6 shows generalized land uses in the parish.

1. Agriculture

Although West Baton Rouge Parish is primarily agricultural today, the area was originally composed almost entirely of bottomland hardwoods. These thick forests were burned to create land for agriculture. The burned-off areas had no access to water and were known as “brusles,” from which the town of Brusly derived its name. Sugarcane and soybeans are the main crops of the parish. Sugarcane has been the principal crop for many years. Along the river roads, refineries of different vintages are still in operation. These “sugar houses” are remnants of plantations that were established along the river’s edge. Cotton, corn, wheat, and rice are also grown in the parish.



Agriculture accounts for nearly 25 percent of Port Allen’s land area.



Remnants of Poplar Grove sugar plantation can still be seen from LA 1.

According to the 1997 Census of Agriculture, the number of farms in the parish increased from 90 in 1992 to 95 in 1997, and the total acreage of farmland decreased from 38,566 acres to

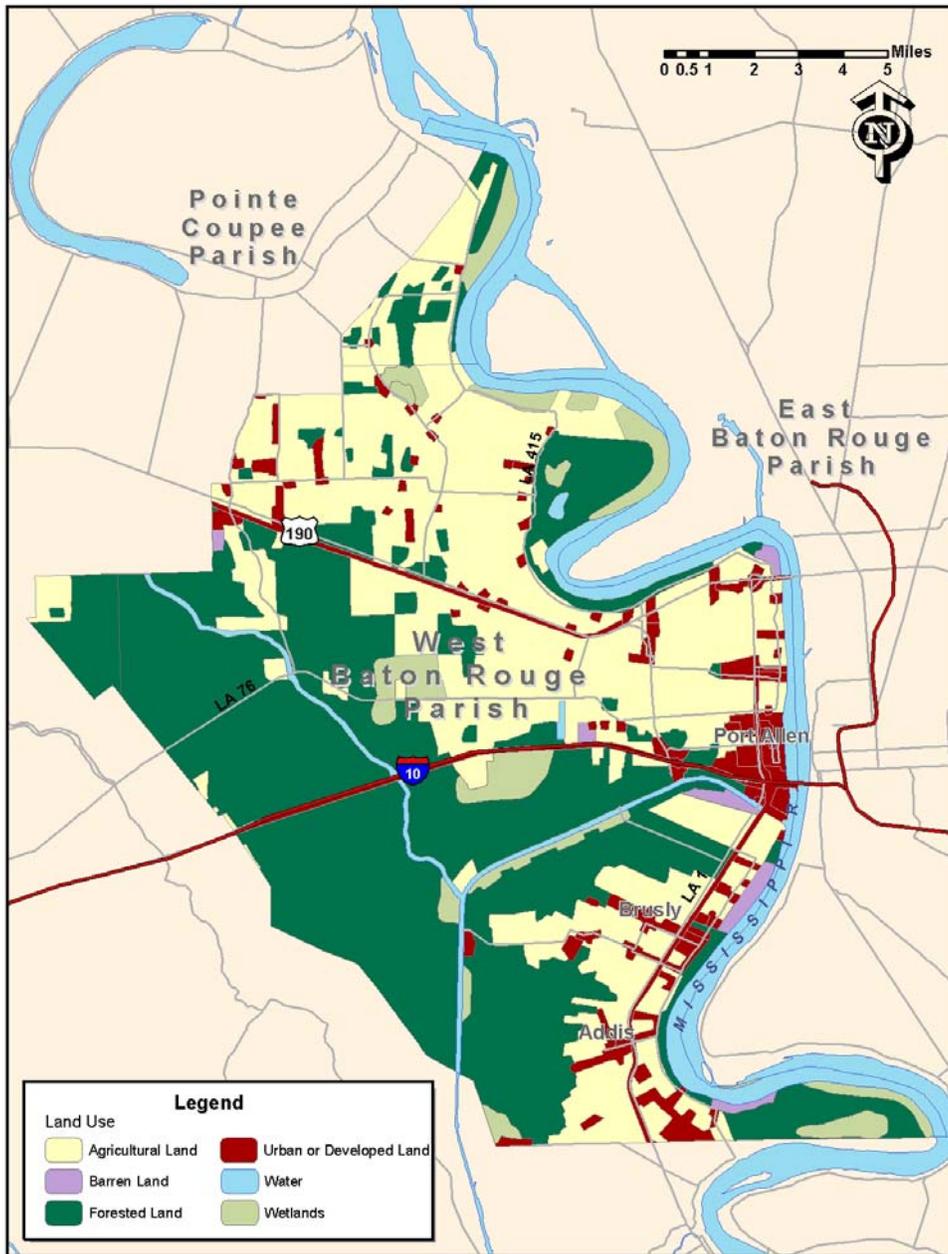


Figure 6. Land Use, West Baton Rouge Parish

28,836 acres. Based on the 1997 figure, 23.5 percent of the land in the parish is farmland. The western half of the parish is a sparsely populated and heavily wooded area comprised of low-lying, poorly drained alluvial soils. Much of the water in this area drains into Choctaw Bayou, which terminates at the Intracoastal Waterway.

2. Residential

Most of the land area in Port Allen is residential, and most of the parcels north of Court Street and south of Maryland Street are zoned Single Family Residential. Almost all of the residential parcels in the parish have a similar designation.



Home located on Atchafalaya Street.

In 2001, LJC Planning and Design conducted a building conditions assessment as part of a revitalization plan for the city. The results of the assessment relating to the project area and its environs are presented in Figure 7. For the assessment, buildings were evaluated only by external observations, and vacant sites were noted. Conditions were ranked as follows:

- (1) Good
- (2) In need of routine maintenance
- (3) In need of minor rehabilitation
- (4) In need of major rehabilitation
- (5) Dilapidated.

The assessment determined that two-thirds of the sites within the area were either vacant, in need of major rehabilitation, or dilapidated. The study noted that many of those units had been placed on the city's demolition rolls.

3. Commercial

Commercial strip development flanks the service roads on both sides of LA 1 and is composed of convenience stores, fast food restaurants, auto parts stores, grocery stores, and service stations. Closer to the project area, Court Street has a furniture store, a jewelry store, an auto repair shop, and an insurance office. Financial and industrial-related businesses, an auto repair shop, and a deli are located on Jefferson Avenue.



Commercial activity on Court Street.

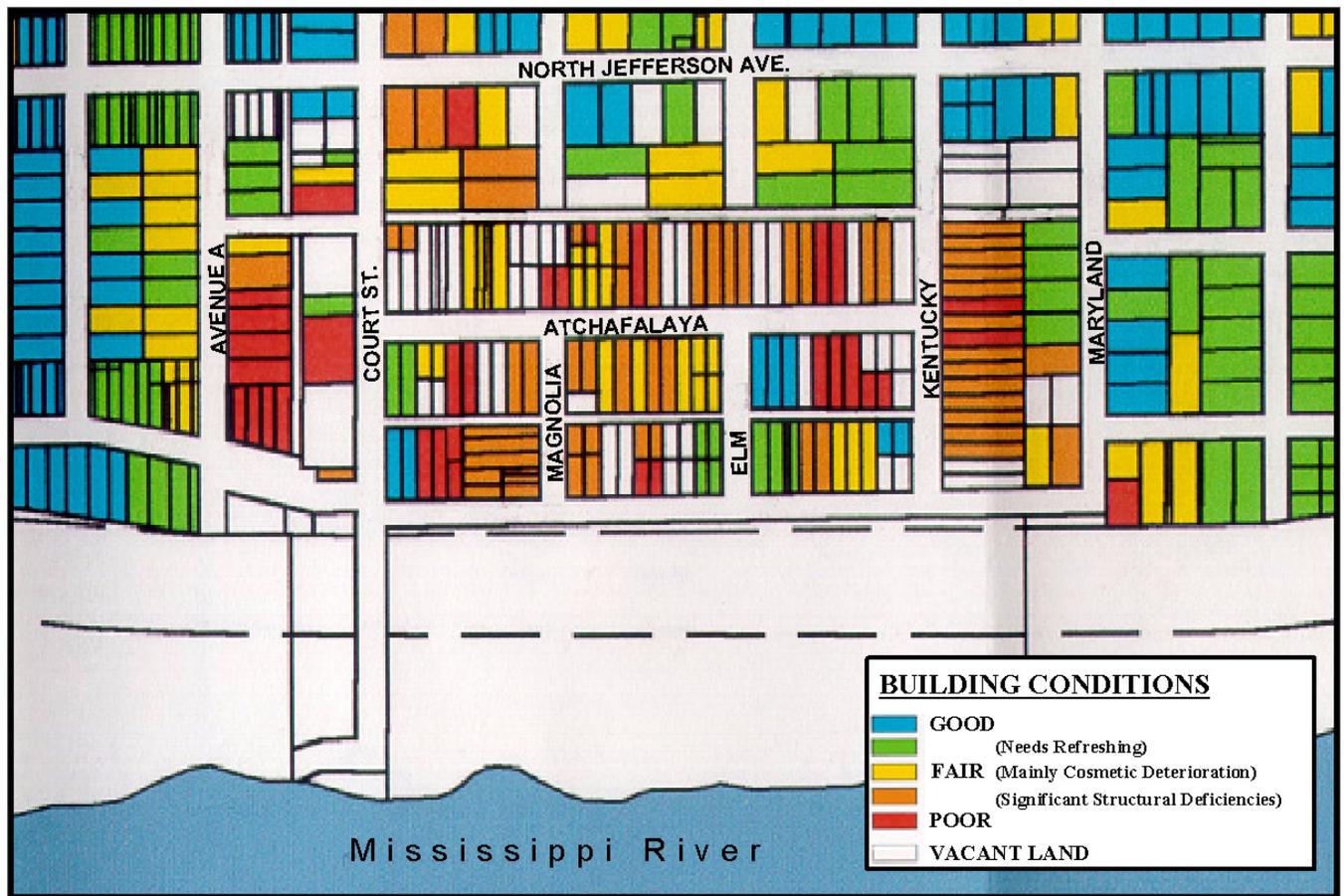


Figure 7. Excerpt from 2001 Building Conditions Assessment, from City of Port Allen Downtown Revitalization Plan

4. Industrial

There is a significant industrial presence in the parish. Industrial sites are numerous immediately north of the city and along the river corridor. To the south of the project area is a complex of storage silos and wharves that make up the Port of Greater Baton Rouge. Almost 20 parcels are zoned as Industrial along Court Street from Jefferson Avenue to the river, but only a few of these are actually being used in that capacity. On one site, industrial equipment is stored behind fencing. On another, a barge loading operation is sporadically active. One parcel containing an engine repair shop is continuously active.



Refinery located north of the project area.

J. RECREATION

West Baton Rouge Parish contains 11 parks, two of which are located near the project area: Rivault Park and the West Baton Rouge Community Center.



Rivault Park is a popular spot for Organized baseball and softball.

Rivault Park is located directly west of the port, between South Jefferson Avenue and LA 1. The park encompasses over 13 acres and contains four ballfields and playground equipment. It is used primarily for organized baseball and softball and is the only such facility in the area. Rivault Park is well used and in good condition. Entering and parking is an issue, however. The parking lot is located at the entrance on South Jefferson, but more people appear to approach the park from the LA 1 access road and parallel-park on this road.

The West Baton Rouge Community Center is located on North Jefferson Avenue, across the street from the Port Allen City Hall. It covers 2.75 acres and includes a recreational building housing a basketball gymnasium, a playground with equipment, picnic tables, and two tennis courts. At the time of writing, the gymnasium building was closed for repairs.

The TEA-21 levee-top improvements completed in 2003 have enhanced the recreational quality of the levee, which is now used by a modest number of people for walking, sitting, visiting, or riding bicycles. Riverside recreation opportunities are now available to residents and visitors. However, the current improvements do not constitute a true path for pedestrians or bicyclists, because they do not link with any destination points. In addition, the riverfront has far greater potential.

Additional improvements would enable users to get closer to the river and appreciate the scenic beauty of the batture area.



Promenade, batture, and river.

There is a need for greater diversity of recreation types and particularly for a recreation space that can capitalize on or be enhanced by a strong water feature. A riverside location such as that provided by the levee offers more opportunities than traditional neighborhood parks and ballfields. The levee-top improvements completed in 2003 provide a glimpse of the possibilities and a good starting point for creating a large space for multiple age groups of people who want to enjoy the dynamic nature of the river.

K. ARCHITECTURE

There is wide range of architectural styles in Port Allen and in the study area. The study area is primarily composed of residences. Some of these are brick, ranch-style homes; others are wood- frame shotguns or cottages. The condition of these structures varies widely. The Magic Theater is a simple Quonset hut with a distinguished façade and has been mentioned by residents as worthy of preservation. The theater has a potential for refurbishing and re-use, or the façade could be used as a sculptural component of a public use area. Scott’s Cemetery at the foot of Court Street is a cemetery with historic significance. There is also one historic (1928) retail structure on the northeast corner of Court Street and North Jefferson Avenue – the Sam D’Agostino building – but it is in need of major renovations.



The Magic Theater is a Quonset hut with a sculptural façade, worthy of preservation.

1. National Register of Historic Places

The National Register of Historic Places is the nation’s official list of cultural resources worthy of preservation. Authorized under the National Historic Preservation Act of 1966, the National Register is part of a program to coordinate and support public and private efforts to identify, evaluate, and protect our historic and archeological resources. Properties listed in the Register include districts, sites, buildings, structures, and objects that are significant in American history, architecture, archeology, engineering, and culture. Table 2 lists the places in West Baton Rouge Parish that are on the National Register.

None of the listed places are within the immediate project area. However, the sites are important because they place Port Allen’s riverfront in context and can aid in “telling a story” to the visitor. These sites could be successfully linked to the proposed improvements to provide a richer, more complete experience for the visitor. Interpretive schemes that include a wider area’s historic and cultural attractions have proven successful in many places. Riverfront development in Port Allen could draw upon some of the architectural styles and details of these places to establish a link between a bygone era, the present, and the future.



The Aillet House, now located on North Jefferson Avenue, is an example of French Creole architecture (c. 1830).

Table 2. National Register Listings for West Baton Rouge Parish

Resource Name	Address	Location	Multiple	Listed
Aillet House	845 N. Jefferson Avenue	Port Allen, LA	Louisiana's French Creole Architecture MPS	1991-08-09
Allendale Plantation Historic District	Jct. Of N. River Road and Allendale Road	Port Allen, LA		1996-11-01
Bank of Addis	7843 Ray Rivet Street	Addis, LA		1992-02-13
Cinclare Sugar Mill Historic District	Jct. LA 1 and Terrell Drive	Brusly, LA		1998-04-23
Hebert House	919 E. Main Street	Brusly, LA	Louisiana's French Creole Architecture MPS	1993-10-07
Monte Vista Plantation House	North of Port Allen	Port Allen, LA		1980-06-09
Poplar Grove Plantation House	3142 N. River Road	Port Allen, LA		1987-12-14
Port Allen High School	610 Rosedale Street	Port Allen, LA		1989-04-20
Sandbar Plantation House	4234 S. River Road	Port Allen, LA		1999-09-02
Smithfield Plantation House	12445 N. River Road	Port Allen, LA		1995-04-07

L. VIEWS

Throughout the design process, planners must be cognizant of the onsite and offsite aesthetics of the project. Scenic viewsheds should be preserved or enhanced when possible. The scenic quality of an area is of great importance, particularly when it includes a high-visibility project.

1. Views From the Port Allen Riverfront

The scenic qualities of the Port Allen riverfront area are related to the city's proximity to the Mississippi River. The most significant views are the skyline of Baton Rouge across the river and of the river itself. The view of Baton Rouge includes three National Historic Landmarks (Old and New State Capitols, USS Kidd). The continuous passage of various ships and barges provides greater attraction than a static view. Another high-quality view is of the I-10 Bridge to the south. Views of Port Allen are fair, but could be greatly enhanced by utility relocations and lighting improvements.

The river and Baton Rouge can only be seen from the levee or the batture because the land behind the levee is 25 to 30 feet lower than the levee. Since Port Allen is



The I-10 Bridge spans the Mississippi River between Port Allen and Baton Rouge.

essentially flat except for the levee, there are virtually no other places from which the river can be viewed. Few existing structures in the riverfront area afford views of the Mississippi River.



View of Baton Rouge from the batture in Port Allen.

A major obstacle in planning for the Port Allen riverfront is the fact that the levee hinders views of the river and beyond. New development on the landside of the levee could take advantage of these views through construction of multistory buildings in which a significant amount of the square footage would be above the levee-top elevation of 50 feet MSL.



The Mississippi River Protection Levee acts as a high visual barrier.

The most scenic views will be available for any construction that will occur on the top of the levee or on the batture. Wharf construction might include two or more levels from which to view the skyline and river activity. One of the levels would allow visitors to be near the water, in order to reinforce human-river interactions.



The only structure along the levee in Port Allen that affords a view of the Mississippi River.

The petrochemical plants north of downtown Baton Rouge are highly visible from Port Allen and must be taken into consideration in planning for future development along the riverfront. Visitors to an area usually perceive industries of this type as aesthetically negative. Some type of interpretive scheme that describes the petrochemical industry and places it in economic and historical context should be considered.

2. Views of the Port Allen Riverfront

Port Allen and its riverfront are usually seen by car from I-10 or from downtown Baton Rouge. Included in these views are the warehouses, storage silos, wharves, and barges of the Port of Greater Baton Rouge directly to the north and south of the Port Allen side of I-10 and the Mississippi River Bridge. Downtown Port Allen and the old ferry landing are well within the viewsheds of interstate travelers and Baton Rouge residents.

Any new development along the river at or near the old ferry landing would be seen by thousands of people every day. There are presently few features that draw the eye or encourage visitation.

3. Court Street

As the most likely approach for riverfront development, Court Street is important in terms of its views and aesthetics. There is some retail development and residences along Court Street, but there are also large spaces that are vacant and low in terms of aesthetic appeal. These areas are primarily near the river and Scott's Cemetery.

The relocation of utility lines and the implementation of decorative lighting would enhance aesthetics on Court Street. Recent levee-top improvements have significantly enhanced views of Court Street as it approaches the levee. When driving east on Court Street, the recently completed promenade draws the eye up the levee and entices the visitor to continue toward the river.



Foot of Court Street.

M. NOISE AND ODORS

The project area is upriver from the Port of Greater Baton Rouge. There is commercial river traffic adjacent to the area, but the noise level is not higher than at other riverfront sites. Tugboat pilots use the river adjacent to the study area to arrange their barge fleets, which generates noise. Traffic from I-10 creates continuous light background noise. Commercial highway traffic on LA 1 is several blocks from the western edge of the project area. There are no railroad lines near the project area.

Various odors are apparent at different times of the year. The smell of roasted coffee emanates from the Port of Greater Baton Rouge on some days. Unpleasant odors that may hang in the air include natural gas, benzene, and other petrochemical products. Noise and odors will not affect riverfront development.

III. OPPORTUNITY INDICATORS

In order to properly plan for the future of Port Allen’s riverfront, an assessment must be made regarding the needs of stakeholders and citizens and potential opportunities presented by the location. Types of housing, recreational facilities, retail, structures, and public services are considered when planning for future facilities in the project area.

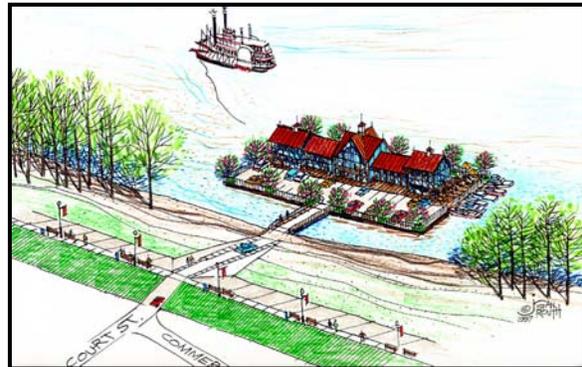
A. DEVELOPMENT INITIATIVES

It is first necessary to discuss steps taken in terms of organized development efforts before a discussion of individual indicators of demand and opportunity can take place. Several local development initiatives will impact riverfront and downtown planning in Port Allen. Findings from previous studies need to be taken into consideration before development concepts are generated.

1. Recent Planning and Development Efforts in Port Allen and West Baton Rouge Parish

a. Westbank Riverfront Development Studies

In 1996, The West Baton Rouge Chamber of Commerce formed the Riverfront Development Task Force. One of the first actions of the task force was to partner with the New Orleans District of the U.S. Army Corps of Engineers under the Planning Assistance to States (PAS) program to study opportunities and concepts for developing the riverfront at Port Allen. The resulting 1997 report, *Westbank Riverfront Development Studies, West Baton Rouge Parish, Louisiana*, was intended as a preliminary investigation and produced five conceptual designs with rough costs.



Floating platform development option proposed in 1997.



Access ramp on the levee.

In 1999, Port Allen was granted Federal funds to implement certain aspects of a riverfront design. Through a Corps/City partnership under the PAS program, plans for an improved riverfront were created. In May of 2002, ground was broken on the first phase of levee-top improvements in Port Allen. These improvements consist of a river overlook with ornamental lighting, special paving, benches, and interpretive signage; a promenade on top of the levee that extends 800 feet on each side of the overlook; and a levee ramp approach from Court Street. This project totaled \$1.1 million in construction dollars.

*Handicapped-accessible ramp
on the levee.*

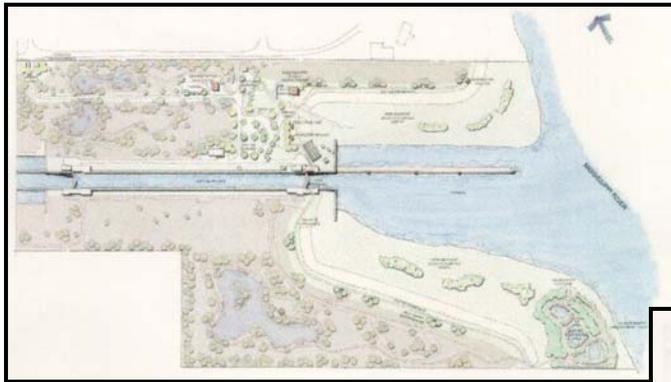


Mississippi River overlook.

b. Port Allen Lock Master Plan

The *Port Allen Lock Master Plan* is intended as a guide for the short- and long-term development. The report, prepared by the U.S. Army Corps of Engineers in 2002, also provides operational guidelines for the natural and manmade resources of the lock property. The

plan provides resource objectives, an overall land and water management plan, and associated design and management concepts. The Port Allen Lock will be a destination point for the bicycle path that would extend south from Port Allen.



Port Allen Lock Master Plan.

*Port Allen Lock Master Plan – sketch of
interpretive area.*



c. Atchafalaya Trace Heritage Corridor and the Mississippi River Heritage Corridor

West Baton Rouge Parish is part of two regional economic development/tourism initiatives: the Atchafalaya Trace Heritage Corridor and the Mississippi River Heritage Corridor. The objectives of both initiatives include:

- Preservation, management, development, and interpretation of the region’s unique natural and cultural resource points and patterns.
- Increased economic wellbeing through heritage and ecotourism development, service-related, and other job creation.
- Promotion of regional continuity.
- Sustainable community development.

The Atchafalaya Trace Heritage Corridor is composed of a series of state-designated scenic byways that run through thirteen parishes and circumnavigate the Atchafalaya Basin, one of the largest inland freshwater swamp systems in the country. Plans include development of a scenic byway and a marketing strategy aimed at ecotourism and education.

The Mississippi River Heritage Corridor is composed of the river roads that parallel both sides of the Mississippi River from Baton Rouge to New Orleans. This initiative focuses on preserving and enhancing the unique Mississippi River cultural landscape. In addition to being a gateway to the Atchafalaya, riverfront development in West Baton Rouge Parish could provide a thematic point of departure for this corridor to New Orleans by providing access to the river, interpreting trade and commerce on the river, and illustrating the river’s ecology and land-building processes.

d. Port Allen Downtown Revitalization Plan

In August 2002, a report was completed for the City of Port Allen that addressed the issue of downtown revitalization. The *City of Port Allen Downtown Revitalization Plan* is a planning effort based upon a review of the historical context of the city and a broad-based socioeconomic evaluation. Public input was solicited throughout the process, and issues that surfaced were verified and assessed by business leaders and residents. The study concludes with several recommendations for future development and redevelopment in downtown Port Allen:

- Need to maintain the historical context of the community.
- Need to stimulate population growth.
- Creation of a downtown with a sense of place – definable, interesting, multiple-use, and attractive.
- Need for more public space.
- Possibility of locating condominium and assisted living facility downtown.
- Renovate the Magic Theater.
- Establish businesses that have a regional draw.

In the report, a listing of Port Allen imagery was compiled as collected from past literature and during public meetings. The following represent images of the city or the area that shape residents' views:

- Levee-top view of the Baton Rouge skyline and the Mississippi Bridge.
- The Mississippi River – a scenic but busy, working, industrially based river of international importance.
- The Mississippi River Bridge – a major landscape structure and a frequent traffic impediment.
- The Mississippi River Industrial Corridor – the lifeblood of the community.
- The Port of Greater Baton Rouge.
- The home of Community Coffee.
- Agricultural commerce and a rural plantation setting.
- Brian's Furniture.
- The Atchafalaya Basin.
- The renovated historical depot.
- Late nightlife – today, an unfair image.
- Truck stop casinos.
- A small town across the river from a big city.
- Governor Henry Watkins Allen – the city's namesake.
- The Civil War.
- The oldest history lost to the river.
- The levee top project (in the near future).

Two distinct zones targeted for revitalization were identified. One area was designated as an incentive zone, and the other was designated as a redevelopment zone. The incentive zone is described as areas where “rejuvenation” is the recommended building modification plan. The incentive zone is located along Court and Jefferson streets (Figure 8).

The redevelopment zone is defined as the area where multiple groupings of homes and other buildings need to be replaced. This area was identified as a series of downtown blocks adjacent to the river, including a portion of the study area for the present report. After conducting a building condition evaluation, the planning team determined that this area was dominated by structures rated as poor, fair, or vacant. Many of the buildings are scheduled for demolition. Many are noted as being dilapidated, unsafe, and/or uninhabitable.

2. Recent Planning and Development Efforts in Downtown Baton Rouge

Future development scenarios for the Port Allen side of the river must be cognizant of what has occurred, what is presently occurring, and what may occur in the future in downtown Baton Rouge.

The present time is an exciting one for Baton Rouge's downtown and riverfront. After 30 years of decline, efforts are ongoing to bring residents and business back to the downtown, and city government is devoting a great deal of resources toward that end.

The development of Baton Rouge in the latter half of the twentieth century is not unlike that of hundreds of other communities across the nation. Suburban development began to take hold in Baton Rouge in the 1960s, shifting the population away from downtown. By the mid 1980s, nearly all major retailers had left the Central Business District (CBD). The population continued to move south along I-10, with retail centers established on College Drive. Most recently, the shift continues to the south away from the downtown with office parks developing at Essen Lane and the new Mall of Louisiana at I-10 and Bluebonnet.

In the 1990s, two major studies were completed whose intent was to revitalize the downtown and riverfront areas of Baton Rouge.

a. Baton Rouge Riverfront Development Plan 1990

The Baton Rouge Riverfront Development Plan was created in conjunction with the Downtown Development District. Its purpose was to focus on the current Baton Rouge riverfront and propose possible additions, improvements, and connections to the riverfront to attract businesses, residents, and visitors. The recommendations of that plan resulted in the Baton Rouge Riverfront Development Project, which proposed future development of an 18-acre downtown area. The plan included a new state capitol complex of buildings intended to increase employment in the downtown area with more than 2,000 state workers.

b. Plan Baton Rouge 1998-2008

Plan Baton Rouge is the result of a one-week planning charette in June 1998. The primary aim of the document is to identify actions that will maximize further private investment in downtown Baton Rouge. It serves as a “detailed blueprint that will shape the future of Baton Rouge.” The document sets forth actions, designates responsibilities, and identifies funding sources.

Plan Baton Rouge recognized 4 distinct districts in downtown Baton Rouge: the Catfish Town District, the Old State Capitol District, the State Capitol District, and the CBD. The plan defines these districts as places that should be specialized for one primary use or activity. *Plan Baton Rouge* also recognizes two distinct neighborhoods in downtown and details the steps needed to make these residential areas more attractive. The plan also identifies several corridors that need to be established or enhanced. The plan outlines several other opportunities for redevelopment, including improvements regarding commercial development, transportation, codes, and streetscape design. The goal for *Plan Baton Rouge* is to ultimately make downtown a destination for residents and visitors again:

As these proposals are implemented Downtown Baton Rouge will resume its traditional role as the vital center of the Parish and the active Capitol of Louisiana. Third Street, once again, will be a thriving retail destination. Residents will be coming Downtown to go to the movies and to purchase local produce at the public market. Tourists will be lodged in downtown hotels. The expanded State Capitol District will bring thousands of additional people Downtown. Together with the residents of Spanish Town, Beauregard Town, and

affordable new rehabilitated downtown housing, they will restore a lively pedestrian environment morning, noon and night.

Since *Plan Baton Rouge* was introduced in 1998, several projects have gotten underway in the city's downtown area. The convention center, the Centroplex, is currently undergoing an expansion. At least two condominium developments are in the works. A downtown farmer's market opened in late 2002. Called the "Main Street Market," it is a collection of shops open seven days a week, with outdoor vendors on Saturdays.

Many older buildings are undergoing extensive renovations in the downtown area. For example, the 1920s Auto Hotel is being renovated and will become the LSU School of Art. This will become part of the Downtown Baton Rouge "Arts Block," which eventually will contain the Douglas L. Manship Sr. Performing Arts Theater, a new LSU Museum of Art, the LSU School of Art, retail space, and restaurants. The Arts Block, also known as the Shaw Center for the Arts, is scheduled for a February 2005 opening, with a price tag of about \$50 million, including \$27 million in state money.

To summarize, it is clear in discussions with planners, stakeholders, and citizens that Port Allen's role should be complementary to that of Baton Rouge. Special niches must be fostered and created in Port Allen. Merely duplicating facilities and services available in Baton Rouge would not be advisable for the community on the west bank of the river.

B. NEED FOR AN ADDITIONAL RIVERFRONT RECREATION AREA

The river levees and battures present a great opportunity for development as recreation areas and usable greenspace. This is important because residents of West Baton Rouge Parish and Port Allen are underserved in terms of recreation availability.

A significant recreation area that is in the planning stages is DeSoto Park in Baton Rouge. DeSoto Park will be located on 22 acres of low-lying land bordering the Mississippi River. The land is directly west of the state capitol complex, south of the ExxonMobil refinery, and directly east of the old ferry landing in Port Allen. The park may contain an outdoor theater, bike paths, and boat landings.

Pedestrians currently enjoy greater facilities in West Baton Rouge Parish as a result of completion of the 2003 TEA-21 levee-top improvements. There is, however, still an unmet need in terms of recreation. New park development across the river in Baton Rouge will add to the interest and variety of outdoor experiences in the metro region. A ferry or water taxi at Port Allen could serve recreation in Baton Rouge, because there is currently no way for bicyclists and pedestrians to cross the Mississippi River.

C. POPULATION GROWTH AND ECONOMIC DEVELOPMENT

West Baton Rouge Parish and Port Allen have not been full participants in the rapid growth of the Baton Rouge metropolitan area. The population of the parish in 2000 was 21,601, which represents an 11.2 percent growth since 1990. Port Allen lost population during the same period.

Its population of 5,278 represents a 16 percent decline since 1990, and it's lowest since the 1960 census. One reason for the decline is that city dwellers are moving into subdivisions outside of the city limits. Another reason is the lower birthrate attributable to an aging population.

With respect to educational attainment, 11.1 percent of persons in the parish 25 years old or older have a college degree, and 73.4 percent have a high school diploma. In Port Allen, 12.6 percent of persons 25 years old or older have a college degree, and 65.4 percent are high school graduates. In 1997, retail sales per capita were \$6,094 in West Baton Rouge Parish compared to \$11,337 in East Baton Rouge Parish. This indicates that West Baton Rouge Parish residents may prefer to do much of their shopping at the larger shopping centers in Baton Rouge. There has not been any significant major retail development in recent years in West Baton Rouge Parish.

There have been several new warehouse facilities and expansions of industrial facilities near Port Allen since 1997. West Baton Rouge Parish has a significant industrial base, and much of the tax revenue is derived from the industrial corridor. A large proportion of the residents in the parish and Port Allen are employed in the industrial sector, working for companies such as DOW, DSM Copolymer, Trinity Marine, International Piping, and Placid Refining among others. A significant percentage of residents also work in Baton Rouge, where they are primarily employed by the university systems or in state government.

If nothing is done to enhance and revitalize the riverfront and downtown – the historic heart of Port Allen – the population and overall quality of life may continue to decline. Development of the riverfront has the potential to spur population growth and economic growth. Port Allen could become an attractive place for Metro Baton Rougeans and out-of-towners in which to visit or even relocate.

D. ALTERNATIVE GROWTH AREA

Baton Rouge has grown eastward and southward over the past 40 years. As the city grew, the commercial and shopping center of the city also moved. Commercial and retail areas are now dispersed along Florida Boulevard and the I-10/Essen/Bluebonnet/Siegen Lane corridors. Significant growth has spread into Livingston and Ascension parishes. West Baton Rouge Parish has not participated in the growth of the Baton Rouge metropolitan area. The primary reasons for this lack of development, as determined through previous surveys, are the perceived barrier of the Mississippi River and public image. It has been noted that the real or perceived impediment of the I-10 bridge crossing has hampered urban growth in the past. The perception of the bridge and river as obstacles appears to be decreasing over time as infrastructure problems increase in many areas of East Baton Rouge, Livingston, and Ascension parishes.

A significant amount of new public and private construction in downtown Baton Rouge has the potential to draw the population back towards the center of the original city. An ongoing relocation of state offices is expected to bring an additional 2,000 employees downtown. There has also been renovation of private office buildings downtown. Many of these new downtown employees now live in the easternmost and southernmost areas of Baton Rouge. The lengthy commute downtown may influence them to consider purchasing a new home closer to their place of work. State employees may be particularly likely to move, because their income levels caused

them to live on the outskirts of Baton Rouge where housing costs are lower. Port Allen is in a good position to lure prospective homebuyers who are employed in a revitalized downtown Baton Rouge.

West Baton Rouge Parish in general and Port Allen in particular are in an excellent position for growth should there be a shift in attitudes or initiatives against sprawl. Growth in the Baton Rouge area has tended to follow post World War II development models, but may revert to older models of multiuse development as some other communities across the country have. Proposed improvements on the riverfront may serve as a catalyst for other forms of development in Port Allen and bring residents to the city. It could show that communities on the west side of the river are serious about development and capable of competing with communities to the east in terms of attracting and retaining residents.

E. ALTERNATIVE HOUSING PATTERNS

The growth of Baton Rouge has been based on automotive transportation. Both residential and commercial real estate development has been based on zoning rules that facilitate automotive transportation. New developments have moved farther from the original city as Baton Rouge grew southward and eastward. Living in most areas of Baton Rouge requires an automobile for shopping and employment.

Since Port Allen is located directly across the river from downtown Baton Rouge, riverfront residential development could allow commuters to work downtown without using an automobile. This possibility is dependent upon implementation of a water taxi or passenger ferry. New development could have residential and retail facilities co-located. Residential units would ideally be situated above some of the retail stores. A mix of various retail establishments is recommended.

In 2000, the homeownership rate in West Baton Rouge Parish was 78.8 percent. Only 7.4 percent of the housing units were multi-unit structures. In Port Allen, the homeownership rate is 72.9 percent, with the remainder (27.1 percent) living in renter-occupied units. A preliminary survey of the study area indicates that home rental is more prevalent in the study area than in the city as a whole. According to the 2000 Census, 93 housing structures were built in the parish from 1995 through 1998, and 14 were built from 1999 through March 2000. These numbers show a stable population base in the parish. There is, however, a lack of variety in terms of housing options.

Housing solutions that are both innovative and creative may draw residents to the city. Condominiums and developments geared toward retirees, such as assisted living facilities, offer a potential for drawing upon these underserved markets. Suggested improvements detailed later in this report offer housing possibilities that could provide alternatives to what is presently offered in the Baton Rouge market.

1. Condominiums

In Baton Rouge, developers are currently striving to meet the apparent demand for condominiums. A prominent Baton Rouge developer is planning to open a 23-story, 130-unit condominium development in 2004. The condo tower, One River Place, will be built on Baton Rouge's riverfront, and each unit will have a view of the Mississippi River. Another developer is planning on constructing a smaller complex adjacent to One River Place. That condominium building will have about 30 units. Prices per unit for both complexes will range anywhere from \$200,000 to \$1,000,000.

It is interesting to note that both developments propose to incorporate mixed retail into their design. A very significant aspect of workshops such as *Plan Baton Rouge* was the introduction of the term "Smart Growth" into the vocabulary of local planners and developers. One element of the Smart Growth planning movement is the idea of multiple and mixed land uses. Other central issues to Smart Growth are the creation of a range of housing opportunities and choices, creation of walkable neighborhoods, encouragement of community and stakeholder participation, and provision of a variety of transportation choices.

This report includes suggestions for developing condominiums in tandem with a mixed retail environment.

2. Assisted Living

Another type of housing that is a viable option for Port Allen's riverfront is assisted living. The desire for a multistory assisted living facility overlooking the Mississippi River has been expressed by stakeholders and residents of the community. The concept of assisted living is described by the National Center for Assisted Living (NCAL):

Assisted living is a long-term care alternative for seniors who need more assistance than is available in a retirement community, but who do not require the heavy medical and nursing care provided in a nursing facility. While many seniors relocate to an assisted living residence after period of rehabilitation in a nursing home or hospital, nearly half come directly from their homes.

Assisted living residences are designed to be operated, staffed, and maintained to best meet the needs and desires of their residents. Security and independence, privacy and companionship, and physical and social well-being are the primary characteristics of an assisted living setting; this accounts for its popularity among seniors and their families. Individuals receive, as needed, supervision, personal care assistance, and health care services that emphasize their right to control their lives.

Extended life expectancy and the graying of America will fuel demand for a variety of long-term health care services. According to information summarized from the U.S. Bureau of Census, one in five Americans will be aged 65 or older by 2030 compared to one in eight in 2000. The population 85 and older is expected to increase by 33.2 percent between 2000 and 2010. In Louisiana, the population aged 65 and over is expected to increase 81 percent from

523,000 to 945,000 between 2000 and 2025. The number of seniors in West Baton Rouge Parish is expected to increase from 2,040 in 2000 to 3,290 in 2020; and the number of seniors in East Baton Rouge Parish is expected to increase from 40,400 in 2000 to 65,210 in 2020.

Assisted living is a less costly alternative to nursing homes or home health care. On average, the per-diem rate for assisted living in a private room is about two-thirds that of an equivalent room in a nursing home. Currently in the Baton Rouge area, assisted living facilities are just barely able to meet the needs of the elderly population. Many more facilities will need to be built in the coming years to meet demand based on population projections. Port Allen, which can provide great views and a pleasant, small-city atmosphere, is well positioned to take advantage of opportunities to service older populations as part of a multiuse environment.

An assisted living facility is suggested as a feature in the Comprehensive Plan contained later in this report. Other types of development geared toward aging Americans provide interesting possibilities for Port Allen that should be considered. One relatively new phenomenon is college-linked retirement communities. These communities are intended as retirement communities, but with a particular orientation. They are closely affiliated with universities and attract those interested in lifelong education. The proximity of LSU and Southern University to Port Allen makes this concept a possibility.

F. ADDITIONAL HOTEL SERVING DOWNTOWN BATON ROUGE

In 2001, after much anticipation, the first hotel to operate in downtown Baton Rouge for many years opened. This 300-room hotel is adjacent to the Centroplex Convention Center, the Argosy Casino, and the Catfish Atrium. The Old State Capitol, the Louisiana Naval Museum, and the Arts Block are in the immediate vicinity. Construction of this hotel by the Argosy Casino was delayed for several years because of concerns over the viability of a downtown hotel. A major issue for large hotels is the convenience of restaurants and shopping for visitors. Downtown Baton Rouge has not had a sufficient number of these facilities for hotel management to consider it a viable location. The significant amount of public and private construction in downtown Baton Rouge should reduce these deficiencies. To date, occupancy figures for this particular hotel are not available.

The abandoned Capital House Hotel has been evaluated for possible renovation. This hotel renovation would potentially provide another 300 rooms for downtown Baton Rouge. However, the renovation of this hotel is uncertain because significant renovation would be necessary.

Until recently, the limited demand for downtown hotel rooms has been met by shuttle service from the many hotels in central Baton Rouge. These hotels are near primary shopping centers and near the I-10-I-12 split, through which most interstate traffic flows.

A hotel located in Port Allen is a feasible alternative to hotels located in Baton Rouge. Considering the revitalization and expansion of convention facilities occurring in downtown Baton Rouge, a Port Allen hotel with a view of the riverfront could be a viable location for conventioners and tourists. A small (100 rooms or less) garden hotel that could also serve

visitors to the West Baton Rouge/Port Allen/Atchafalaya areas would greatly benefit from public transportation to downtown Baton Rouge to make it competitive in the Baton Rouge market.

G. DOWNTOWN NEIGHBORHOOD REVITALIZATION

Two areas in downtown Port Allen are targeted for revitalization in the *City of Port Allen Downtown Revitalization Plan*. The incentive zone, which is situated along the Court Street and Jefferson Avenue corridors, is designated as a district where rejuvenation of the commercial sector is recommended. The redevelopment zone, which is represented by 10 city blocks closest to the river between Avenue A and Maryland Street, is an area where demolition and reconstruction should be the primary revitalization method. Riverfront development features recommended in this report are complementary to these revitalization needs.

H. MISSISSIPPI RIVER PASSENGER FERRY

The landside elements that would be the responsibility of private developers would have a greater chance of being economically successful if a passenger ferry or water taxi was established between Port Allen and Baton Rouge. The ferry would enable the proposed hotel in Port Allen to serve downtown Baton Rouge and to allow residents to commute to employment downtown. The passenger ferry is likely to have the highest operating cost of any feature.

In order to properly serve West Baton Rouge Parish, the ferry would need to operate daily, year round. It will need to transit frequently during commuter hours and continually for 15-18 hours per day. During prime commuter periods, two round trips per hour would be minimal for residents to consider the passenger ferry a viable commuter option. Without extended hours of operation the hotel and restaurants will not be able to serve many visitors to the Baton Rouge Centroplex. Also, the passenger ferry should be covered for inclement weather and able to carry bicycles. These requirements are in addition to the requirement for the vessel to be seaworthy for transiting the Mississippi River.

A review of the operating costs of the passenger ferry should be completed. A review of published literature and the National Transportation Database did not locate any passenger ferries on the Mississippi River similar to the type necessary for Port Allen. The Louisiana Department of Transportation and Development operates many ferries, but except for one in Orleans Parish, these are automobile ferries. The passenger ferry in Orleans Parish carries 400 passengers, which is larger than practical for a potential Port Allen ferry. The Quad Cities Metrolink in Davenport, Iowa, operates the only other passenger ferry on the Mississippi River, but it is a seasonal operation, from Memorial Day to Labor Day.

Several passenger ferry operations nationwide operate in similar conditions (length of ferry trip, character of the waterway) to the Mississippi River in Baton Rouge. The Massport Authority operates a passenger ferry from downtown Boston to the airport across the harbor. Also, the New York Waterway Company operates several passenger ferry routes across the Hudson River. These passenger ferries, which serve much larger populations, cost \$7 to \$10 one way, although monthly commuter discounts are available.

Federal funding for passenger ferry service has been available from the U.S. Department of Transportation. Funding and technical assistance may also be available from the Louisiana Department of Transportation and Development. A review of subsidies and grants should be conducted.

I. ADDITIONAL SERVICE INDUSTRIES

At present, Port Allen is lacking services that will support an increase in residents and visitors to the area. A visitors landmark that will help draw tourism and other establishments such as restaurants and shops that will enhance the quality of life is needed.

1. Visitors Landmark

There is no visitors landmark geared towards interstate travelers where I-10 crosses the Mississippi River. Landmarks are used to attract long-distance travelers at other interstate highway crossings of the Mississippi River. For example, Vicksburg, Mississippi, has a tourist center and river overlook at the I-20 crossing immediately south of the historic downtown. Memphis, Tennessee, where I-40 crosses the river, and St. Louis, Missouri, where I-70 crosses the river, have major landmarks clearly visible from the highway. Memphis' Mud Island, visually dominated by the Pyramid, has tourist facilities and ample parking for visitors. The Jefferson Memorial Park in St. Louis is itself a tourist destination. These cities are successful at attracting many long-distance travelers to their riverfronts.

The Port Allen side of the river provides the best opportunity for a Mississippi River-oriented landmark. Port Allen has space available for immediate development along its riverfront and has views of Baton Rouge that are critical for travelers to obtain a quick sense of the region. A landmark would be more successful on the west side of the river because there is less visual "competition" than on the east side. Travelers on I-10 would immediately see the Port Allen riverfront when traveling east to west.

2. Restaurants

There is a lack of restaurants near the river in Port Allen. Most restaurants within the city limits are confined to fast food stores along LA 1. In and around the project area, there is only one sit-down eatery – a small sandwich shop. There is a lunch shop in the downtown area, but it only handles to-go orders.

A minimum of three new eateries will need to open in order to support the level of visitation projected for the Port Allen riverfront. A restaurant on or very near the riverfront is desirable to take advantage of the views and ambience of the Mississippi River.

3. Retail

There is a small retail component in downtown Port Allen. This retail component needs to grow in concert with other riverfront development. Retail services that will be needed include grocery stores, clothes stores, hair salons, and various other types of shops and services.

IV. CASE STUDIES

For centuries, the American city relied on the river that ran through it for its very existence. It was the river that provided the means to transport people, goods, and services from one town to the next. Most every city or town that grew up alongside the river was energized by it, and it was a source of pride to the people who lived nearby. Homes, businesses, schools, and parks were concentrated in or near a downtown area that was oriented towards the river.

In the twentieth century, as the automobile became the primary means of transportation, the riverfront areas of these cities and towns started to take on less importance. By the 1970s, many of the riverfronts were virtually abandoned. Often, riverfront areas were neglected, blighted, and, in many cases, dangerous.

By the latter decades of the twentieth century and into the first few years of the twenty-first century, communities recognized the need to reclaim their riverfronts. The experiences of these communities can serve as examples for those cities or towns wishing to reclaim their own. The case studies that follow provide inspiration and ideas for what can be done at Port Allen. Evidence of Corps of Engineers participation is also provided where appropriate.

A. MEMPHIS RIVERFRONT

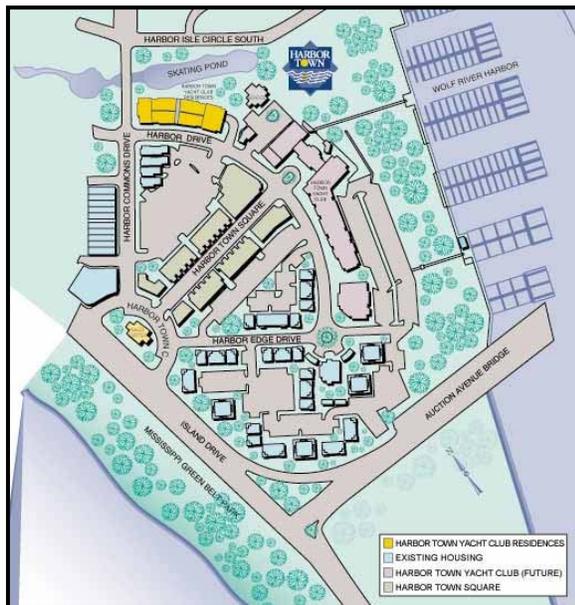
The city of Memphis, Tennessee, has been and still is currently undertaking extensive riverfront redevelopment to reconnect its downtown to the Mississippi River. Historically, the Mississippi River has played a vital part in the city's development. In the past 50 years, however, the reliance on the river as a means of transportation and commercial aspects has diminished, and most development has moved away from the river. Flood control systems were added to control the extreme fluctuation of the river, which resulted in further separation of the city and river. During that time, the Mud Island peninsula was formed. This meant that the city not only sat well above the Mississippi River, but was also much farther away. Other obstacles such as heavy traffic, railroad tracks, and land use restrictions on riverfront properties made the riverfront practically inaccessible.

Many steps are now being taken to reverse the outward trend and orient the city back to the Mississippi River. The Riverfront Development Master Plan for Memphis is designed to connect the downtown and the riverfront as a seamless whole by being sensitive to the place while creating real yet achievable projects that are both stimulating and compelling. This will be achieved by creating a street/block plan that controls where development occurs, drawing people from downtown to the water. There, land and water will meet at a public riverfront connecting various districts along the river and renewing the historic maritime image of Memphis.

A major part of the plan was the reclamation of Mud Island. The work on Mud Island and along Memphis Front (Tom Lee Park) was constructed under the Corps of Engineers' Channel Improvement Program and funded under the Mississippi River and Tributaries Project (MR&T). This work was authorized by the Flood Control Act of 1928. The revetment along Mud Island was placed to protect the existing bank from erosion, while the work at Memphis Front was constructed because of a history of bank instability and erosive currents from nearby dikes. This

alignment is critical due to the narrow width of the river and the channel approach to the existing bridges. Also, the Corps constructed the stability dike and dredged backfill to a partial elevation in order to obtain an adequate Factor of Safety against bank failure. The City of Memphis, later and at their own expense, raised the stone dike and the fill behind it in order to facilitate the development of the riverside park.

Today, Mud Island is home to Harbor Town, a mixed-use community with over 1,000 residents and can be reached by bridge. It also hosts the Mud Island River Park, featuring a five-block long scale model of the Mississippi River and the cities along it. This attraction provides pedestrians with an educational journey of historical events and geographical information. The River Park also provides visitors with the opportunity to canoe, pedal boat, and airboat ride on the lake that has been created between Mud Island and the downtown. Long stretches of the 4.8-mile long Riverwalk are also located on Mud Island. The Riverwalk is located on a high bluff overlooking the Mississippi River and is lined with benches, lighting, and landscaping. Future developments include more pedestrian bridge connections across the lake to Mud Island, including the construction of a land bridge.



Master Plan for Harbor Town, Memphis.

The downtown itself will serve as gateways to link the city to the river. Each street will terminate in a way that relates back to the Mississippi River, either by a bridge to Mud Island or by stairs leading down to the river itself. Restrictions on building height and form are in place to reinforce open spaces, define corridors, and link the inland neighborhoods to the island. The idea is that buildings step up as they get farther from the river so that all share views. Additional developments will include new neighborhoods and the civic and cultural district.

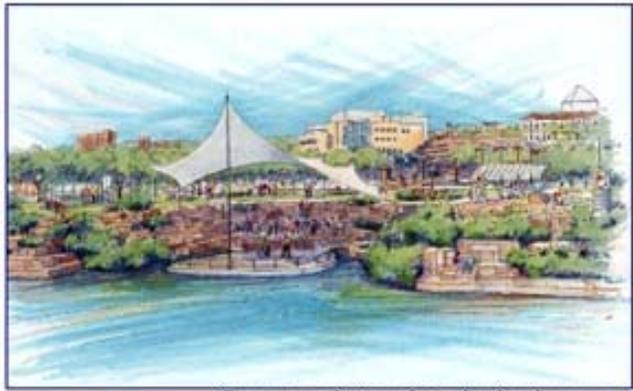
A series of parks along the riverfront connect the districts and Mud Island, forming a singular system that continually references back to the Memphis’s historic lifeblood, the Mississippi River.

A scale model of the Mississippi River can be seen at



B. ST. PAUL RIVERFRONT

Mississippi Place, also known as Upper Landing Park, is located on the left bank of the Mississippi River in St. Paul, Minnesota. The riverside park and interpretive facilities at Mississippi Place will provide visitors to the Science Museum of Minnesota a unique opportunity to interact with the environmental, flood control, navigation, and recreation uses of the river. Through hands-on exhibits and demonstrations, visitors will be able to explore the ecological, economic, and environmental systems of the Upper Mississippi River. A key element is a pedestrian bridge that will provide safe access for visitors from the Science Museum building across the railroad tracks to the riverbank where outdoors exhibits and a riverbank restoration area will be constructed.



Concept rendering of riverbank enhancement

The Corps of Engineers participated in this project under Section 577 of the 1999 Water Resources Development Act. This act authorized the Corps of Engineers to enter into a cooperative agreement with a non-Federal sponsor for the planning, design, and construction of infrastructure and other improvements at the area adjacent to the Science Museum known as “Mississippi Place.” The authorization provisions set the Federal share of the project cost at 50 percent.

In 2003 the Corps will be working with the City of St. Paul to establish a cooperative agreement that will enable the Corps to participate in planning, design, and construction of infrastructure improvements at Mississippi Place. Up to \$3 million in Federal funds has been authorized to carry out the project. In FY 2003 \$500,000 was appropriated.

C. WATERFRONT PARK IN LOUISVILLE

The Waterfront Park in Louisville, Kentucky, has captured international attention and won several awards for its successful design. This master plan is a direct response to the trend of urban riverfront cities to move outward, rather than concentrating on the river as a core.

Louisville’s city wharf was once busy with steamboat trade and industrial purposes. Over time, however, warehouses, barge facilities, and junkyards claimed much of the riverfront. Rail lines were also built along the river for industrial purposes, and with the addition of I-71 and I-64, the city was physically removed from the Ohio River.

Hargreaves Associates and Bravura Corp. co-designed the Waterfront Park, creating a park atmosphere directly linked to the Ohio River while grading the entire project to provide for flood protection and barge wake. Unused land beneath the interstates is used as parking and sheltered seating areas, providing for a break from the sun or cover from rain. A landfill was even converted into a little league baseball facility, Slugger Field. In a future phase of the master

plan, the abandoned Big Four railroad bridge is set to be transformed into a pedestrian bridge across the Ohio River.



Master Plan for Louisville's Waterfront Park.

Waterfront Park utilizes flexible open spaces to create a multi-use environment that serves both large festivals and everyday use. The Great Lawn is the centerpiece of the park. Over 100 events take place every year on this expansive lawn, resulting in an attendance of over 1.25 million people. When not being used for a festival, it is used by local citizens for general play and team practices. Jogging paths run throughout the park alongside the river and feature native plantings and wetland development. These connect the children's adventure play area, additional recreational fields, and an informal amphitheatre. The centerpiece of the second phase of the park can also be reached by these paths as the park reaches a more urbanized atmosphere. Picnic areas, a children's play fountain, and various other urban plazas with water features draw one to the river's edge where a physical connection is made. On this end of the park are a variety of existing restaurants, and new high-rise condominiums are being built in close proximity to downtown. At this point the park merges with the CBD to form a transition from a natural environment to the urban cityscape.



Children's play fountain in Louisville's Waterfront Park.

The Corps of Engineers involvement in the project included \$100,000 in FY 2001 to prepare a master plan and determine Federal interest and budget appropriations of \$500,000 in FY 2002 and 2003 for design. These funds have not been expended because a design agreement is lacking.

D. INDIANAPOLIS CENTRAL WATERFRONT

This waterfront project's intent is to mitigate flood damage and develop commercial and recreational use along the waterfront area that includes the Indianapolis Water Company (IWC)



*Celebration Plaza,
Central Indianapolis Waterfront.*

Canal, Fall Creek, and the White River. The project is a joint effort between the city of Indianapolis and the state of Indiana. To date, nearly \$100 million in federal dollars and \$50 million in nonfederal dollars have been allocated to the project.

This 10-year project was initiated with a concept master plan, funded by the Army Corps of Engineers, for the nine-mile corridor of the White River that runs through central Indianapolis, Indiana. According to Sasaki Associates, Inc., the aims of this master plan were threefold: first, to reclaim the river as a civic resource for the daily life of the inhabitants and visitors to the city; second, to make the river an identifying topographic

*Plan for Beveridge pump house area,
Central Indianapolis Waterfront.*



symbol of the city; and finally, to reverse the environmental and economic decline of this district. These goals were part of a vision for an urban park system that would link the downtown with the river. It is the aim of the project that all future developments in the area would face onto the park and river, rather than “turning their backs” on the river.

E. BOSSIER RIVERWALK

Located on the Red River, downtown Shreveport is the center of business for the Ark-La-Tex area. Directly across the river lies the growing town of Bossier City. Together, these cities are forming a united riverfront development that is proving successful. Some of the biggest attractions are the riverboat gaming facilities located on both sides of the river. Shreveport is ranked the fifth most-popular gaming destination in the United States. Theme hotels and casinos have led the redevelopment of the Riverfront Development District, resulting in a series of new development and master plans for the improvement of community plazas and shopping districts.

A variety of entertainment and commercial industries are taking root in the Shreveport/Bossier City downtown. People can visit attractions such as the Shreveport Symphony or the Antique and Classic Vehicle Museum. The Long Allen Bridge is a point of interest, showcasing neon lights and fiber optic cables that transform it into a sculpture of light. Fine dining and nighttime entertainment can be found throughout the riverfront and downtown areas of both cities, within walking distance of hotels. There are also riverfront parks in development in both Shreveport and Bossier City. There are outdoor theatres to host events and festivals.



Plan for the Riverwalk Entertainment District, Bossier City, Louisiana.

With the success of the area, more development is on the way. A new Convention Center is being located in downtown Shreveport because of the location and atmosphere that has been created. A full-service marina with interactive fountains and river walks is also being developed on the riverfront. Bossier City is anticipating the opening of its own riverside complex, Experience at Riverwalk. This will feature a mixture of retail, live performance theatres, a marina, an amusement park, hotels, restaurants, and a movie theatre, all emphasizing Louisiana's jazz traditions. The

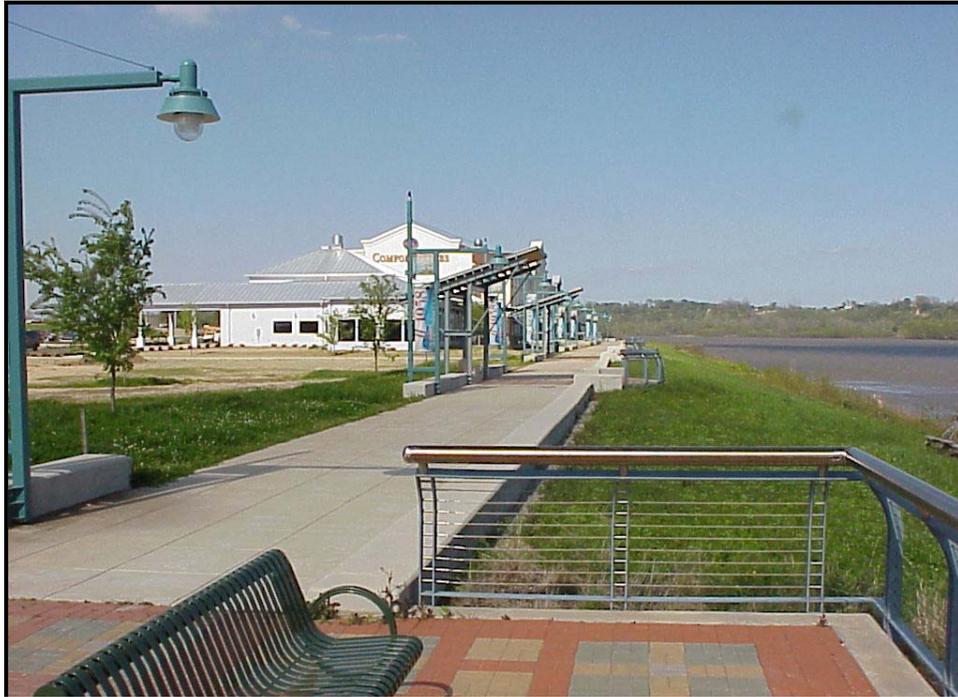
development of these two cities using the shared resource of the Red River as a backdrop provides an example of master planning in other river cities.

F. VIDALIA RIVERFRONT

Vidalia, Louisiana, is located directly across the Mississippi River from Natchez, Mississippi, a town known for its antebellum heritage. Natchez is located on a 200-foot bluff far above the river and overlooks the flood plain on the opposite side. Below the bluff, however, is where the town got its start. Known as Natchez-Under-the-Hill, this area has always been prone to harsh flooding. In the past, people moved up to the bluffs overlooking the Mississippi, leaving only gamblers and boaters under the hill. Today, a modern riverboat casino finds its home in Natchez-Under-the-Hill, along with a few hundred-year-old bars appearing to be out of the old west. As Natchez is slowly reclaiming land lost during flooding, plans are being developed to enhance Natchez's new riverfront. Developers are currently being selected to design plans that will bring businesses, restaurants, and hotels to Natchez-Under-the-Hill, providing new opportunity for the town and for tourism.

Across the Mississippi River, the town of Vidalia, Louisiana, is also implementing the development of riverfront property. Building on its relationship with Natchez and the area's history, a riverfront park is being developed. Called Vidalia Landing, this riverfront development is of particular interest because it is entirely built on the riverside of the levee. Vidalia Landing serves as a welcoming center to Louisiana and features a paved walkway with overlooks, a restaurant, a hotel, public restrooms, and an amphitheater. The development will soon have other commercial establishments such as doctors' offices, a visitor center, a shopping

area, and a public marina. Additionally, there will be recreational fields, picnic areas, and a tennis complex for public use. There are locations for future development of additional hotels and condominiums.



Overlooks and benches along walkway, Vidalia, Louisiana.

V. COMPREHENSIVE PLAN FORMULATION

A. RIVERFRONT PLANNING PROCESS

In order to create a comprehensive plan, the project design team weighed the opportunities and constraints of both the site and program to best accomplish the goals. Preliminary designs included enhancements on the riverside of the levee as well as enhancement and/or revitalization on the landside of the levee. The Corps Project is defined as the riverside improvements as well as landside improvements that promote public access to the riverfront. The Port Allen Revitalization Initiative (PARI) is defined as the remainder of the landside improvements as well as some facilities that might be constructed on the riverside. It should be understood that the feasibility issues and cost estimates that follow this section are based on the Corps Project only.

West Baton Rouge Parish has just completed a first phase of development for its riverfront at Port Allen, which includes a levee promenade with seating, lighting, landscaping, and ADA access ramps (TEA-21 improvements). Plans are currently being formulated for expansion of the development to the north and south in conjunction with this master planning effort. Potential ties to the Port of Greater Baton Rouge, the Port Allen Lock, and Highway 190 and points north would enhance the riverfront experience.

The developmental purposes of the Corps Project are to create a safe and enjoyable place for people to experience the public waterfront and its surrounding amenities, which may serve as a catalyst for PARI efforts. Riverfront development is important in order to spur adjacent development in Port Allen. The goal of the Comprehensive Plan design is to incorporate and balance the objectives of the community and the U.S. Army Corps of Engineers with the site's opportunities and constraints.

The design team reviewed prior reports and conducted several meetings with the local sponsor and the local public. The communities of Port Allen and West Baton Rouge Parish expressed their concerns, wants, needs, and program objectives for the riverfront and downtown development. A meeting with West Baton Rouge Parish officials provided input pertaining to elements that were included in the design of the Comprehensive Plan. The potential local sponsor was involved in a series of coordination meetings to refine the concepts and the site design, and suggestions were incorporated into the final Comprehensive Plan.

Several onsite factors were considered in the development of design alternatives, including natural environmental factors, such as soils and terrain; flora and fauna; wetlands; hazardous, toxic and radioactive waste sites; precipitation and drainage; bodies of water; and climate. The constructed environment was also examined, including the historic architectural character of the area and early site development. In addition to the natural and constructed environment, the perceptual characteristics of the site were incorporated into the design process, including views, noises and odors, spatial patterns, and basic design elements such as scale, color, line, texture, and form.

Determining the context of the project site, including Port Allen and Baton Rouge, involved consideration of offsite factors such as transportation and circulation, cultural history, land use, zoning, demographics, economic constraints, tourism and tourist attractions, recreational facilities and programs, and educational resources.

Critical onsite and offsite factors were identified. Site opportunities and constraints were inventoried, and this information was used to guide development of the design concept. Using information from various sources, a series of design alternatives were created that met the project goals and objectives. Program opportunities and constraints were also examined in relation to the goals.

B. OPPORTUNITIES AND CONSTRAINTS

1. Site Opportunities

The riverfront at Port Allen provides many site opportunities. One of the most important is location. This is the only site where I-10 crosses the Mississippi River, which creates high visibility for the riverfront from the bridge. Location across the river from the Louisiana State Capitol in Baton Rouge also increases Port Allen's visibility.

Louisiana has a large tourism industry, and Port Allen is surrounded by many attractions, including plantation homes, sugarcane fields, the Atchafalaya Swamp and Basin, and the Mississippi River.

Port Allen's river location is fundamental to its capacity to attract tourists. People desire proximity to the river, and Port Allen can provide this access. The riverfront provides views of Baton Rouge, the Mississippi River Bridge, and maritime traffic. The landside of the levee, the revitalization zone, and the riverfront are approached by Court Street, which has an axial orientation and easy access to LA 1 and I-10. The levee exhibits a 20-30 foot elevation change, which provides opportunities for various design components. Declining neighborhoods and vacant lots on the landside of the levee produce an increasing need for redevelopment.

2. Site Constraints

The flood protection levee that borders the Mississippi River is seen as an obstacle because its height makes viewing the river from the landside impossible. There is no vehicular access to the batture and riverfront, and there are severe parking limitations in the downtown area. Because the batture is isolated, there is a concern about maintenance and about security for visitors. Site constraints identified in previous reports, meetings, and onsite visits are summarized as follows:

- Levee seen as an obstacle
- No vehicular access
- Parking limitations
- Maintenance/security
- Fluctuation of river

3. Regulatory Constraints

Corps of Engineers regulations provide constraints on construction that include:

- A prohibition of driving piles closer than five feet of the land side levee toe or 40 feet of the floodside levee toe and no closer than 50 feet from top of bank.
- No structures to be located on the Mississippi levee slopes or crown.
- Fill on the batture must not exceed one foot in thickness.
- No penetrations of the levee slope or crown.
- Utilities are to be placed above the authorized design levee section.

4. Program Opportunities

The project program is defined as a list of activity elements and facilities that comprise the Comprehensive Plan. Analysis of the site and discussions with stakeholders and residents of the community have revealed a program that will contribute to revitalization in downtown Port Allen. Currently, the riverfront area does not have a defined program. There is “green space,” but it is undeveloped, except for the levee-top improvements. This absence of functionality lends itself to creative design that can take advantage of the ideal site location of riverfront property. The riverfront site is adjacent to a sizable residential community, which will meet current need and demand and help to energize new recreational development.

5. Program Constraints

Constraints on the program are primarily related to costs associated with a riverfront development. The question of how plan implementation and ongoing maintenance operations will be financed needs to be addressed. The City of Port Allen will also be tasked with questions concerning land ownership and eminent domain. A summary of program constraints, then, is:

- City does not own levee/batture area or the downtown revitalization area
- New security measures will need to be put into action
- Increased level of maintenance and responsibility
- Cost of plan implementation

Figure 9 illustrates the main areas for development and how they correspond overall to the City of Port Allen. Based on the City of Port Allen Downtown Revitalization Plan, the downtown revitalization area is designated as the area north of Court Street. This area would be developed by the private sector and the City. The riverfront area of study is the land on the riverside of the levee at the terminus of Court Street. This area would be developed primarily through federal sources.

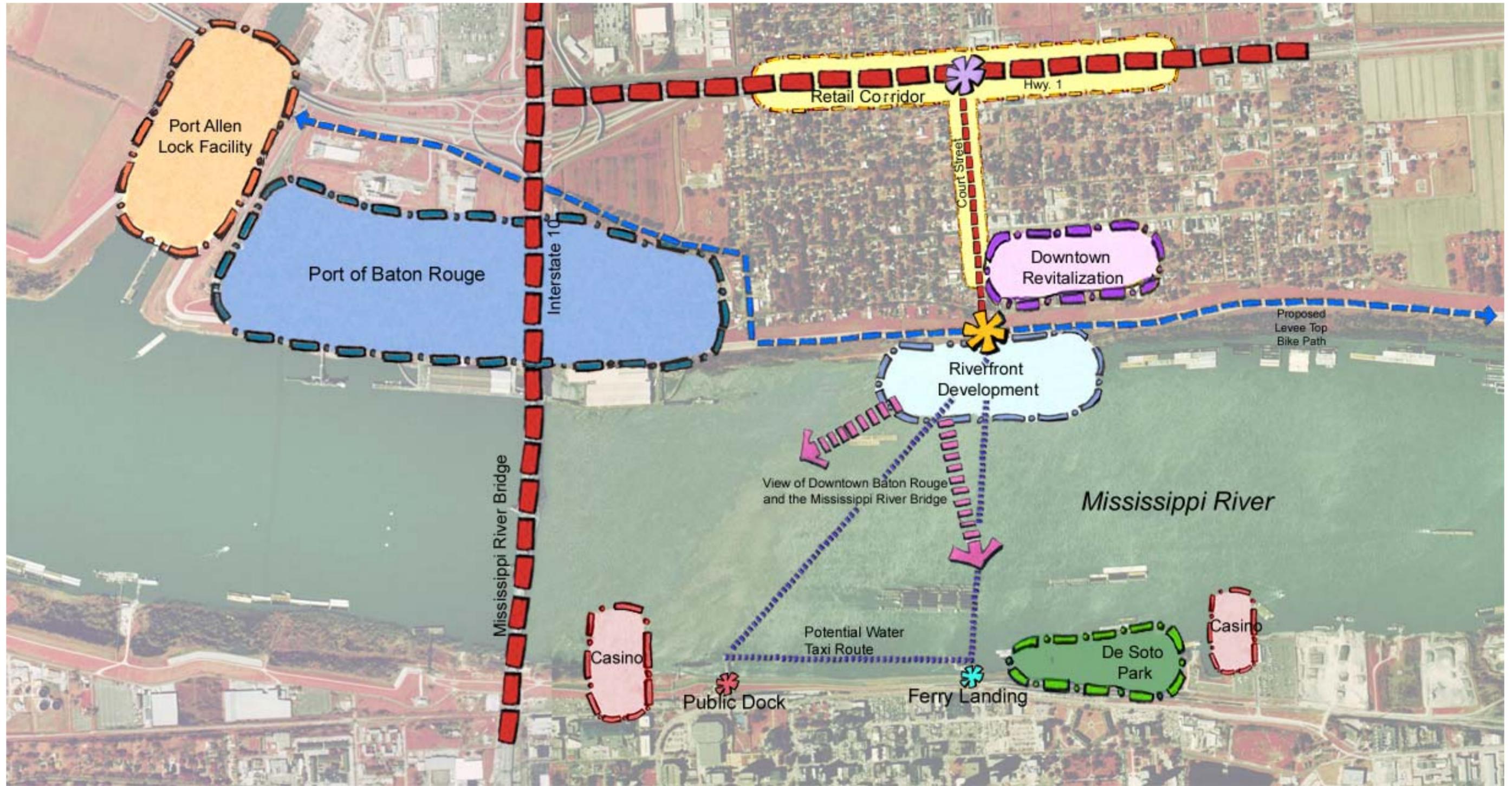


Figure 9. Existing and Proposed Elements, Views and Relationships

The major vehicular circulation affecting the study area includes I-10, LA 1, Court Street, and Roosevelt Street. The areas around LA 1 and Court Street are considered retail corridors. A potential water taxi route has been illustrated that would connect with the public dock and the old ferry landing in Baton Rouge. The levee-top bike path proposed route is shown with connection to the Port Allen Lock.

C. ALTERNATIVE PLANS

Four conceptual alternatives were developed that range from minor development to major development on both sides of the levee. Figure 10 illustrates the four conceptual plans in terms of their program elements and the relationships between those elements.

1. Scheme A

In Scheme A (Figure 11), the drive to the site is enhanced by adding a traffic circle to the Court Street and Atchafalaya Street intersection. Since LA 1 has become a more traveled and busy street, Court Street needs something to improve its image and boost its visibility. In the center of the traffic circle, a vertical element or monument is proposed. Since the levee is perceived as a barrier, this vertical attribute is extended to the wharf structure on the riverfront, enticing people to continue towards the river. A restaurant and retail visitors center with an ancillary outdoor seating area is at the terminus of Court Street, which extends onto the levee to a parking lot at the elevation of the top of the levee. Allowing vehicles to cross over the levee diminishes the barrier.

Once atop the levee, just past the restaurant, visitors are led into a large plaza that fronts the Mississippi River. This plaza extends over the water on a wharf structure, providing an opportunity for a personal river experience. The plaza extends the length of the wharf, taking advantage of the waterfront location. A grand lawn adjacent to the plaza can be used for the festivals and celebrations that take place on the riverfront. It can also be used on a day-to-day basis by people who simply want to sit on the grass and enjoy the view. Figure 12 shows a typical section cut at Court Street.

To link with downtown Baton Rouge, a water taxi service is proposed with a dock extending down from the waterfront plaza to the water level. Since the Mississippi River fluctuates dramatically, the dock will be floating, changing height according to the river level.

Focusing attention back towards the city, the grand lawn seems to extend over Roosevelt. The levee terraces down into a city park that encompasses an entire block. Responding to the demand for more residential capacity in the downtown area, the park is part of a multi-family ambiance with high-rise living. Figure 12 shows a typical section cut at the city park location.

This plan includes the development of a hotel and a condo or assisted living facility at the edge of the levee on either side of the city park. Each of the structures is proposed at a height that would enable visitors and residents to take advantage of the natural views provided by the riverfront. Parking is provided in garages at the lower levels of these multi-level structures. The

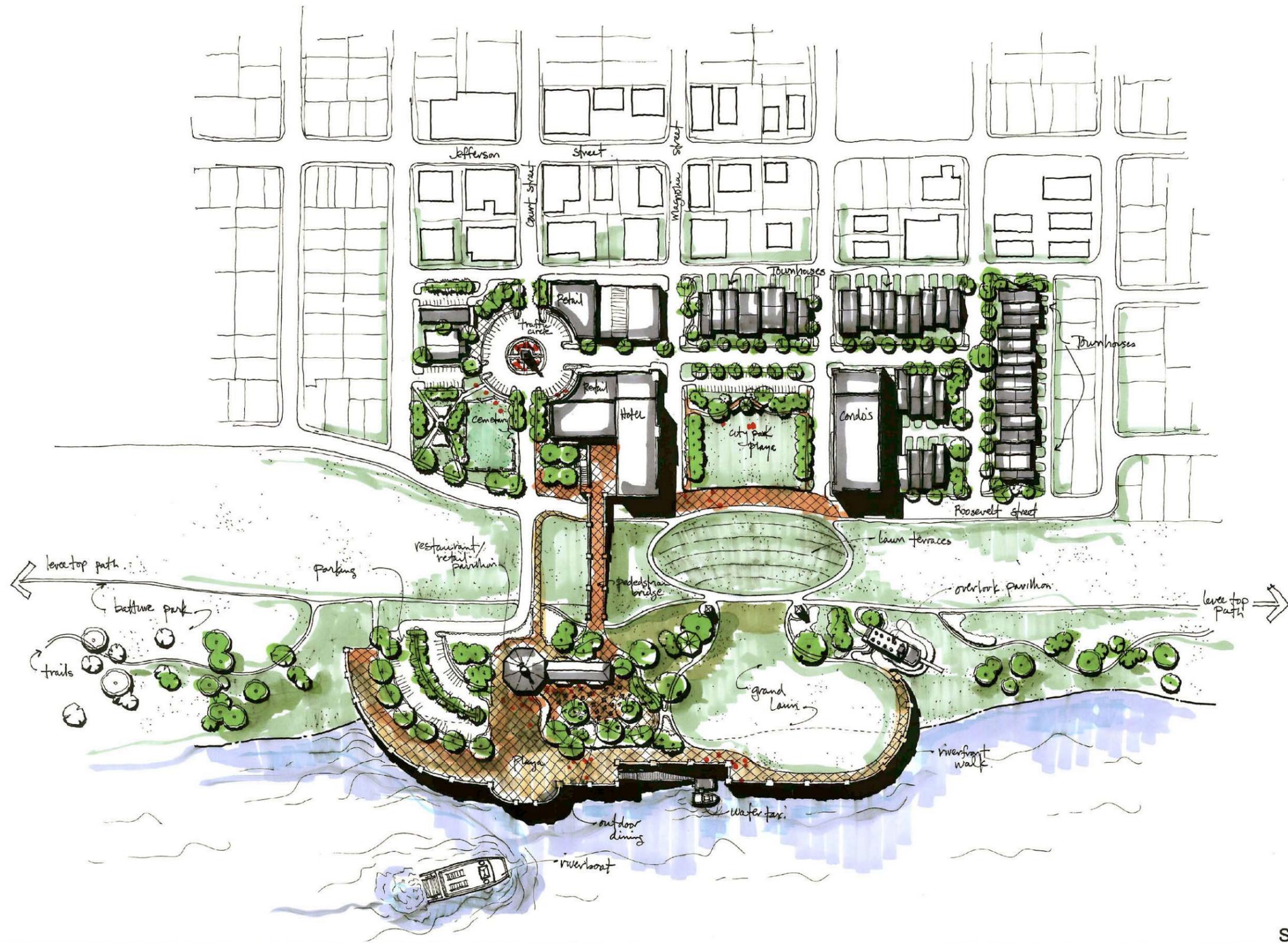


Figure 11. Scheme A

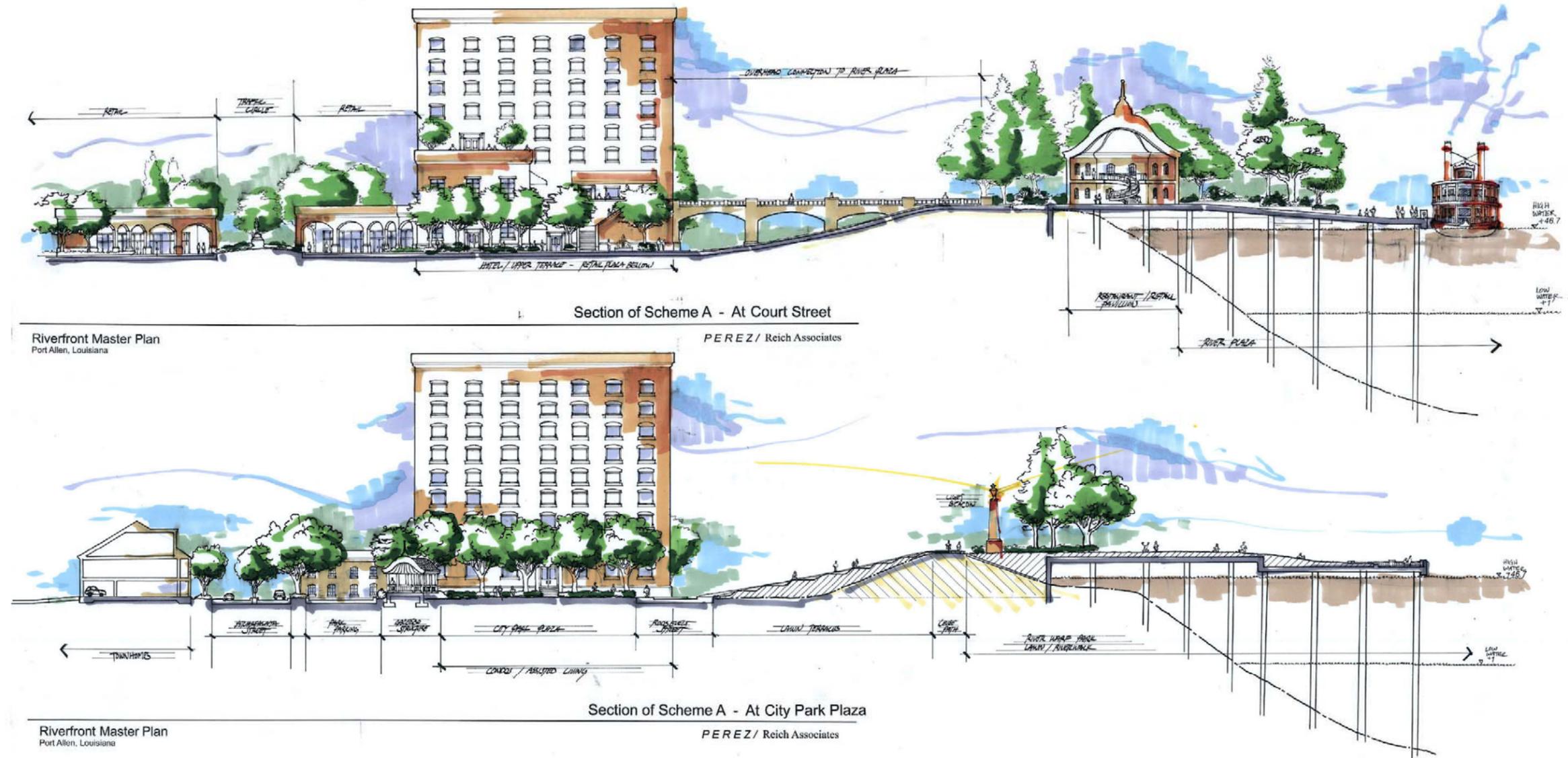


Figure 12. Scheme A Sections

hotel structure has an elevated pedestrian bridge over Roosevelt Street to the levee top, reducing the levee as a barrier.

Adjacent to the cemetery at the foot of Court Street is a memorial garden. Across the circle and surrounding it are a variety of retail and office infill buildings. Down Atchafalaya Street, in the redevelopment zone, there is an assortment of town homes that provide a variety of residential opportunities.

This development alternative contains both Corps Project and PARI elements. The Corps Project elements are:

- Wharf Structure/Plaza
- Open Green Space (“Grand Lawn”)
- Interpretive Trails
- Overlook
- Terraces
- Parking
- Entry Road Improvements
- Lighting

PARI Elements:

- Restaurant
- Water Taxi
- Riverboat
- Hotel
- Retail
- Condos

2. Scheme B

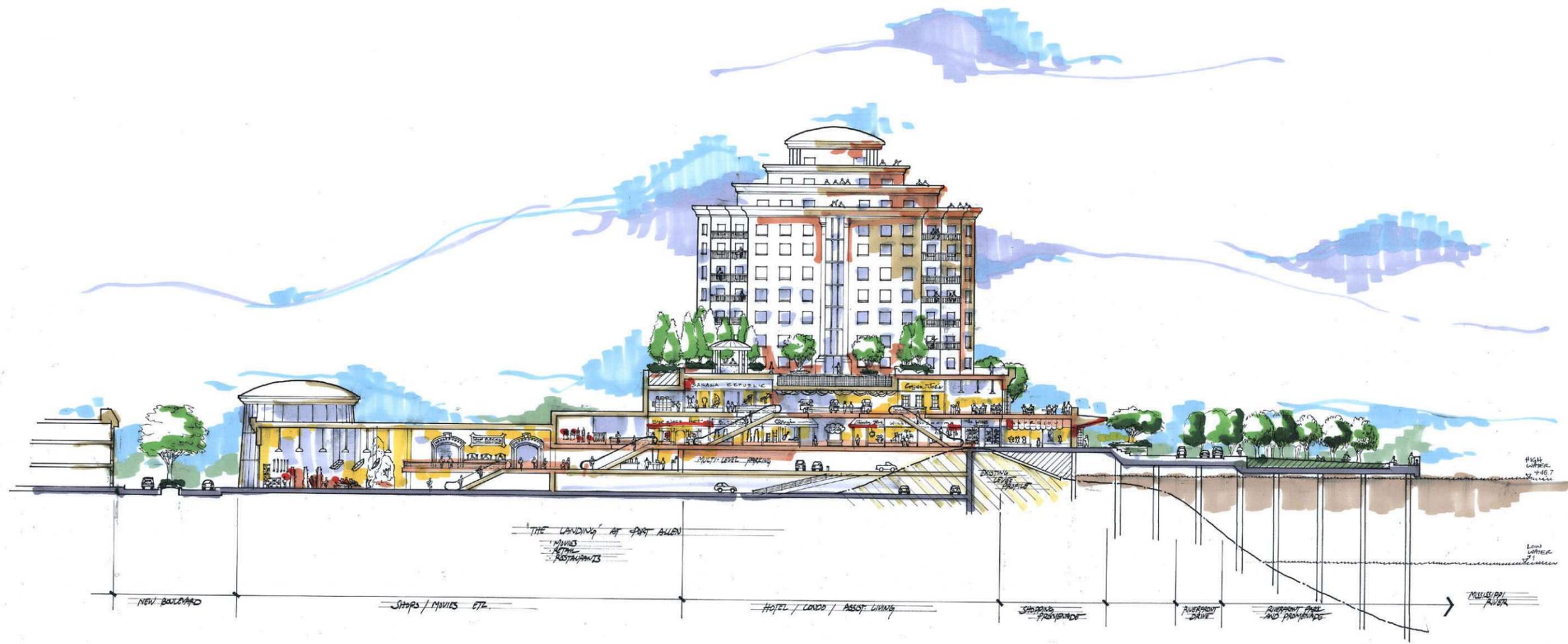
Scheme B (Figure 13) is the most developmentally aggressive of the four conceptual plans and proposes incorporation of many different uses into one large structure. The vehicular approach to this structure has been altered to accommodate the increase in traffic. Court Street has been widened to 90 feet, allowing for a divided boulevard with trees in islands. This boulevard extends onto the levee and beyond where cars can maneuver along the riverfront drive.

The multi-functional building is positioned on top of the levee, stretching from the landside over the levee; the remainder is supported by a wharf structure, which includes a riverfront drive, riverfront retail shopping, and the riverfront promenade. Figure 14 provides a sectional view of the variety of different levels and different program uses: a hotel and condominiums with underground parking, retail shops and restaurants, and an entertainment complex with a multiplex theater and a retail anchor store.



Scheme B

Figure 13. Scheme B



Riverfront Master Plan
Port Allen, Louisiana

Section of Scheme B
PEREZ / Reich Associates

Figure 14. Section of Scheme B

The rest of the downtown revitalization area includes loft apartments, an assisted living facility and a city park green space. At the river's edge, there is a riverfront promenade park with a plaza walkway and open lawn event spaces. This design consolidates attractions to draw visitors into one place, focusing development on the riverfront of Port Allen.

This development alternative contains both Corps Project and PARI elements. The Corps Project elements are:

- Bulkhead Structure
- Riverfront Promenade
- Riverboat Landing
- Interpretive Trails
- Lawn Areas
- Underground Parking
- Entry Road Improvements
- Lighting

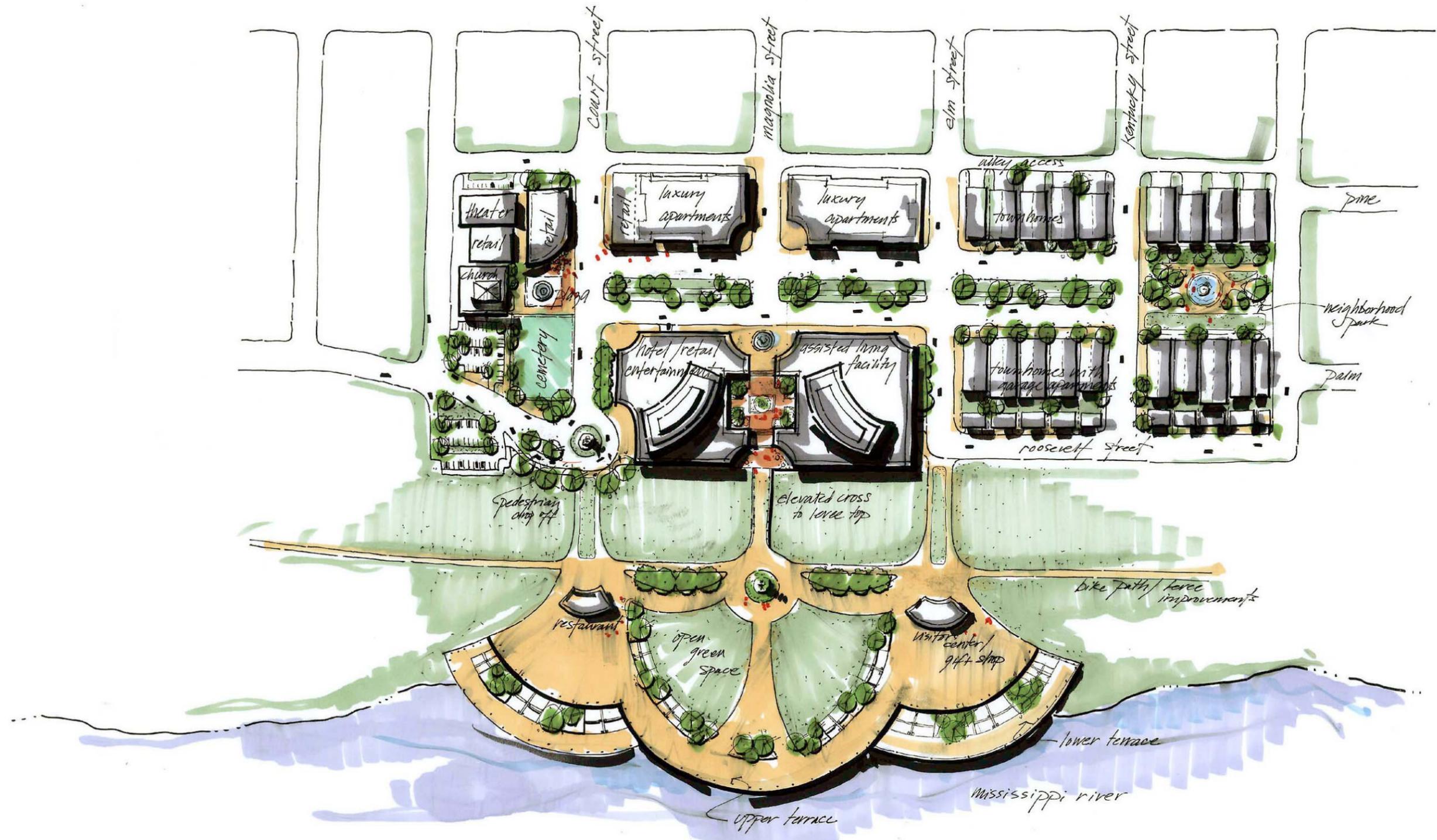
PARI Elements:

- Restaurant
- Water Taxi
- Riverboat
- Hotel
- Retail
- Condos
- Entertainment Complex
- Apartments
- Assisted Living Center

3. Scheme C

In Scheme C (Figure 15), the focus of riverfront development is moved from Court Street into to the revitalization area. Court Street is seen as the main entrance and extends to the edge of the levee where a small traffic circle is the terminus. At the levee toe and adjacent to the cemetery, parking is provided for easy access to the riverfront plaza. Roosevelt Street is interrupted by the placement of the hotel and assisted living facility blending the boundary of the levee, the building, and the levee amenities. In between these two buildings is a terraced plaza that gradually steps up to the height of the levee. An elevated pathway provides access to the levee top. The two structures are linked by this interior plaza and share a garden courtyard. The ground floor between the buildings provides retail facilities, the hotel lobby, and parking for visitors, residents, and guests.

Stimulating visual interest from the landside of the levee are vertical elements enticing people to walk to the levee top. A restaurant, visitors center and gift shop, and monument frame the riverfront plaza and are located on the wharf structure that extends over the river. Taking



Scheme C

advantage of the spectacular views, a large green space is located in the central terrace of the plaza for recreation and lounging. The plaza is a series of steps and ramps down towards the river. On top of the levee a bike path extends to both sides of the riverfront plaza. The batture area can also be used for organized sports and recreation.

Downtown Port Allen is characterized by its small-town atmosphere and is mostly residential. Atchafalaya Street is widened and turned into a boulevard with a large tree-lined promenade down the center. On either side of the street there are town homes and luxury apartments. At the south end of Atchafalaya Street, a church, retail shops, and the rehabilitated theater surrounds a town square where people can interact. A small neighborhood park for the enjoyment of residents is located at the north end of Atchafalaya Street.

This development alternative contains both Corps Project and PARI elements. The Corps Project elements are:

- Wharf Structure/Plaza
- Batture Trail
- Green Space
- Entry Road Improvements
- Lighting

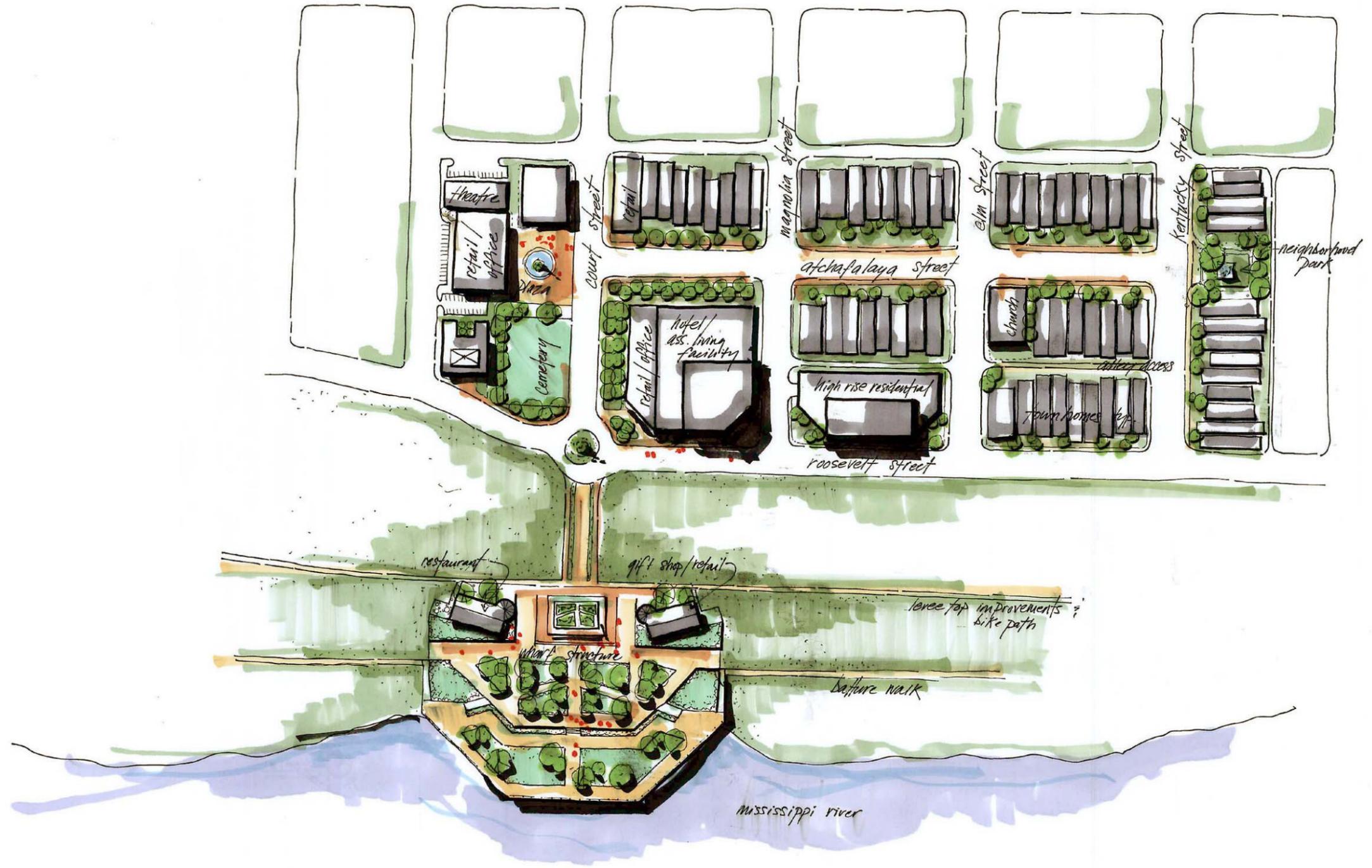
PARI Elements:

- Restaurant
- Hotel
- Retail
- Apartments
- Assisted Living Facility
- Gift Shop
- Townhomes

4. Scheme D

Scheme D (Figure 16), focuses the riverfront development onto the terminus of Court Street. The riverfront plaza is located on the riverside of the levee, occupies a small portion of the batture area, and is a series of terraces, ramps, and steps that descend towards the water's edge. Varying levels give all visitors to the waterfront dramatic viewing opportunities from wherever they stand. The park and plaza are surrounded by lush vegetation, providing a comfortable and inviting space. The plaza connects with the levee-top bike path that extends along the river's edge.

The landside of the levee does not change in this scheme in that the streets continue to function in the same way. However, the land use is different; a hotel and high-rise residential are located directly next to the levee, near the intersection of Court and Roosevelt. Each is proposed at a height that would enable guests and residents to take advantage of the spectacular views of the river. The ground floors of these buildings are used for parking and retail facilities.



Scheme D

PEREZ / Reich Associates

There is a retail/restaurant facility at the base of Court Street that opens onto a plaza, providing outdoor seating during pleasant weather.

Space near the cemetery is used as a gathering place and for festivals. A new church is next to the cemetery. Retail shops, offices, and the rehabilitated theatre surround the plaza, with water featured in the center.

Looking north from the town plaza space, Atchafalaya Street has an increased building setback, allowing for numerous tree plantings and enhancing the residential character of the street. A variety of townhomes on both sides provide landfill, with a small neighborhood park at the north end.

This development alternative contains both Corps Project and PARI elements. The Corps Project elements are:

- Wharf Structure/Plaza
- Batture Trail
- Entry Road Improvements
- Lighting

PARI Elements:

- Restaurant
- Hotel
- Retail
- Apartments
- Assisted Living Facility
- Gift Shop
- Townhomes

VI. RECOMMENDED COMPREHENSIVE PLAN

In an effort to include the public in the development and revitalization of Port Allen and West Baton Rouge Parish, representatives were invited to participate in a presentation of the Comprehensive Plan alternatives and give their comments and concerns on February 18, 2003. Two presentations were given explaining the process and progress that this project has achieved, the preliminary design alternatives, and the economic effects on the city and parish. Mr. Mark Wingate from the U.S. Army Corps of Engineers prefaced the meeting by explaining the purpose of the project and the Corps involvement. Ms. Suzanne Herzog from Perez, APC presented and explained the conceptual alternatives and opportunities through five master plan images. Mr. Shelton Perry of G.E.C., Inc., explained the economic predictions for the development, based on the plan concepts. The meeting was then opened for comments and questions from the attendees.

Public safety for the community, especially children, was a main concern for one of the participants. She questioned the barrier protection near the Mississippi River and the risk of accidentally falling into the water. She was assured that safety was a main issue, which would not be overlooked in the advanced design of riverfront structures; every effort should be made to protect adults and children from such an event.

Other concerns centered on the safety of the riverfront structure and how it would be protected from river traffic and fluctuating water levels. Protection buoys were pointed out in the concept master plan, which assist in protecting the wharf structure from riverboat collision as well as specific location of impacts. The design was further explained by clarifying that portions of the batture area may become inundated for a period of high water and have been designed with this in mind. The program elements that are planned for these areas are capable of withstanding this type of abuse.

With all the additional features and attractions proposed for downtown, participants were concerned that there would not be enough parking to accommodate the additional traffic and flow of people. Ground-level garage parking was one solution proposed for this concern, which would be located in the lower levels of a majority of the high-rise structures.

Displacement of residents was brought up by one of the neighborhood inhabitants. She expressed her concern, but admitted she would relocate if some of the wonderful new amenities were brought to Port Allen. She joked that maybe she could live in the retirement home shown in some of the master plan alternatives. The message was reinforced that no one should be made to feel like they are being “kicked out.” The main objective is to improve the quality of life for the city and its residents.

Overall, the outcome of the public presentation was positive. People are excited about the prospect of Port Allen growing and expanding to take advantage of the natural amenities that the river provides. One participant proclaimed that these images and ideas “sets his hair on fire!” Another stated that she “can’t wait to sit on the levee and watch the sunset and show off (her) town.”

Throughout the course of the design process in which the four schemes were developed, the design team met on a monthly basis. These monthly meetings not only served to keep members up to date on progress, but also served as forums to discuss and test ideas and concepts for the alternatives. The planning team spoke with experienced Baton Rouge-area developers, R.W. Day and Tommy Spinosa, to get their opinions on what might work and what would not in this local market. Knowledge such as that provided by the developers helped the design team to formulate several interesting plans.

The four conceptual alternatives were reviewed and evaluated by the mayor and the public through focus group meetings. The final consensus was for a combination of plans A and C. In particular, the riverside components of Scheme A and the landside components of Scheme C were preferred. The riverfront design was further modified in keeping with Corps regulatory criteria for development on the batture and levee.

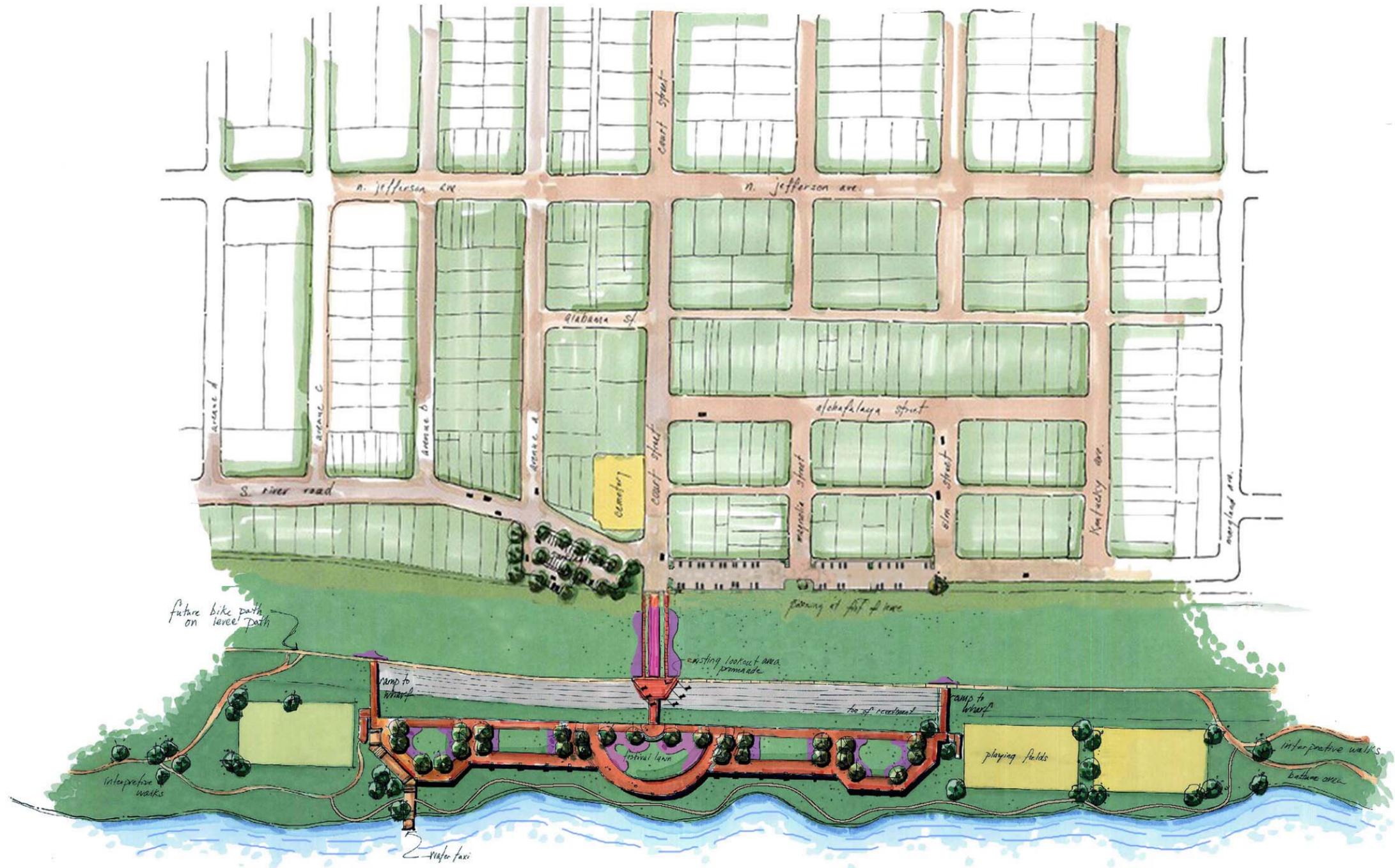
The Corps Project is primarily concerned with the riverside elements but will include landside parking and may also include other landside elements. The central feature of the riverside portion of the plan is an elevated structure that would be located on the batture. Several wide walkways would be connected to lawn spaces. A water taxi landing would extend out into the river for a potential water taxi service. Because of the fluctuating water levels, the river would occasionally be in contact with the wharf structure. Playing fields and multiuse recreation areas featuring interpretive trails and picnic sites are located to the north and south of the wharf structure and also on the batture. Boardwalks are proposed in certain areas of the batture as well.

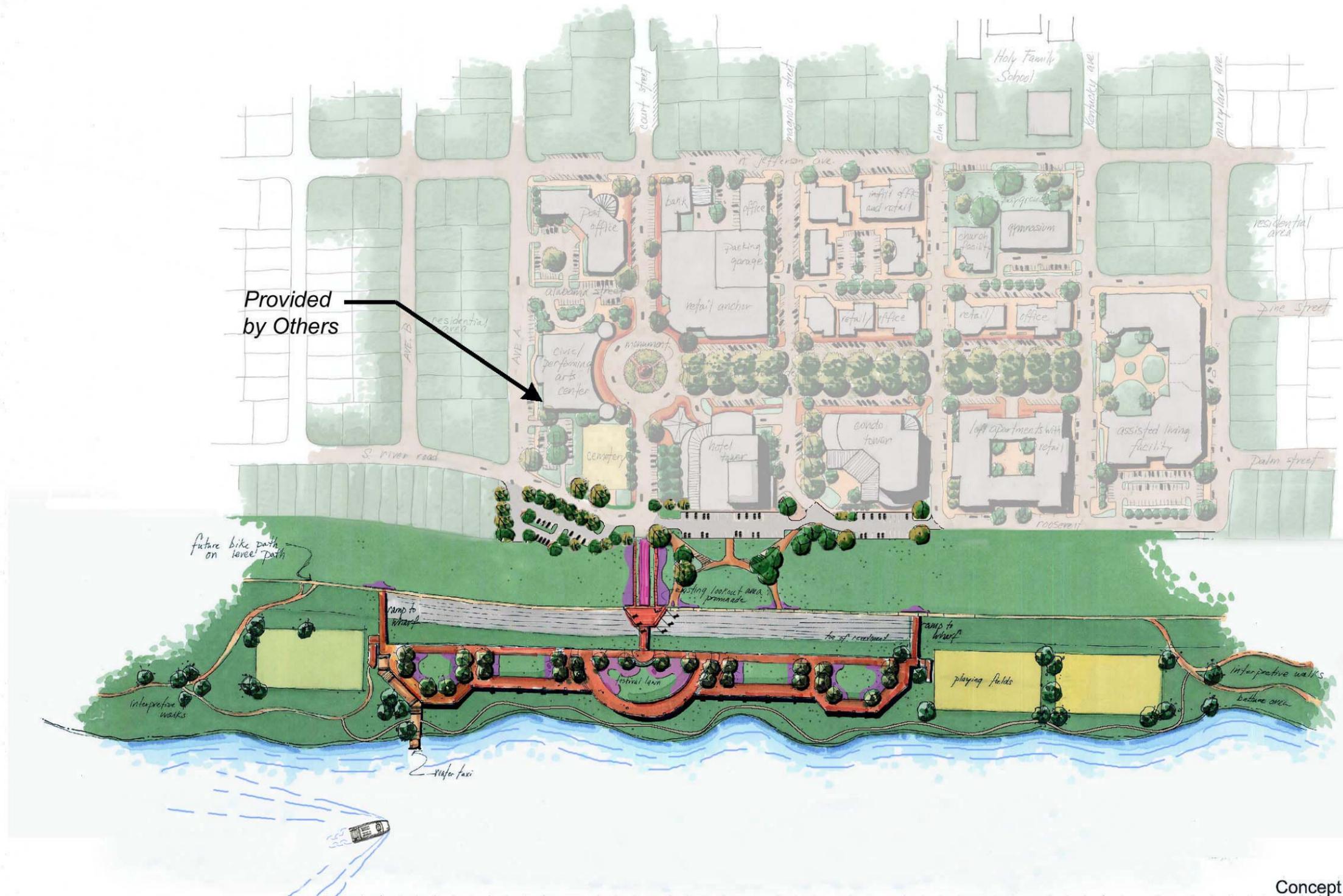
It is important to note that the Corps Project being proposed will dovetail into development already completed as part of the TEA-21 improvements completed in 2003. The existing overlook, entryway, and promenade will serve as additional amenities that will enhance the utility of the wharf structure and other improvements being proposed. Landside infrastructure improvements such as street access to the wharf area and landside lighting and drainage enhancements could also become part of the Corps Project.

The Corps Project has been designed to be a stand-alone project (Figure 17).

The Port Allen Riverfront Initiative (PARI) is generally considered to be a collection of features, activities, structures, or improvements related to private or local government investments. These in general would be located on the landside of the levee in the area of Port Allen designated for revitalization. Proposed uses include hotel space, condominiums, apartments, office space, retail businesses, a performing arts center, and an assisted living facility. Ideally, these uses would be laid out in a fairly dense manner to encourage pedestrian access and to foster a sense of community (Figure 18).

The Corps Project could act as a catalyst for the PARI features. Once the Corps Project features (such as a wharf) are constructed, landside amenities related to PARI may begin to infill the revitalization area of downtown Port Allen and draw upon the benefits received from the Corps





Provided by Others

Figure 18. Comprehensive Plan

Project. This is also in keeping with recent studies that pinpoint this area as a need area for revitalization. The design develops the partnership between this revitalization area and the riverfront amenities represented as the Corps Project. Although each is distinct in character, the two spaces complement each other.

Figure 19 shows a section of the Corps Project, and figures 20-23 show images and perspectives of Comprehensive Plan features.



Figure 19. Section of Corps Project at Court Street



Figure 20. Festival Lawn



Figure 21. Levee-top Trail



Figure 22. Atchafalaya Street

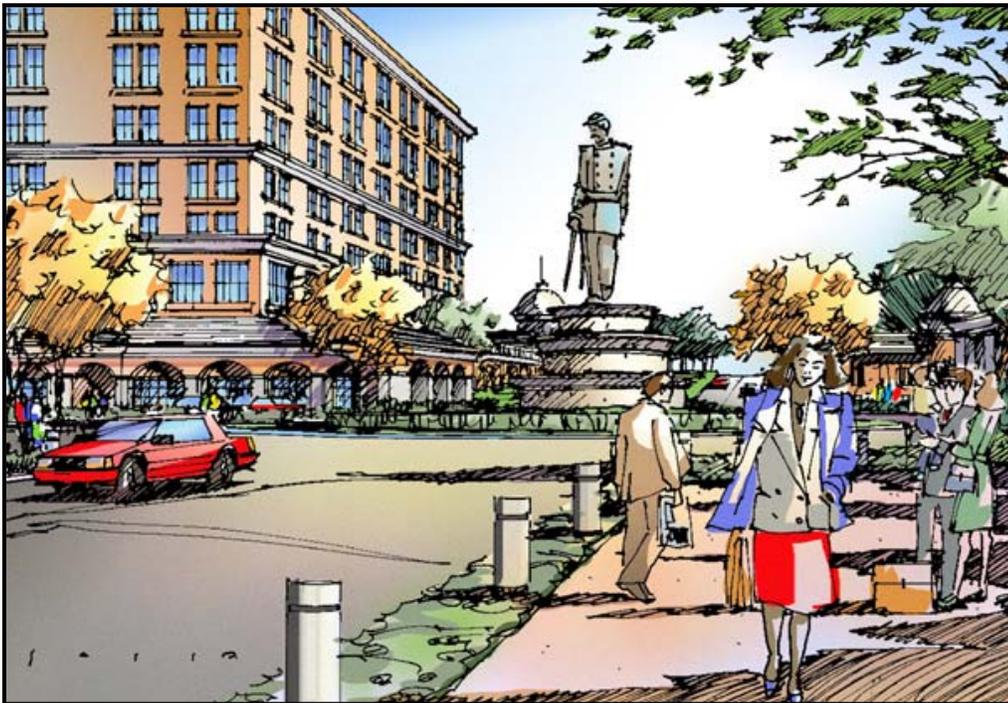


Figure 23. Traffic Circle with Monument

VII. RECOMMENDED ELEMENTS OF THE CORPS PROJECT

The following list presents a description of the core elements (Figure 24) in the recommended Corps Project, along with a projected cost that includes a 20 percent contingency. The following list also represents the sequence in which the core elements would be constructed. For a more detailed listing of quantities and costs of proposed elements, see Table 7, Corps Project Summary of Quantities and Estimated Costs in Section VIII.

1. Multiuse Recreation Areas

The multiuse recreation areas in the recommended Corps Project are located primarily in the batture areas, north and south of the proposed wharf. The centerpieces of the recreation areas are walking/interpretive trails. The trails within this multiuse area will total about two and one-half miles of asphalt-surfaced pathways and raised boardwalk. The recreation areas will also feature facilities for day campers, including picnic tables and grills and appropriate landscaping. The trail on the south side of the wharf will have a theme based on the different areas of river-based commerce or equivalent theme. The trail on the north side of the wharf will emphasize native riverine flora as its organizing element. USACE regulations require that no more than 1 ft of fill be used in batture areas; trails will be constructed using this guideline where appropriate. In certain areas, boardwalks will be constructed.

Cost \$696,660

2. Wharf Structure

The wharf structure will be constructed on pilings. It will be approximately 153,000 square feet. The structure will support several features: a circular lawn area, walkways, planters, and a water taxi landing. Three pedestrian bridges will be needed, one near the foot of Court Street and one at either end of the wharf structure.

It is noted that no structures are to be located on the Mississippi River levee slopes or crown, nor within 5 feet of the landside levee toe or 40 feet of the floodside levee toe. No penetrations of the design levee slopes and crown is allowed. Any underground foundations (pile caps, footings, basements, etc.) must not penetrate the authorized design landside levee slope extended below ground. Any excavations on the floodside of the levee must be located above the levee stability control line. Piles or other penetrations cannot be within 10 feet of the landside or flood side toe.

It is also noted that pile driving operations and excavations must be accomplished only when the river stage is below elevation 11.0 NGVD at the Carrollton (New Orleans) gage. It can be generally said that the water is above this level in the months of April, May, and June and below this level in the other months. That is just a generalization, however, because spikes and dips in water levels can occur at any time in the year.

Cost \$16,950,897

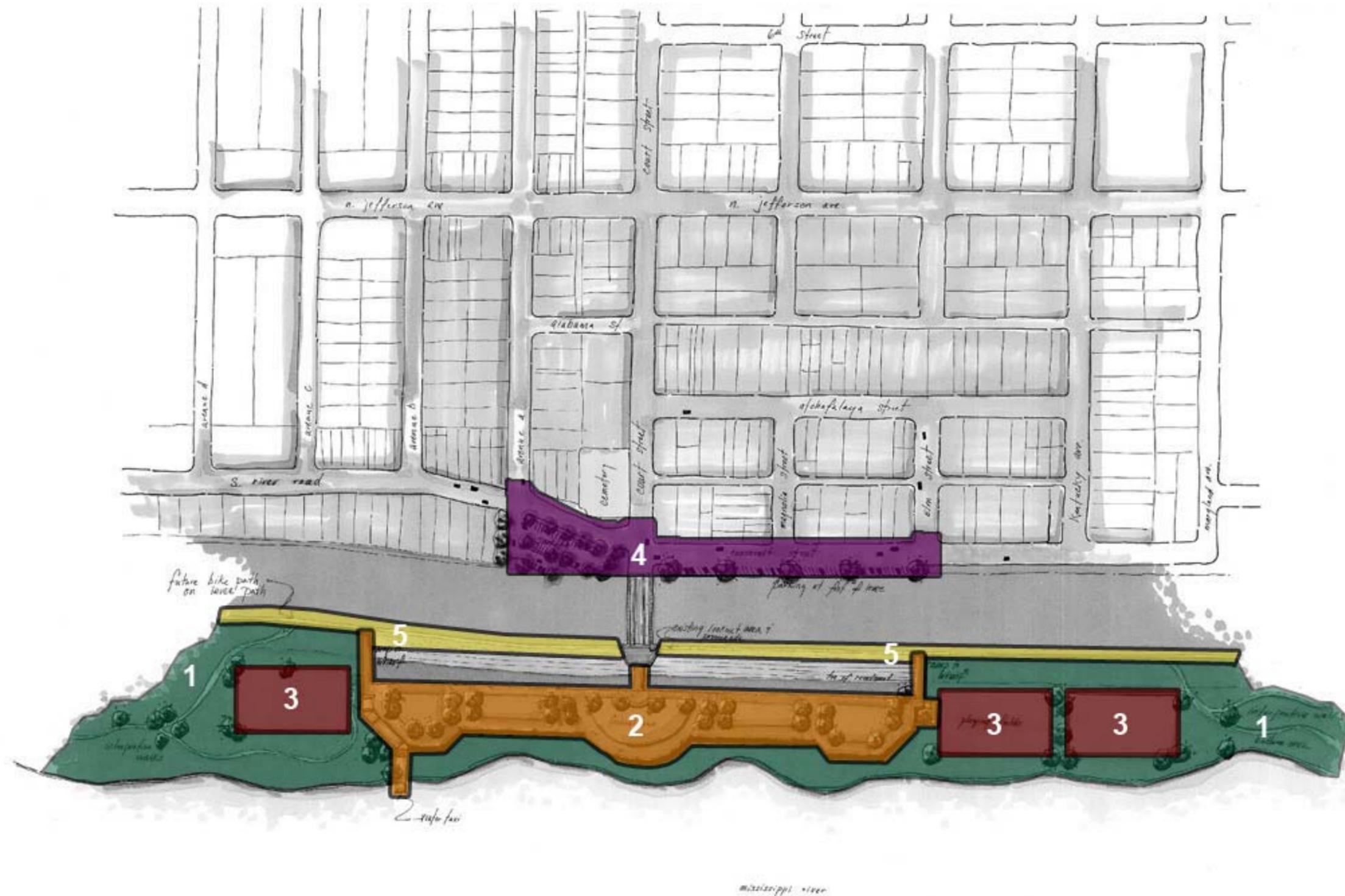


Figure 24. Phasing Diagram

3. Playing Fields

Three playing fields are proposed for the batture. There will be two on the north side of the wharf and one on the south side. The fields will be graded and leveled, using no more than 1 ft of fill per USACE regulations. The fields are intended to satisfy multiuse recreation needs in general.

Cost \$343,200

4. Landside Infrastructure Improvements

There could also be some landside infrastructure improvements such as adequate street access to riverside developments and landside lighting and drainage to enhance the safety of the project users. Such improvements could amount to several million dollars, perhaps as much as \$10 million. Because of the significant economic benefits of the stand-alone Corps features, a positive benefit/cost ratio could be achieved even with the additional cost of landside infrastructure development. However, at this stage of the analysis the need for and costs of landside infrastructure improvements have not yet been developed. The requirements for and costs of landside infrastructure developments should be determined in the feasibility phase of this study.

5. Bicycle/Multipurpose Paths

These paths will be sited on top of the levees and adjacent to roads. They will terminate at U.S. 190 to the north, provide access to the Port Allen Lock to the south, and extend from the Port Allen Lock to the Addis/Brusly area to the south. These paths will be generally 10 feet wide and paved with asphalt. Total length will be approximately 12.5 miles.

Cost \$3,575,000

VIII. ECONOMIC ANALYSIS OF THE CORPS PROJECT

Riverfront development in West Baton Rouge Parish will create significant recreational, educational, and quality-of-life benefits for residents of the City of Port Allen, West Baton Rouge Parish, the Baton Rouge urban area, and out-of-region visitors.

The comprehensive riverfront development plan for West Baton Rouge Parish includes two components: (1) the levee-top and batture facilities along with limited infrastructure improvements accessing the riverfront development that will be developed by the Corps of Engineers in partnership with the local sponsor (the Corps Project); and (2) the landside revitalization area in Port Allen that will be developed by other public/private interests (the Port Allen Revitalization Initiative).

This section of the report provides a National Economic Development (NED) analysis of the Corps Project. The purpose of this economic analysis is to determine the economic benefits and costs of construction and operation and maintenance of the Corps Project and to determine if the benefits of the project exceed the costs. A Regional Economic Development analysis for the Comprehensive Plan is presented in the next section of the report.

A. METHODOLOGY

The primary measure of economic benefits for the Corps Project is recreation benefits. Recreation benefits are a National Economic Development (NED) benefit and reflect an estimate of consumers' willingness to pay for the recreation values created by the project. For this project, the Unit Day Value method of approximating consumers' willingness to pay for the recreation opportunities created by the Corps Project will be used.

B. NED BENEFITS OF CORPS PROJECT

The NED benefits associated with the Corps Project are recreational and quality-of-life benefits resulting from active and passive use of the project features. Crucial to the estimation of NED benefits is the determination of usage and the associated value per unit of usage for both active and passive beneficiaries of the project.

1. General Recreation Benefits

The general recreation benefit of the proposed project is the cumulative dollar value of the economic benefit of the project to each recreationist as measured by each individual's willingness to pay for the recreation experience offered by the Corps Project. Computation of the general recreation benefit of the project requires: (1) estimation of recreation usage of the project features; and (2) economic valuation of the recreation experience.

a. General Recreation Usage

The current *Louisiana Statewide Comprehensive Recreation Plan (SCORP)* indicates that deficits exist across virtually all activities in the number and type of facilities needed to support the level of usage that citizens desire. The recreation opportunities that will be provided by the proposed development include most of the top 10 most popular activities participated in by Louisianans. These activities and the percent of Louisiana citizens participating in them are shown in the SCORP as follows:

- 56.5 percent attended outdoor events
- 45.5 percent went fishing
- 44.0 percent walked for pleasure
- 38.4 percent drove for pleasure
- 36.7 percent swam in a pool
- 35.6 percent visited zoos
- 34.1 percent went bicycling
- 33.7 percent visited playgrounds
- 33.4 percent went picnicking
- 24.4 percent visited historic sites

(1) Without-Project Visitation at the Riverfront – A 1996 report indicated that approximately 25,000 groups stopped at the Port Allen visitors center for information and directions in one year. Most indicated a desire to view the Mississippi River. Seeing the Mississippi River is reported to be one of the main interests of visitors. The number of groups that did not stop at the visitors center is unknown, but it is reasonable to assume that it was at least as many as were recorded. If these assumptions are accurate, it is likely that as many as 50,000 persons per year view the river at Port Allen. The proposed improvements in amenities will certainly result in increased numbers of general recreation and sightseeing visitors in future years. However, for this study the figure of 50,000 sightseers at the Mississippi River will be used.

There are currently two events that draw large numbers of people to the riverfront each year -- the Bonfest and viewing the July 4 fireworks display. Attendance is reported to approach 10,000 for each event. Port Allen also hosts the Sugar Festival, which lasts for several days and also reportedly results in approximately 10,000 visitors. The newly completed promenade at the Mississippi River in Port Allen should be able to increase attendance at these existing events to 11,000 each, in addition to drawing an estimated 26,000 non-festival visitors annually. Total without-project visitation at the riverfront is estimated at 109,000 annually.

(2) With-Project Visitation at the Riverfront – A venue such as the riverfront wharf structure should be able to increase attendance at the three existing festivals by 10,000 each. It is reasonable to assume that a developed riverfront will be incorporated in Sugar Festival plans in future years. The proposed facilities and development would also provide an appropriate venue for music festivals or similar events. Two such annual events, drawing a modest 10,000 persons to each, are assumed to take place if the facility is built as planned.

Increased attendance at the three existing and the two prospective events would result in an additional 50,000 visitors to the riverfront annually.

Other new facilities will generate additional active usage of the riverfront. Among these are bicycling, walking, picnicking, fishing, and soccer or other playing field use. Standards used by the state of Alabama in planning for outdoor recreation provide annual carrying capacity information for activities such as those proposed for the Corps Project. These standards are presented in the *Outdoor Recreation in Florida* and the *1989 ADECA Alabama Recreation Inventory*, 1990, in the Alabama SCORP, Volume I, Assessment and Policy Plan, December 1991 and are applied to the proposed facilities in Table 3.

Table 3. Projected Usage by Activity

Activity	Number of Units	Unit	Annual Capacity	Annual User Days
Bicycling	12.5	Mile	29,200	365,000 days
Walking	2.42	Mile	24,300	58,806 days
Picnicking	27	Table	1,440	38,800 days
Soccer	3	Field	11,520	34,560 days
Fishing	4,050	Foot	27	109,350 days
Total				606,596 days

The sum of estimated future annual user days across the various activities is as follows:

Activity	With-Project	Without-Project
Sightseeing	100,000	50,000
Festivals/events	83,000	33,000
Bicycling	365,000	--
Walking	69,806	11,000
Picnicking	46,180	7,300
Soccer	34,560	--
Fishing	<u>109,350</u>	<u>7,300</u>
Total User Days	807,516	108,600

b. General Recreation Usage Valuation

Recreation benefits calculated for this study are preliminary and are based on planning calculations used in areas other than Louisiana when considered applicable to the current situation. Some estimates are based on information provided by local persons knowledgeable in the recreation and tourism field. Other estimates are based on professional judgment concerning local circumstances. All estimates are subject to revision.

Procedures for estimating willingness to pay for a day of recreation are taken from *Economic Guidance Memorandum 03-04, Unit Day Values For Recreation, Fiscal Year 2003* (EGM 03-04). A copy of that memorandum is included as Appendix B.

The EGM 03-04 gives a Unit Day Value range for Fiscal Year 2004 studies of \$3.00 to \$9.01 for general recreation. Judgments are made using a set of five criteria, each with a range of points that can be assigned. Possible total values across all five criteria range from zero to 100. Points are assigned for each criterion. Total point value for the without project condition is 39. For the with project condition it is 48. These point values translate into values of \$5.52 and \$6.23 for a user day of general recreation. The point allocations for the various criteria under each condition are as follows:

Criteria	With-Project	Without-Project
	Points	Points
Recreation Experience	10	7
Availability of Opportunity	6	5
Carrying Capacity	8	8
Accessibility	14	12
Environmental	<u>10</u>	<u>7</u>
Total Points	48	39

c. General Recreation Benefits

The economic value of general recreation benefits is determined by multiplying the increased number of recreation user days by the dollar value of each recreation user-day under both the without- and with-project conditions. The estimated value of without-project recreation is subtracted from the estimated value for with project recreation for each year. However, because the recreation elements will be developed over time, recreation usage must likewise be phased in over several years. Table 4 illustrates the development of general recreation benefits attributable to the Corps Project. The estimate is based on reaching full utilization during 2008. Project benefits were calculated by multiplying User Day Attendance by the Unit Day Value estimate of \$6.23. The resulting value for each year was discounted to its net present value using a discount rate of 5-5/8 percent. The sum of the net present value of the benefits for all years, \$84,262,644, was amortized over the 50-year project life at 5-5/8 percent to yield an average annual equivalent benefit of \$5,068,265.

2. Incidental Recreation Benefits

Induced development made possible by the proposed riverfront facilities will bring a large number of people to the area daily. Planned elements of the Port Allen Revitalization Initiative include a hotel, office complex, condominiums, assisted living facility, apartments, retail establishments, and restaurants. Each of the residents, hotel guests, restaurant and retail customers, and employees in the area will have the opportunity to benefit from the amenities offered by the Corps Project on a daily basis. They will be able to enjoy in comfort an interesting and always changing view of the river and activities on it. The high-quality aesthetics

Table 4. General Recreation Benefits

Federal Fiscal Year	With-Project Conditions			Without-Project Conditions			Total Net Benefits	Discount Factor	Period	Present Value of Net Benefits
	User Days	UDV (Dollars)	Benefits	User Days	UDV (Dollars)	Benefits				
2005	108,600	\$6.23	\$676,578	108,600	\$5.52	\$599,472	\$77,106	1.17842	-3	\$90,863
2006	473,600	\$6.23	\$2,950,528	108,600	\$5.52	\$599,472	\$2,351,056	1.11566	-2	\$2,622,989
2007	707,896	\$6.23	\$4,410,192	108,600	\$5.52	\$599,472	\$3,810,720	1.05625	-1	\$4,025,073
2008	707,896	\$6.23	\$4,410,192	108,600	\$5.52	\$599,472	\$3,810,720	1.00000	0	\$3,810,720
2009	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.94675	1	\$4,197,605
2010	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.89633	2	\$3,974,064
2011	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.84859	3	\$3,762,427
2012	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.80340	4	\$3,562,061
2013	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.76062	5	\$3,372,366
2014	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.72011	6	\$3,192,772
2015	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.68176	7	\$3,022,743
2016	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.64546	8	\$2,861,768
2017	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.61108	9	\$2,709,367
2018	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.57854	10	\$2,565,081
2019	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.54773	11	\$2,428,479
2020	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.51856	12	\$2,299,152
2021	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.49094	13	\$2,176,712
2022	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.46480	14	\$2,060,792
2023	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.44005	15	\$1,951,046
2024	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.41661	16	\$1,847,144
2025	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.39443	17	\$1,748,775
2026	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.37342	18	\$1,655,645
2027	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.35353	19	\$1,567,475
2028	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.33471	20	\$1,484,000
2029	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.31688	21	\$1,404,970
2030	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.30001	22	\$1,330,149
2031	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.28403	23	\$1,259,313
2032	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.26890	24	\$1,192,249
2033	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.25458	25	\$1,128,756
2034	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.24103	26	\$1,068,645
2035	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.22819	27	\$1,011,735
2036	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.21604	28	\$957,856
2037	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.20453	29	\$906,846
2038	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.19364	30	\$858,552
2039	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.18333	31	\$812,830
2040	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.17357	32	\$769,543
2041	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.16432	33	\$728,562
2042	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.15557	34	\$689,763
2043	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.14729	35	\$653,030
2044	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.13944	36	\$618,253
2045	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.13202	37	\$585,328
2046	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.12499	38	\$554,157
2047	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.11833	39	\$524,646
2048	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.11203	40	\$496,706
2049	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.10606	41	\$470,254
2050	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.10041	42	\$445,211
2051	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.09507	43	\$421,502
2052	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.09000	44	\$399,055
2053	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.08521	45	\$377,803
2054	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.08067	46	\$357,684
2055	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.07638	47	\$338,635
2056	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.07231	48	\$320,602
2057	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.06846	49	\$303,528
2058	807,896	\$6.23	\$5,033,192	108,600	\$5.52	\$599,472	\$4,433,720	0.06481	50	\$287,364

Total Net Present Value: \$84,262,644
Average Annual Equivalent: \$5,068,265

*Interest rate of 5.625% for 50-year project life.

designed into the proposed riverfront facilities will attract persons to the riverfront and increase the pleasure and satisfaction in using the facilities. This type of usage has the additional advantage of having most of the “visits” occurring on weekdays and in off-peak times.

Usage by this “group” of persons is year-round, influenced mostly by the weather. Much of the usage is incidental to other activities such as dining, shopping, or working. This does not lessen the benefit derived from being able to view the river as part of other activities.

A development such as the one planned at Port Allen can have benefits even for persons who do not physically visit the area. A well-designed, visually pleasing addition to the viewscape marginally improves the quality of life for many: for motorists crossing the I-10 Bridge, for persons strolling the Baton Rouge riverfront, or for crewmen or passengers on a passing boat. The value of such pleasurable sights is difficult to estimate but is no less real. Even if the monetary value of each occurrence is small, the aggregated value represents an increase in societal wellbeing of considerable magnitude. No attempt will be made to quantify an economic value attributable to these benefits.

a. Incidental Recreation Usage

Table 5 shows the assumptions considered and the calculations employed in development of usage estimates for the incidental recreation usage. Because of the quality of the view and amenities offered by the Corps Project, the residents, shoppers, diners, and staff workers at all facilities will benefit from the existence of the improvements. The user days are estimated separately for the hotel, condo tower, assisted living facility, loft apartments, retail anchor store, retail shops, offices, restaurants, civic center, and bank. As indicated, the total number of user-days of incidental recreation benefit expected from residents, staff, and customers of the landside development is expected to reach 295,011 annually when fully occupied.

b. Incidental Recreation Usage Valuation

Since the induced recreation usage of the Corps Project is basically a quality-of-life benefit attributable to improved surroundings and views, the minimum Unit Day Value attributable to general recreation (\$3.00) was selected for this analysis.

c. Incidental Recreation Benefits

Table 6 shows the computation of incidental recreation benefits for the project. Incidental recreation benefits begin to occur in Year 5 of the project and are fully realized by Year 9. The total net present value of incidental benefits over the 50-year life of the project are \$13,097,655, which when amortized at 5-5/8 percent results in an average annual equivalent benefit of \$787,803.

Table 5. Calculation of User Days and Value of Incidental Sightseeing Associated with New Facilities Induced by Riverfront Development

Facility	User Class	Number of Persons	Possible Pers. Days	Percent Daily Usage	Annual Occasions
Hotel	guests	42,574	42,574	75%	31,930
	staff	50	12,500	33%	4,125
Assumptions: (162 rooms X 1.2 pers/room X 60% occupancy X 365 days = 42,574) (50 staff, 250 work days per year = 12,500)					
Condo Tower	residents	47,304	47,304	50%	23,652
	shoppers	26,200	26,200	50%	13,100
	staff	25	6,250	33%	2,063
Assumptions: (96 Units X 1.5 pers/unit X 90% occupancy X 365 days = 47,304) (10,000 sq ft sales X \$262 sq ft /\$100 per shopper = 26,200) (25 retail and condo staff X 250 work days/year = 6,250)					
Assist Living:	residents	283	103,313	40%	41,325
	staff	50	12,500	33%	4,125
Assumptions: (333 units X 85% occupancy X 1 pers/unit X 365 days = 103,313) (50 staff, 250 work days per year = 12,500)					
Loft Aprtmnts:	residents	180	59,130	50%	29,565
Assumptions: (120 units X 1.5 pers/unit X 90% occupancy X 365 = 59,130)					
Retail Anchor:	shoppers	85,370	85,307	50%	42,654
	staff	80	20,000	33%	6,600
Assumptions: (40,000 sq ft X .814 sales sq ft X \$262 per sqft /\$100 per shopper = 85,307) (80 staff, 250 work days per year = 20,000)					
Shops-Retail	shoppers	99,560	99,560	50%	49,780
	staff	76	19,000	33%	6,270
Assumptions: (38,000 sq ft X \$262 per sq ft /\$100 per shopper = 99,560) (76 staff X 250 work days per year = 19,000)					
Offices	staff	135	67,500	50%	33,750
Assumptions: (67,500 sq ft / 250 sq ft per office/person X 250 work days = 67,500)					
Civic Center	visitors	10,000	10,000	50%	5,000
	staff	3	750	33%	248
Assumptions: (Assume 10,000 visitors to civic center per year = 10,000) (3 staff X 250 work days per year = 750)					
Bank	staff	10	2,500	33%	825
Assumptions: (10 staff X 250 work days per year = 2,500)					
Total Estimated User Days					295,011

Table 6. Incidental Use Benefits

Federal Fiscal Year	Total User Days	UDV (Dollars)	Total Benefits	Discount Factor	Period	Present Value of Benefits
2005	0	\$3.00	\$0	1.17842	-3	\$0
2006	0	\$3.00	\$0	1.11566	-2	\$0
2007	0	\$3.00	\$0	1.05625	-1	\$0
2008	0	\$3.00	\$0	1.00000	0	\$0
2009	56,915	\$3.00	\$170,745	0.94675	1	\$161,652
2010	113,830	\$3.00	\$341,490	0.89633	2	\$306,087
2011	174,224	\$3.00	\$522,672	0.84859	3	\$443,536
2012	234,618	\$3.00	\$703,854	0.80340	4	\$565,478
2013	295,011	\$3.00	\$885,033	0.76062	5	\$673,172
2014	295,011	\$3.00	\$885,033	0.72011	6	\$637,322
2015	295,011	\$3.00	\$885,033	0.68176	7	\$603,382
2016	295,011	\$3.00	\$885,033	0.64546	8	\$571,249
2017	295,011	\$3.00	\$885,033	0.61108	9	\$540,828
2018	295,011	\$3.00	\$885,033	0.57854	10	\$512,026
2019	295,011	\$3.00	\$885,033	0.54773	11	\$484,759
2020	295,011	\$3.00	\$885,033	0.51856	12	\$458,943
2021	295,011	\$3.00	\$885,033	0.49094	13	\$434,502
2022	295,011	\$3.00	\$885,033	0.46480	14	\$411,363
2023	295,011	\$3.00	\$885,033	0.44005	15	\$389,456
2024	295,011	\$3.00	\$885,033	0.41661	16	\$368,716
2025	295,011	\$3.00	\$885,033	0.39443	17	\$349,080
2026	295,011	\$3.00	\$885,033	0.37342	18	\$330,490
2027	295,011	\$3.00	\$885,033	0.35353	19	\$312,890
2028	295,011	\$3.00	\$885,033	0.33471	20	\$296,227
2029	295,011	\$3.00	\$885,033	0.31688	21	\$280,452
2030	295,011	\$3.00	\$885,033	0.30001	22	\$265,517
2031	295,011	\$3.00	\$885,033	0.28403	23	\$251,377
2032	295,011	\$3.00	\$885,033	0.26890	24	\$237,990
2033	295,011	\$3.00	\$885,033	0.25458	25	\$225,316
2034	295,011	\$3.00	\$885,033	0.24103	26	\$213,317
2035	295,011	\$3.00	\$885,033	0.22819	27	\$201,957
2036	295,011	\$3.00	\$885,033	0.21604	28	\$191,201
2037	295,011	\$3.00	\$885,033	0.20453	29	\$181,019
2038	295,011	\$3.00	\$885,033	0.19364	30	\$171,379
2039	295,011	\$3.00	\$885,033	0.18333	31	\$162,252
2040	295,011	\$3.00	\$885,033	0.17357	32	\$153,612
2041	295,011	\$3.00	\$885,033	0.16432	33	\$145,431
2042	295,011	\$3.00	\$885,033	0.15557	34	\$137,686
2043	295,011	\$3.00	\$885,033	0.14729	35	\$130,354
2044	295,011	\$3.00	\$885,033	0.13944	36	\$123,412
2045	295,011	\$3.00	\$885,033	0.13202	37	\$116,840
2046	295,011	\$3.00	\$885,033	0.12499	38	\$110,618
2047	295,011	\$3.00	\$885,033	0.11833	39	\$104,727
2048	295,011	\$3.00	\$885,033	0.11203	40	\$99,150
2049	295,011	\$3.00	\$885,033	0.10606	41	\$93,869
2050	295,011	\$3.00	\$885,033	0.10041	42	\$88,870
2051	295,011	\$3.00	\$885,033	0.09507	43	\$84,138
2052	295,011	\$3.00	\$885,033	0.09000	44	\$79,657
2053	295,011	\$3.00	\$885,033	0.08521	45	\$75,415
2054	295,011	\$3.00	\$885,033	0.08067	46	\$71,399
2055	295,011	\$3.00	\$885,033	0.07638	47	\$67,596
2056	295,011	\$3.00	\$885,033	0.07231	48	\$63,997
2057	295,011	\$3.00	\$885,033	0.06846	49	\$60,588
2058	295,011	\$3.00	\$885,033	0.06481	50	\$57,362

Total Net Present Value: \$13,097,655
Average Annual Equivalent: \$787,803

*Interest rate of 5.625% for 50-year project life.

C. PROJECT COST

The Corps portion of the riverfront development plan for West Baton Rouge Parish includes all proposed elements on the levee top and river batture as described in Section VII of this report.

1. Capital Cost

Table 7 lists the major cost components of the project and shows a total construction cost of \$15,080,948. Cost estimates for the wharf structures are based on recently experienced cost per square foot for similarly constructed bridge structures in the geographic area. Costs for benches, trails, trash receptacles, etc., are based on recently completed recreation master plan costs in the area. Bicycle path costs are based on recently designed bicycle paths in a similar levee-top environment. A 25 percent contingency, a 10 percent engineering and design fee, and an eight percent supervision and administration fee are added, bringing the total estimated capital cost of the Corps Project to \$21,565,756.

**Table 7. Corps Project
Summary of Quantities and Estimated Costs**

ITEM NO.	PAY ITEM	UNIT	QUANTITY	UNIT PRICE	SUBTOTAL
1	Wharf Structure	SQ. FT.	153,000	\$60	\$9,180,000
2	Dock	EACH	1	\$280,000	\$280,000
3	Fill	CU. YDS.	6,000	\$10	\$60,000
4	Dolphin sheetpiles	SQ. FT.	20,734	\$18	\$373,212
5	Dolphin Fill	CU. YDS.	1,304	\$10	\$13,040
6	Dolphin Fill, Cap	CU. YDS.	262	\$55	\$14,410
7	Bridges, Pedestrian; 1 @ 60'X20'; 2 @ 60'X10'	SQ. FT.	2,400	\$100	\$240,000
8	Levee Bump-Outs (for Pedestrian Bridges)	EACH	2	\$120,000	\$240,000
9	Wharf Lighting	LUMP SUM	1	\$500,000	\$500,000
10	Parking	SQ. YDS.	2,872	\$18	\$51,696
11	Lighting for Parking	EACH	8	\$2,500	\$20,000
12	Benches	EACH	40	\$2,000	\$80,000
13	Planters	EACH	35	\$1,800	\$63,000
14	Bicycle Trails	MI	12.5	\$200,000	\$2,500,000
15	Walking/Interpretive Trails	MI	2.52	\$71,000	\$178,920
16	Picnic Tables/Grills	EACH	27.00	\$2,000	\$54,000
17	Soccer Fields	EACH	3	\$80,000	\$240,000
18	Drinking Fountains	EACH	6	\$3,000	\$18,000
19	Trash Receptacles	EACH	25	\$1,000	\$25,000
20	Landscaping/Sod	LUMP SUM	1	\$850,000	\$850,000
21	Signage	LUMP SUM	1	\$85,000	\$85,000
22	Bank Fishing Path	SQ. YDS.	1,467	10	\$14,670

PAY ITEM SUBTOTAL:	\$15,080,948
25% CONTINGENCY	\$3,770,237
10% ENGINEERING & DESIGN	\$1,508,095
8% SUPERVISION & ADMINISTRATION	\$1,206,476

TOTAL: **\$21,565,756**

The major component of the \$21.6 million construction cost is the wharf structure. The wharf structure is the centerpiece or focal point of the riverfront development. It provides views and physical access to the river and batture areas. However, because of the overriding importance of the Mississippi River Mainline Levee System, it was determined that the project could not consider compromising the levee in any way. The wharf structure must avoid interference with the integrity of the levee from toe to toe with no pilings being placed in the levee. Therefore, the wharf structure must be entirely pile-supported and be placed entirely in the batture area. The cost of the wharf structure (\$12.7 million) is 60 percent of the total project cost.

The cost estimates for the project represent concept costs for the features that the potential local sponsors would prefer to see developed. The features preferred by the potential local sponsors have also been designed to be in concert with the concerns of the Hydraulics and Hydrology, Civil Branch – Levees Section, and Geotechnical Branch within the New Orleans District. The primary concerns relate to: (1) the construction of the wharf structure – that piles not penetrate the levee slopes or crown; (2) that landing and overlook of the wharf structure not protrude into the Mississippi River and affect navigation adversely; and (3) that fill on the batture not degrade the integrity of the levee on the floodside.

In recognition of the uncompromised importance of the Mississippi River levee system, the concept plan is based on a post and beam technique that will avoid the levee slopes and crown. The interpretive and walking trails will require little or no fill, and the playing fields can be developed without significant fill material. The river overlook and ferry landing are important features of the development plan. The exact configurations cannot be developed at this time, but will be developed in concert with all affected interests during the feasibility phase of the project. Overall, however, this project has been developed in a manner that shows that the project can be developed without compromising the vital flood protection function of the levee system and the transportation function of the river itself.

2. Average Annual Cost

Table 8 shows the cost categories considered in the development of an average annual equivalent cost. Included are the capital cost, interest during construction, major replacements, and operation and maintenance costs. When these costs are discounted at 5-5/8 percent to determine the net present value of the cost streams and summed and amortized for a 50-year project life, an average annual equivalent cost of \$2,231,381 is obtained.

D. BENEFIT/COST RATIO

The Corps Project produces average annual equivalent benefits of \$5,068,265 attributable to general recreation activities and incidental recreation benefits of \$787,803. However, incidental benefits cannot be considered in the benefit/cost evaluation. Average annual equivalent costs for development and operation and maintenance of the project are \$2,231,381. Dividing average annual equivalent project benefits of \$5,068,265 by average equivalent project costs of \$2,231,381 results in a benefit/cost ratio of 2.3 to 1.

Table 8. Project Costs

Federal Fiscal Year	Capital Costs	Interest During Construction	Major Replacements	Operation & Maintenance Costs	Total Costs	Discount Factor	Period	Present Value of Costs
2005	\$536,836	\$15,099	\$0	\$0	\$551,934	1.17842	-3	\$650,410
2006	\$3,120,585	\$117,963	\$0	\$10,000	\$3,248,548	1.11566	-2	\$3,624,288
2007	\$8,935,599	\$457,044	\$0	\$78,000	\$9,470,643	1.05625	-1	\$10,003,367
2008	\$8,935,599	\$959,671	\$0	\$403,000	\$10,298,270	1.00000	0	\$10,298,270
2009	\$0	\$0	\$0	\$657,000	\$657,000	0.94675	1	\$622,012
2010	\$0	\$0	\$0	\$657,000	\$657,000	0.89633	2	\$588,887
2011	\$0	\$0	\$0	\$657,000	\$657,000	0.84859	3	\$557,526
2012	\$0	\$0	\$0	\$657,000	\$657,000	0.80340	4	\$527,835
2013	\$0	\$0	\$0	\$657,000	\$657,000	0.76062	5	\$499,726
2014	\$0	\$0	\$0	\$657,000	\$657,000	0.72011	6	\$473,113
2015	\$0	\$0	\$0	\$657,000	\$657,000	0.68176	7	\$447,918
2016	\$0	\$0	\$0	\$657,000	\$657,000	0.64546	8	\$424,064
2017	\$0	\$0	\$0	\$657,000	\$657,000	0.61108	9	\$401,481
2018	\$0	\$0	\$0	\$657,000	\$657,000	0.57854	10	\$380,100
2019	\$0	\$0	\$0	\$657,000	\$657,000	0.54773	11	\$359,858
2020	\$0	\$0	\$1,887,000	\$657,000	\$2,544,000	0.51856	12	\$1,319,218
2021	\$0	\$0	\$0	\$657,000	\$657,000	0.49094	13	\$322,551
2022	\$0	\$0	\$0	\$657,000	\$657,000	0.46480	14	\$305,373
2023	\$0	\$0	\$0	\$657,000	\$657,000	0.44005	15	\$289,111
2024	\$0	\$0	\$0	\$657,000	\$657,000	0.41661	16	\$273,715
2025	\$0	\$0	\$0	\$657,000	\$657,000	0.39443	17	\$259,138
2026	\$0	\$0	\$0	\$657,000	\$657,000	0.37342	18	\$245,338
2027	\$0	\$0	\$0	\$657,000	\$657,000	0.35353	19	\$232,272
2028	\$0	\$0	\$0	\$657,000	\$657,000	0.33471	20	\$219,903
2029	\$0	\$0	\$0	\$657,000	\$657,000	0.31688	21	\$208,192
2030	\$0	\$0	\$0	\$657,000	\$657,000	0.30001	22	\$197,105
2031	\$0	\$0	\$0	\$657,000	\$657,000	0.28403	23	\$186,608
2032	\$0	\$0	\$0	\$657,000	\$657,000	0.26890	24	\$176,671
2033	\$0	\$0	\$0	\$657,000	\$657,000	0.25458	25	\$167,262
2034	\$0	\$0	\$0	\$657,000	\$657,000	0.24103	26	\$158,355
2035	\$0	\$0	\$1,887,000	\$657,000	\$2,544,000	0.22819	27	\$580,518
2036	\$0	\$0	\$0	\$657,000	\$657,000	0.21604	28	\$141,938
2037	\$0	\$0	\$0	\$657,000	\$657,000	0.20453	29	\$134,379
2038	\$0	\$0	\$0	\$657,000	\$657,000	0.19364	30	\$127,222
2039	\$0	\$0	\$0	\$657,000	\$657,000	0.18333	31	\$120,447
2040	\$0	\$0	\$0	\$657,000	\$657,000	0.17357	32	\$114,033
2041	\$0	\$0	\$0	\$657,000	\$657,000	0.16432	33	\$107,960
2042	\$0	\$0	\$0	\$657,000	\$657,000	0.15557	34	\$102,211
2043	\$0	\$0	\$0	\$657,000	\$657,000	0.14729	35	\$96,768
2044	\$0	\$0	\$0	\$657,000	\$657,000	0.13944	36	\$91,614
2045	\$0	\$0	\$0	\$657,000	\$657,000	0.13202	37	\$86,735
2046	\$0	\$0	\$0	\$657,000	\$657,000	0.12499	38	\$82,116
2047	\$0	\$0	\$0	\$657,000	\$657,000	0.11833	39	\$77,743
2048	\$0	\$0	\$0	\$657,000	\$657,000	0.11203	40	\$73,603
2049	\$0	\$0	\$0	\$657,000	\$657,000	0.10606	41	\$69,683
2050	\$0	\$0	\$1,887,000	\$657,000	\$2,544,000	0.10041	42	\$255,455
2051	\$0	\$0	\$0	\$657,000	\$657,000	0.09507	43	\$62,459
2052	\$0	\$0	\$0	\$657,000	\$657,000	0.09000	44	\$59,133
2053	\$0	\$0	\$0	\$657,000	\$657,000	0.08521	45	\$55,984
2054	\$0	\$0	\$0	\$657,000	\$657,000	0.08067	46	\$53,002
2055	\$0	\$0	\$0	\$657,000	\$657,000	0.07638	47	\$50,180
2056	\$0	\$0	\$0	\$657,000	\$657,000	0.07231	48	\$47,508
2057	\$0	\$0	\$0	\$657,000	\$657,000	0.06846	49	\$44,978
2058	\$0	\$0	\$0	\$657,000	\$657,000	0.06481	50	\$42,582

Total Net Present Value: \$37,097,919
Average Annual Equivalent: \$2,231,381

*Interest rate of 5.625% for 50-year project life.

IX. REGIONAL ECONOMIC DEVELOPMENT BENEFITS

The Corps of Engineers has historically evaluated projects to determine economic feasibility based on NED benefits, the economic benefits to the nation and not a particular region, which were presented above. The purpose of this section of the report is to estimate the Regional Economic Development (RED) benefits that would be generated by the various features of the Comprehensive Plan on the West Baton Rouge Parish economy.

The construction and operation of the Corps Project and the private development expected to occur in response to the project (the PARI elements) will generate economic impacts within West Baton Rouge Parish. These RED impacts are measured as increases in business volume (sales), personal income (wages), and employment (jobs) and can be classified as being either direct, indirect, or induced impacts. Direct impacts include the initial increase in spending and employment generated by an activity such as construction or increased spending in the retail or lodging sector.

Indirect impacts consist of the increase in purchase of goods and services by firms that supply the businesses that are directly impacted by the initial increase in spending. These impacts are the additional “rounds” of spending that result from the initial sales by businesses directly impacted by the project. Induced impacts consist of increased household purchases of goods and services (such as food, clothing, and housing) by employees of directly and indirectly impacted firms. Total economic impacts are the sum of the direct, indirect, and induced impacts.

Many techniques have been developed to estimate types and levels of regional economic impacts. These models are based on the understanding of a regional economy as an interdependent entity. IMPLAN is a regional impact model that enables the evaluation of the economic impact of specific activities such as retail, wholesale, manufacturing, and service sales and the construction or operation of public works projects within an economy. IMPLAN was used in this analysis to estimate the regional economic impacts of the proposed project.

The direct impacts of the Corps Project and the private development expected to occur were developed from various primary and secondary sources. The direct construction impacts were developed using *Marshall & Swift Valuation Service* and *R.S. Means Square Foot Costs* as the basis for construction costs. Annual direct impacts were based on expected visitation, the size of private development, and sales values per square foot of commercial development. These direct impacts were used in conjunction with the IMPLAN model to estimate total impacts, which were distributed as one-time construction impacts and recurring impacts.

A. DIRECT ECONOMIC IMPACTS

The impact on the West Baton Rouge Parish economy was evaluated based on construction and operation of the Corps Project as well as induced private sector investment that is expected to occur once the project is completed. Economic impacts are expected to come from four sources: (1) project construction; (2) private development construction; (3) revenue generated at private commercial establishments; and (4) annual operation and maintenance expenditures associated with public facilities.

1. One-Time Construction Impacts

Estimates of the direct construction impacts (construction cost estimates) were based on the development that would be associated with the riverfront development plan. Construction costs for the Corps Project include costs for the wharf structure, the promenade, street improvements to provide access to the project, and various bike and walking paths. Construction costs for the private residential and commercial development expected to be facilitated by the Corps Project were developed using *Marshall & Swift Valuation Service* and *R.S. Means Square Foot Costs*. A summary of the construction costs for the various elements included in this analysis are presented in Table 9. Total construction costs are estimated at \$193.52 million, including \$21.57 million for the construction of Corps facilities and \$171.95 million for private commercial and residential facilities.

Table 9. Estimated Construction Costs of the Comprehensive Plan Features

Facility	Estimated Costs (Million \$)
Corps Project	\$21.57
Hotel	\$33.81
Condominium Tower (with Retail Space)	\$24.84
Assisted Living Facility	\$43.13
Loft Apartments	\$40.02
Retail Anchor	\$5.52
Retail Shops	\$5.52
Office Space	\$9.45
Civic Center	\$8.28
Bank	\$1.38
Total	\$193.52

2. Recurring Annual Impacts

Riverfront development is expected to generate increased visitation; retail, restaurant, and entertainment sales; and hotel stays on the West Baton Rouge riverfront. The estimated direct impacts of each of these activities are presented in Table 10. Development of a 162-room hotel should result in increased retail sales and lodging receipts within the local economy. Based on average occupancy rates and room rental rates, total annual lodging receipts are estimated at \$2.3 million.

Table 10. Direct Impacts (Annual Sales/Revenue) Associated with the Comprehensive Plan Features

Facility	Revenue (Million \$)
Hotel	\$2.30
Retail Space at Condominium Tower	\$2.66
Retail Anchor	\$8.66
Retail Shops	\$8.34
Office Space	\$18.12
Assisted Living Facility	\$1.21
Bank	\$1.75
Civic Center	\$0.28
Corps Project O&M	\$0.59
Total	\$43.90

The direct impact of the remaining activities associated with riverfront development was measured by the number of jobs created, which was in turn translated into business activity. It was assumed that 270 persons would be employed at the 67,500 square feet of office space associated with the development. Fifty persons were assumed to be employed at the assisted living facility, 10 at the bank, and three in operation and maintenance activities at the civic center.

Additional recurring impacts will result from annual operation and maintenance of the public facilities encompassed within the riverfront development. These annual expenditures were estimated at \$586,000 annually.

B. TOTAL ECONOMIC IMPACTS

The direct economic impacts attributable to the riverfront development were used in conjunction with the IMPLAN model to estimate the total economic impacts. The impacts were measured as increases in business volume, personal income, and employment. The total economic impacts can be classified as either one-time construction impacts or recurring operating impacts.

1. One-Time Construction Impacts

One-time construction impacts consist of the increased economic activities that would be expected to occur during the construction of the proposed project and the private residential and commercial development that would be spurred by the proposed project. These impacts are the entire impacts that will occur over the multi-year construction period and are not annual impacts. Once construction impacts are completed, these impacts would cease.

The total economic impacts of the construction of the Corps Project and the construction of anticipated private development are presented in Table 11, distributed as direct, indirect, and

induced impacts. The \$193.52 million in Corps and private construction should generate total construction impacts of an increase of \$256.68 million in business volume, \$75.51 million in personal income, and 2,328 jobs. Specifically, the \$21.57 million construction of the proposed elements on the levee top and river bature and parking to be constructed by the Corps are expected to generate \$28.71 million in business volume, \$9.27 million in personal income, and 278 jobs. The \$171.95 million in private development construction that could be induced by the proposed project is expected to generate \$227.9 million in business volume, \$66.24 million in personal income, and 2,050 jobs. It should be noted that these impacts would occur over the entire construction period and not in any one year. Furthermore, the increase in employment is interpreted as 2,328 man-years of employment that will occur during construction. A man-year of employment is defined as 2,080 hours of work and could represent a new job (position) or an increase in existing underutilized labor (increased hours for existing employees).

Table 11. Total One-Time Economic Impacts of Construction of the Comprehensive Plan Features

Corps Funded Riverfront Development Project				
Measure	Direct	Indirect	Induced	Total
Business Volume (Million Dollars)	\$21.566	\$3.794	\$3.353	\$28.713
Personal Income (Million Dollars)	\$7.080	\$1.202	\$0.984	\$9.266
Employment	193	38	47	278
Private Funded Development				
Measure	Direct	Indirect	Induced	Total
Business Volume (Million Dollars)	\$171.950	\$32.017	\$23.997	\$227.964
Personal Income (Million Dollars)	\$47.850	\$11.354	\$7.043	\$66.247
Employment	1,334	382	334	2,050
Combined Corps and Private Funded Development				
Measure	Direct	Indirect	Induced	Total
Business Volume (Million Dollars)	\$193.516	\$35.811	\$27.350	\$256.677
Personal Income (Million Dollars)	\$54.930	\$12.556	\$8.027	\$75.513
Employment	1,527	420	381	2,328

2. Annual Recurring Impacts

Project development and project-associated investment, once completed and operating, are expected to aid the riverfront in attraction of business visitors and tourists in general. The total recurring economic impacts of the Corps Project and the anticipated private commercial development are presented in Table 12 distributed as direct, indirect, and induced impacts. The \$43.9 million in annual direct business activity is expected to generate total annual economic impacts of \$42.29 million in business volume, \$18.31 million in personal income, and 733 jobs. Breaking these impacts down by Corps versus private sources, the privately developed hotel and retail sales and the jobs generated in the office buildings and other facilities are expected to generate \$41.49 million in business volume, \$16.76 million in personal income, and 720 jobs;

and the operation and maintenance of the Corps Project is projected to generate \$799,000 in business volume, \$430,000 in personal income, and 13 jobs. Unlike construction impacts that occur only during the construction phase, these impacts will recur annually as long as the project and associated private commercial development are operating.

Table 12. Recurring Annual Economic Impacts of Operation of the Comprehensive Plan Features

Operation and Maintenance of Corps Funded Facilities				
Measure	Direct	Indirect	Induced	Total
Business Volume (Million Dollars)	\$0.586	\$0.057	\$0.156	\$0.799
Personal Income (Million Dollars)	\$0.365	\$0.020	\$0.045	\$0.430
Employment	10	1	2	13
Private Development				
Measure	Direct	Indirect	Induced	Total
Business Volume (Million Dollars)	\$30.637	\$4.851	\$6.009	\$41.497
Personal Income (Million Dollars)	\$13.035	\$1.963	\$1.763	\$16.761
Employment	572	64	84	720
Combined Corps and Private Development				
Measure	Direct	Indirect	Induced	Total
Business Volume (Million Dollars)	\$31.223	\$4.908	\$6.165	\$42.296
Personal Income (Million Dollars)	\$13.400	\$1.983	\$1.808	\$17.191
Employment	582	65	86	733

X. REAL ESTATE

There are two major real estate activities that would be required during the initial phase of a feasibility study. These are rights-of-entry for surveys, soil borings, and HTRW and cultural resource investigations; and the development of preliminary real estate cost estimates.

Rights-of-entry activities include ownership research and obtaining the required permits. The development of total real estate costs requires land values, the approximate number of ownerships involved, relocations required by Public Law 91-646, and an estimate of the administrative, mapping, appraisal, and legal costs associated with right-of-way acquisition. If the required right-of-way is encumbered with an existing easement, as for a road or levee, a determination will have to be made of the rights of the various parties involved. The use of bature land may require additional research.

Real estate activities would involve the preparation of a Real Estate Plan, Appraisal Report, and, if necessary, a Preliminary Compensability Report.

XI. CONCLUSIONS

This analysis has identified a significant amount of data on demand, project concepts and costs, and project benefits. NED benefits in the form of recreation benefits exceed project costs, so the proposed Corps Project is economically viable. However, since recreation development in general and riverfront development in particular are not primary Corps of Engineers functions, the purpose of this section is to determine if there are compelling reasons for Corps of Engineers involvement by answering the following questions:

A. WHY RIVERFRONT DEVELOPMENT?

Protection of residents in the Mississippi River Valley from the physical and economic effects of the unconstrained overflow of the Mississippi has been achieved through the establishment by the Corps of Engineers of the Mainline Mississippi River Levee System. An unfortunate byproduct of the levee system has been the severance of the previous direct connection of many communities along the Mississippi River from the river itself. The Mississippi River has historically afforded communities along its banks transportation, economic, aesthetic, environmental, and recreational benefits. The elimination of the direct connection of many communities to the Mississippi has reduced or eliminated these benefits and has also severed the physical connection of many communities to their origin.

In the U.S. in general and the Mississippi River Valley in particular there has been a resurgence in redevelopment efforts along the river. Most communities along the Mississippi River came into existence in the 1800s as steamboat ports or landings. The transition to railroads for freight movement started the deterioration of riverfront communities. Flood control projects such as levees and floodwalls further restricted public access and views of the river. Communities are now anxious to revitalize their downtown areas, and those located on rivers look to riverfront development as a key ingredient in plans to refocus community life on the traditional primary role of water. The heightened degree of interest in riverfronts is illustrated by the fact that \$4.2 billion in long-term projects in need of funding assistance for riverfront development have been identified in the Lower Mississippi River Valley.

B. WHY PORT ALLEN?

Port Allen offers a number of unique advantages for riverfront development in the Lower Mississippi River Valley:

- The project area in Port Allen offers an expansive batture, which would be available for recreational, environmental, and ecotourism activities.
- Port Allen's historical dependence on the Mississippi was significant as a port and as a ferry crossing to Baton Rouge.
- Through the establishment of a water taxi service, a connection to downtown Baton Rouge could be reestablished.

- Riverfront development in Port Allen would offer an attractive, low-cost alternative for housing for Baton Rouge CBD workers.
- Development of housing in Port Allen with transportation to the Baton Rouge CBD via water taxi would greatly reduce traffic congestion and air pollution.
- The area to be redeveloped on the landside of the levee is in a state of decline and can probably be acquired at a reasonable cost.
- The Port Allen site is proximate and highly visible to motorists crossing the Mississippi River on the nearby I-10 Bridge.

C. WHY THE CORPS OF ENGINEERS?

The Corps of Engineers is currently involved in environmental and ecosystem restoration as a result of previous Corps activities and the previous activities of others. The principle of reestablishing what has been lost because of Corps activities can and has been extended to riverfront development. Through Congressional adds, the Corps is participating in a number of riverfront development projects throughout the Mississippi River and Ohio River valleys.

The reasons that the Corps of Engineers should be involved in the riverfront activities in West Baton Rouge Parish are numerous and include:

1. Corps of Engineers activities (the Mainline Mississippi River Levee Project) have been instrumental in severing Port Allen's economic, recreational, cultural, and historical connection to the Mississippi River.
2. The Corps of Engineers is involved in all river projects concerned with flood control (levee, floodwalls, etc.), navigation (dredging, channel modification, etc.), or the environment (wetlands, NEPA documentation, etc.) and is automatically involved as a result of its regulatory functions.
3. Through Congressional adds, the Corps of Engineers has been instrumental in large riverfront development projects, particularly in the Ohio River Valley.
4. Through its role as the Nation's major engineering resource for water resource projects, the Corps of Engineers has all of the technical capabilities and experience for the planning, design, construction, and project management expertise required to carry out larger riverfront development efforts.
5. There are indications that the public and Congress would support an expanded Corps role in riverfront development.
6. The proposed project would assist the current Federal Administration's economic development efforts.

The proposed project offers an excellent opportunity for the Corps of Engineers in the Lower Mississippi River Valley to utilize its expertise and authority in order to satisfy a pressing need to reestablish the social and economic connections of a community to the Mississippi River. The benefits to the community, the region, and the Nation would be significant.

XII. ADVANCING BEYOND THIS REPORT

This analysis shows a National Economic Development Benefits justification for Federal participation in riverfront development in West Baton Rouge Parish. Activities that are already proceeding at the project site or that have already been completed include a modest levee-top pedestrian promenade, an approval to construct the Port Allen Municipal Building near the riverfront, and an approved levee-top bike path project extending northward from the project site and southward to the Port Allen Locks. Funding for these completed and approved projects has come from Federal (the Corps of Engineers and Federal Highway Administration), State of Louisiana (Louisiana Department of Transportation and Development), and local (City of Port Allen) agencies. Advancing riverfront development in West Baton Rouge Parish can best be accomplished by the City of Port Allen through continued utilization of a variety of funding sources and programs as it has in accomplishing the developments at the site to date. Specifically, riverfront development in West Baton Rouge Parish can best be advanced by simultaneously:

1. Proceeding to the Feasibility Study Phase of study by the U.S. Army Corps of Engineers.
2. Utilizing available funding from other Federal agencies, the State of Louisiana, and local agencies to construct separate elements of the Comprehensive Plan.

XIII. RECOMMENDATION

This analysis has shown that the proposed riverfront development project in West Baton Rouge Parish is economically justified based upon recreational benefits. The project produces National Economic Development (NED) recreational benefits of \$5,068,265 annually and average costs of \$2,231,381 annually, resulting in a benefit to cost ratio of 2.3 to 1. The project also produces \$787,803 in incidental recreation benefits to passive users of the project annually, which are not included in the benefit to cost analysis. Construction of the \$21.57 million project would lead to an additional \$172.0 million local and private investment. The operation of the combined development, would lead to an additional \$59.5 million in sales and salaries annually and 733 new permanent jobs at Port Allen.

Because of the significant capital investment required to complete the levee-top and batture side elements (\$21.57 million), it is recommended that funding be sought, as available, for each of the four major project components resulting in a phased construction. The major components include: the Wharf Structure (\$16,950,897), the Multiuse Recreation Area (\$696,660), the Playing Fields (\$343,200), and the Bicycle Paths (\$3,575,000).

The West Baton Rouge Parish project is economically justified, however current administration policy of the Corps of Engineers places recreation-based projects at much lower priority than flood control, navigation, and environmental restoration projects. In light of current administration policy, this project is not anticipated to be included in the Corps of Engineers annual budget, and thus it is not recommended to advance to the feasibility phase. It is noted that low priority projects have received congressional support through the Corps of Engineers annual Energy and Water Development Appropriations Bill. The Corps of Engineers is positioned to proceed in the event of a direct congressional appropriation.

Appendix A

ENVIRONMENTAL FIRSTSEARCHTM REPORT



Banks Information Solutions, Inc.

Environmental FirstSearch™ Report

TARGET PROPERTY:

PORT ALLEN LA 70767

Job Number: 0407-01

PREPARED FOR:

GEC, INC.

P.O. Box 84010

Baton Rouge, LA 70884

Attn: Joseph Wyble

04-07-03



Tel: (512) 478-0059

Fax: (512) 478-1433

Environmental FirstSearch Search Summary Report

Target Site:

PORT ALLEN LA 70767

FirstSearch Summary

Database	Sel	Updated	Radius	Site	1/8	1/4	1/2	1/2>	ZIP	TOTALS
NPL	Y	02-10-03	1.00	0	0	0	0	0	0	0
CERCLIS	Y	01-09-03	0.50	0	0	0	0	-	1	1
NFRAP	Y	01-09-03	0.25	0	0	0	-	-	0	0
RCRA TSD	Y	12-09-02	0.50	0	0	0	0	-	0	0
RCRA COR	Y	12-09-02	1.00	0	0	0	0	0	0	0
RCRA GEN	Y	12-09-02	0.25	10	4	1	-	-	0	15
ERNS	Y	12-31-02	0.15	0	0	0	-	-	0	0
State Sites	Y	NA	1.00	0	0	0	0	1	5	6
SWL	Y	01-01-99	0.50	0	0	0	0	-	0	0
REG UST/AST	Y	03-27-03	0.25	8	4	1	-	-	7	20
Leaking UST	Y	03-26-99	0.50	9	1	1	1	-	1	13
- TOTALS -				27	9	3	1	1	14	55

Notice of Disclaimer

Due to the limitations, constraints, inaccuracies and incompleteness of government information and computer mapping data currently available to Banks Information Solutions, Inc., certain conventions have been utilized in preparing the locations of all federal, state and local agency sites residing in Banks Information Solutions, Inc.'s databases. All EPA NPL and state landfill sites are depicted by a rectangle approximating their location and size. The boundaries of the rectangles represent the eastern and western most longitudes; the northern and southern most latitudes. As such, the mapped areas may exceed the actual areas and do not represent the actual boundaries of these properties. All other sites are depicted by a point representing their approximate address location and make no attempt to represent the actual areas of the associated property. Actual boundaries and locations of individual properties can be found in the files residing at the agency responsible for such information.

Waiver of Liability

Although Banks Information Solutions, Inc. uses its best efforts to research the actual location of each site, Banks Information Solutions, Inc. does not and can not warrant the accuracy of these sites with regard to exact location and size. All authorized users of Banks Information Solutions, Inc.'s services proceeding are signifying an understanding of Banks Information Solutions, Inc.'s searching and mapping conventions, and agree to waive any and all liability claims associated with search and map results showing incomplete and or inaccurate site locations.

**Environmental FirstSearch
Site Information Report**

Request Date: 04-07-03
Requestor Name: jason henderson
Standard: ASTM

Search Type: AREA
Job Number: 0407-01
Filtered Report

TARGET ADDRESS:

PORT ALLEN LA 70767

Demographics

Sites: 55	Non-Geocoded: 14	Population: NA
Radon: 0.1 - 0.2 PCI/L		

Site Location

	<u>Degrees (Decimal)</u>	<u>Degrees (Min/Sec)</u>		<u>UTMs</u>
Longitude:	-91.206029	-91:12:22	Easting:	672272.014
Latitude:	30.440727	30:26:27	Northing:	3368808.045
			Zone:	15

Comment

Comment:

Additional Requests/Services

Adjacent ZIP Codes: 1 Mile(s)

Services:

<u>ZIP Code</u>	<u>City Name</u>	<u>ST</u>	<u>Dist/Dir</u>	<u>Sel</u>
70801	BATON ROUGE	LA	0.63 NE	Y
70802	BATON ROUGE	LA	0.48 SE	Y
70803	BATON ROUGE	LA	0.80 SE	Y

	<u>Requested?</u>	<u>Date</u>
Sanborns	No	
Aerial Photographs	No	
Topographical Maps	No	
City Directories	No	
Title Search	No	
Municipal Reports	No	
Online Topos	No	

Environmental FirstSearch Sites Summary Report

TARGET SITE:

PORT ALLEN LA 70767

JOB: 0407-01

TOTAL: 55 **GEOCODED:** 41 **NON GEOCODED:** 14 **SELECTED:** 55

ID	DB Type	Site Name/ID/Status	Address	Dist/Dir	Map ID
1	RCRAGN	ALLIED SYSTEMS LTD LAD985207067/VGN	1300 LEBLANC RD PORT ALLEN LA 70767	0.00 --	1
18	UST	CHEVRON FOOD MART 61-013538	704 S. ALEXANDER STREET PORT ALLEN LA 70767	0.00 --	14
20	UST	CITY AMOCO SERVICE 61-002116	508 COURT STREET PORT ALLEN LA 70767	0.00 --	18
3	RCRAGN	COMPLETE AUTO TRANSIT INC LAD985222348/VGN	1300 LEBLANC RD STE B PORT ALLEN LA 70767	0.00 --	1
21	UST	DAVE S GARAGE 61-014122	420 COURT STREET PORT ALLEN LA 70767	0.00 --	19
31	LUST	DAVE S GARAGE 92-2-0171	216 WHITEHEAD BLVD. PORT ALLEN LA 70767	0.00 --	19
22	UST	DENOVA S TEXACO 61-013675	110 N ALEXANDER PORT ALLEN LA 70767	0.00 --	20
32	LUST	DENOVA S TEXACO 92-2-0050	216 WHITEHEAD BLVD. PORT ALLEN LA 70767	0.00 --	20
33	LUST	DENOVA S TEXACO 93-2-0088	901 ROSEDALE ROAD PORT ALLEN LA 70767	0.00 --	20
4	RCRAGN	DENOVAS FULL SVC TEXACO LAD981915994/VGN	110 N ALEXANDER PORT ALLEN LA 70767	0.00 --	3
5	RCRAGN	EXXON CO USA 52061 LAD985194653/VGN	520 S ALEXANDER AVE PORT ALLEN LA 70767	0.00 --	21
23	UST	EXXON STATION 52061 61-004062	520 S. ALEXANDER DR. / I-10 PORT ALLEN LA 70767	0.00 --	21
34	LUST	EXXON STATION 52061 90-2-0180	520 S. ALEXANDER DR. / I-10 PORT ALLEN LA 70767	0.00 --	21
35	LUST	EXXON STATION 52061 94-2-0131	520 S. ALEXANDER DR. / I-10 PORT ALLEN LA 70767	0.00 --	21
6	RCRAGN	GR BR PORT COMM AKA PORT OF BR LAD985183284/SGN	2425 ERNEST WILSON DR PORT ALLEN LA 70767	0.00 --	5
24	UST	H J LOWE 61-017952	313 S JEFFERSON PORT ALLEN LA 70767	0.00 --	22
7	RCRAGN	INTERNATIONAL PAINTING CORP LAR000010223/LGN	2180 LA HWY 1 S PORT ALLEN LA 70767	0.00 --	6
9	RCRAGN	PORT ALLEN INDUSTRIES INC LAD040773608/TR	HWY 190 W PORT ALLEN LA 70767	0.00 --	8
12	RCRAGN	RUSSOS AUTO PARTS LA0001017409/VGN	843 OAKS AVE PORT ALLEN LA 70767	0.00 --	11
13	RCRAGN	STAR ENTER LAD985197052/SGN	650 S ALEXANDER PORT ALLEN LA 70767	0.00 --	25
37	LUST	TEXACO 44-398-1324 94-2-0113	650 S. ALEXANDER PORT ALLEN LA 70767	0.00 --	25

Environmental FirstSearch Sites Summary Report

TARGET SITE:
PORT ALLEN LA 70767

JOB: 0407-01

TOTAL: 55 **GEOCODED:** 41 **NON GEOCODED:** 14 **SELECTED:** 55

ID	DB Type	Site Name/ID/Status	Address	Dist/Dir	Map ID
26	UST	TEXACO 44-398-1324 61-011327	650 S. ALEXANDER PORT ALLEN LA 70767	0.00 --	25
38	LUST	UNION PACIFIC RAILROAD 89-2-0121	1300 LE BLANC PORT ALLEN LA 70767	0.00 --	1
27	UST	UNION PACIFIC RAILROAD 61-014155	1300 LE BLANC PORT ALLEN LA 70767	0.00 --	1
40	LUST	WESTPORT CHEVRON 93-2-0051	704 S. ALEXANDER STREET PORT ALLEN LA 70767	0.00 --	14
41	LUST	WESTPORT CHEVRON 91-2-0380	704 S. ALEXANDER STREET PORT ALLEN LA 70767	0.00 --	14
15	RCRAGN	WESTPORT CONOCO LAD982286486/LGN	704 S ALEXANDRIA PORT ALLEN LA 70767	0.00 --	14
11	RCRAGN	REGAL DRY CLNRS LAD981151848/VGN	109 N ALEXANDER PORT ALLEN LA 70767	0.01 NW	10
29	UST	WALDROUP PUMP SERVICE 61-017935	120 N ALEXANDER PORT ALLEN LA 70767	0.01 NW	26
25	UST	NORGETOWN LAUNDRY 61-017165	159 8TH ST PORT ALLEN LA 70767	0.04 NW	24
17	UST	AUDREY GIROIR 61-016007	1048-1050 COMMERCIAL STREET PORT ALLEN LA 70767	0.04 SW	16
2	RCRAGN	BATON ROUGE PRINTING CO INC LAD985172964/VGN	1130 COMMERCIAL DR PORT ALLEN LA 70767	0.06 SW	2
8	RCRAGN	PENSKE TRUCK LEASING LAD118994888/VGN	1100 COMMERCIAL AVE PORT ALLEN LA 70767	0.10 SW	7
39	LUST	UNITED PARCEL SERVICE 91-2-0316	1111 COMMERCIAL DR PORT ALLEN LA 70767	0.12 SW	13
28	UST	UNITED PARCEL SERVICE 61-010798	1111 COMMERCIAL DR PORT ALLEN LA 70767	0.12 SW	13
14	RCRAGN	UNITED PARCEL SVC LAD981521750/VGN	1111 COMERICAL DR PORT ALLEN LA 70767	0.12 SW	13
19	UST	CIRCLE K #8045 61-008852	430 N. ALEXANDER PORT ALLEN LA 70767	0.22 NW	17
30	LUST	CIRCLE K #8045 85-2-0011	430 N. ALEXANDER PORT ALLEN LA 70767	0.22 NW	17
10	RCRAGN	PORT OF GREATER BATON ROUGE LAR000048553/LGN	1002 BARGE CANAL RD BATON ROUGE LA 70807	0.25 NE	9
36	LUST	MCCARTY CORPORATION 92-2-0162	1405 COMMERCIAL DRIVE PORT ALLEN LA 70767	0.41 SW	23
16	STATE	CAPITOL LAKES 174/CONFIRMED SITE	BATON ROUGE LA	0.94 NE	15

Environmental FirstSearch Sites Summary Report

TARGET SITE:

PORT ALLEN LA 70767

JOB: 0407-01

TOTAL: 55 **GEOCODED:** 41 **NON GEOCODED:** 14 **SELECTED:** 55

ID	DB Type	Site Name/ID/Status	Address	Dist/Dir	Map ID
48	UST	APEX OIL COMPANY 61-000263	995 EARNEST WILSON ROAD PORT ALLEN LA 70767	NON GC	
43	STATE	BARRY MOORE LANDFILL 94/POTENTIAL SITE	PORT ALLEN LA	NON GC	
44	STATE	CATALYST HANDLING SYSTEMS INC. 177/POTENTIAL SITE	PORT ALLEN LA	NON GC	
49	UST	CLOSED STATION 61-016128	LA HIGHWAY 1 PORT ALLEN LA 70767	NON GC	
50	UST	COMMUNITY COFFEE CO., INC 61-002296	NOT GIVEN PORT ALLEN LA 70767	NON GC	
51	UST	DISTRIBUTION INTERNATIONAL 61-012999	950 MAHAFFEY ROAD PORT ALLEN LA 70767	NON GC	
45	STATE	HAGGARD TRUCKING SERVICE CO. 403/POTENTIAL SITE	PORT ALLEN LA	NON GC	
46	STATE	LOUISIANA METALS 541/POTENTIAL SITE	PORT ALLEN LA	NON GC	
55	LUST	POPLAR GROVE SUGAR MILL 92-2-0224	HIGHWAY 1 PORT ALLEN LA	NON GC	
52	UST	SOUTHERN SCRAP MATERIAL CO.IN 61-011243	1367 1\2 MAHAFFEY ROAD PORT ALLEN LA 70767	NON GC	
42	CERCLIS	TIGER MARINE LA0000568238/NOT PROPOSED	FORT OF RIVERVIEW DR., P.O. BO PORT ALLEN LA 70767	NON GC	
47	STATE	TIGER MARINE 1733/POTENTIAL SITE	PORT ALLEN LA	NON GC	
53	UST	WEST BATON ROUGE PARISH SCH BD 61-003847	ROSEDALE RD PORT ALLEN LA 70767	NON GC	
54	UST	WESTERN COMPANY OF NORTH AMERICA 61-011490	HWY 1 NORTH PORT ALLEN LA 70767	NON GC	

**Environmental FirstSearch
Site Detail Report**

TARGET SITE:

PORT ALLEN LA 70767

JOB: 0407-01

REGISTERED UNDERGROUND STORAGE TANKS

SEARCH ID: 50

DIST/DIR: NON GC

MAP ID:

NAME: COMMUNITY COFFEE CO., INC
ADDRESS: NOT GIVEN
PORT ALLEN LA 70767

REV: 03/26/03
ID1: 61-002296
ID2:

CONTACT: BELL WEBER

STATUS:
PHONE: (504) 387-5828

TEMPORARILY OUT OF USE:

.

PERMANENTLY OUT OF USE:

Y

TANK INSTALLED DATE:

71/05/01

TANK CAPACITY:

2000 GALLONS

TANK CONTENTS

EMPTY:

Y

DIESEL:

.

KEROSENE:

.

GAS:

.

USED OIL:

.

HAZARDOUS:

.

MIXTURE:

.

UNKNOWN:

.

OTHER:

.

MATERIAL(S) OF CONSTRUCTION

STEEL:

Y

CONCRETE:

.

FIBERGLASS:

.

UNKNOWN:

.

OTHER:

.

INTERNAL TANK PROTECTION INFORMATION

CATHODIC PROTECTION:

.

LINED:

.

UNKNOWN:

Y

NONE:

.

OTHER:

.

EXTERNAL TANK PROTECTION

CATHODIC PROTECTION:

.

PAINTED:

.

FIBERGLASS:

.

NONE:

.

UNKNOWN:

Y

OTHER:

.

PIPING INFORMATION

STEEL:

.

GALVANIZED STEEL:

.

FIBERGLASS:

.

CATHODIC PROTECTION:

.

UNKNOWN:

Y

OTHER:

.

Environmental FirstSearch Federal Databases and Sources

ASTM Databases:

CERCLIS: *Comprehensive Environmental Response Compensation and Liability Information System.* The EPA's database of current and potential Superfund sites currently or previously under investigation. Source: Environmental Protection Agency.

Updated quarterly.

ERNS: *Emergency Response Notification System.* The EPA's database of emergency response actions. Source: Environmental Protection Agency. Data since January, 2001 has been received from the National Response Center as the EPA no longer maintains this data.

Updated quarterly.

FINDS: *The Facility Index System.* The EPA's Index of identification numbers associated with a property or facility which the EPA has investigated or has been made aware of in conjunction with various regulatory programs. Each record indicates the EPA office that may have files on the site or facility. Source: Environmental Protection Agency.

Updated semi-annually.

NPL: *National Priority List.* The EPA's list of confirmed or proposed Superfund sites. Source: Environmental Protection Agency.

Updated quarterly.

RCRIS: *Resource Conservation and Recovery Information System.* The EPA's database of registered hazardous waste generators and treatment, storage and disposal facilities. Included are RAATS (RCRA Administrative Action Tracking System) and CMEL (Compliance Monitoring & Enforcement List). Source: Environmental Protection Agency.

RCRA TSD: *Resource Conservation and Recovery Information System Treatment, Storage, and Disposal Facilities.* The EPA's database of RCRIS sites which treat, store, dispose, or incinerate hazardous waste. This information is also reported in the standard RCRIS detailed data.

RCRA COR: *Resource Conservation and Recovery Information System Corrective Action Sites.* The EPA's database of RCRIS sites with reported corrective action. This information is also reported in the standard RCRIS detailed data.

RCRA GEN: *Resource Conservation and Recovery Information System Large and Small Quantity Generators.* The EPA's database of RCRIS sites that create more than 100kg of hazardous waste per month or meet other RCRA requirements. Included are RAATS (RCRA Administrative Action Tracking System) and CMEL (Compliance Monitoring & Enforcement List).

RCRA NLR: *Resource Conservation and Recovery Information System sites No Longer Regulated.* The EPA's database of RCRIS sites that create less than 100kg of hazardous waste per month or do not meet other RCRA requirements.

All RCRA databases are Updated quarterly

Non-ASTM Databases:

HMIRS: Hazardous Materials Incident Response System: This database contains information from the US Department of Transportation regarding materials, packaging, and a description of events for tracked incidents.

Updated quarterly.

NCDB: National Compliance Database. This EPA database contains information relating to TSCA (Toxic Substances Control Act) and FTTS which provides support for the national pesticides and toxics program.

Updated quarterly

NPDES: National Pollution Discharge Elimination System. The EPA's database of all permitted facilities receiving and discharging effluents. Source: Environmental Protection Agency.

Updated semi-annually.

NRDB: National Radon Database. The NRDB was created by the EPA to distribute information regarding the EPA/State Residential Radon Surveys and the National Residential Radon Survey. The data is presented by zipcode in Environmental FirstSearch Reports. Source: National Technical Information Service (NTIS)

Updated Periodically

Nuclear: The Nuclear Regulatory Commission's (NRC) list of permitted nuclear facilities.

Updated Periodically

PADS: PCB Activity Database System

The EPA's database PCB handlers (generators, transporters, storers and/or disposers) that are required to notify the EPA, the rules being similar to RCRA. This database indicates the type of handler and registration number. Also included is the PCB Transformer Registration Database.

Updated semi-annually.

Receptors: 1995 TIGER census listing of schools and hospitals that may house individuals deemed sensitive to environmental discharges due to their fragile immune systems.

Updated Periodically

RELEASES: Air and Surface Water Releases. A subset of the EPA's ERNS database which have impacted only air or surface water.

Updated semi-annually.

Soils: This database includes the State Soil Geographic (STATSGO) data for the conterminous United States. It contains information regarding soil characteristics such as water capacity, percent clay, organic material, permeability, thickness of layers, hydrological characteristics, quality of drainage, surface, slope, liquid limit, and

the annual frequency of flooding. Source: United States Geographical Survey (USGS)

Updated quarterly

TRIS: Toxic Release Inventory System. The EPA's database of all facilities that have had or may be prone to toxic material releases. Source: Environmental Protection Agency.

Updated semi-annually.

**Environmental FirstSearch
Louisiana Databases and Sources**

1. LANDFILLS: The Louisiana Department of Environmental Quality listing of all permitted solid waste landfills as maintained by the Solid Waste Division.

Contact: Pam Kimball, (225) 765-0249

Updated Daily

2. LUST: Leaking Underground Storage Tanks. The Louisiana Department of Environmental Quality listing of all leaking underground storage tanks as maintained by the Underground Storage Tank Division.

Contact: Niels Larsen, (225) 765-0355

Updated Quarterly

3. STATE SITES: The Louisiana Department of Environmental Quality listing of all known potential and confirmed hazardous waste sites maintained by the Office of Waste Services " Inactive and Abandoned Sites Division.

Contact: Inactive and Abandoned Sites Division, (225) 765-0487

Updated Quarterly

4. UST: Underground Storage Tanks. The Louisiana Department of Environmental Quality listing of all underground storage tanks as maintained by the Underground Storage Tank Division.

Contact: Niels Larsen, (225) 765-0355

Updated Weekly

Environmental FirstSearch
Street Name Report for Streets within 1 Mile(s) of Target Property

TARGET SITE: PORT ALLEN LA 70767

JOB: 0407-01

Street Name	Dist/Dir	Street Name	Dist/Dir
13th St	0.54 NW	N 11th St	0.48 NW
14th St	0.35 NW	N 12th St	0.30 NW
3rd St	0.62 NW	N 15th St	0.39 SW
4th St	0.58 NW	N 3rd St	0.76 NE
6th St	0.00 --	N 4th St	0.83 NE
7th St	0.00 --	N 5th St	0.90 NE
8th St	0.00 --	N 6th St	0.97 NE
Alabama St	0.00 --	N Alexander Ave	0.00 --
Allendale Dr	0.59 SW	N Jefferson Ave	0.00 --
America St	0.86 NE	N Line Rd	0.28 SW
Arches St	0.68 SE	N River Rd	0.63 NE
Aster St	0.83 SE	Nicholson Dr	0.79 -E
Atchafalaya St	0.00 --	NORTH 10th St	0.26 NW
Avenue A	0.00 --	NORTH 11th St	0.48 NW
Avenue B	0.00 --	NORTH 12th St	0.30 NW
Avenue C	0.00 --	NORTH 15th St	0.39 SW
Avenue D	0.00 --	NORTH 3rd St	0.76 NE
Avenue E	0.00 --	NORTH 4th St	0.83 NE
Avenue F	0.00 --	NORTH 5th St	0.90 NE
Avenue G	0.00 --	NORTH 6th St	0.97 NE
Azalea St	0.01 SW	NORTH Alexander Ave	0.00 --
Aztec St	0.74 SE	North Blvd	0.64 NE
Bluebell St	0.07 SW	NORTH Jefferson Ave	0.00 --
Brickyard Ln	0.71 NE	NORTH Line Rd	0.28 SW
Burbridge St	0.66 NW	NORTH River Rd	0.63 NE
Calendula St	0.13 SW	North St	0.64 NE
California Ave	0.06 NW	Oaks Ave	0.00 --
Canal Way	0.56 NW	Oklahoma St	0.64 SE
Capital Dr	0.00 --	Oregon Ave	0.39 NW
Capitol Access Rd	0.81 NE	Oregon St	0.92 SE
Capitol Lake Dr	0.84 NE	Pacific Ave	0.00 --
Charropin St	0.62 NW	Palm St	0.26 NW
Chatsworth St	0.90 SE	Peabody Dr	0.76 NE
Cinclare Dr	0.47 SW	Penalver St	0.86 NE
Clark St	0.80 NW	Phillip s Ln	0.56 SW
Cohns Aly	0.07 NW	Phillips Way	0.28 SW
Commercial Dr	0.00 --	Pine St	0.26 NW
Convention St	0.64 NE	River Rd	0.89 SE
Coolidge St	0.67 SE	Roosevelt St	0.00 --
Court St	0.00 --	Rosedale Rd	0.74 NW
Courthouse St	0.52 NW	Royal St	0.95 NE
Daniel Webster St	0.79 SE	S 12th St	0.19 SW
Dixie Aly	0.69 SE	S 14th St	0.32 SW
Dort St	1.00 NE	S Alexander Ave	0.00 --
Duane St	0.86 SE	S Jefferson Ave	0.00 --
Dunbar Ave	0.95 NE	S Pacific St	0.92 NW
Duncan Dr	0.98 SE	S River Rd	0.00 --
Eleanor St	0.70 NW	S Westport Dr	0.00 --

Environmental FirstSearch
Street Name Report for Streets within 1 Mile(s) of Target Property

TARGET SITE: PORT ALLEN LA 70767

JOB: 0407-01

Street Name	Dist/Dir	Street Name	Dist/Dir
Elevator Rd	0.00 --	Sarrco Ln	0.83 SW
Ellwood St	0.89 SE	Soloman St	0.87 NW
Elm St	0.12 NW	Somerulus St	0.86 NE
Emma St	0.67 SE	Sonora St	1.00 SE
Ernest Wilson Dr	0.00 --	SOUTH 12th St	0.19 SW
Eucalyptus St	0.26 SW	SOUTH 14th St	0.32 SW
Europe St	0.68 NE	SOUTH Alexander Ave	0.00 --
Florida Ave	0.12 NW	South Blvd	0.63 NE
Florida St	0.63 NE	SOUTH Jefferson Ave	0.00 --
France St	0.65 NE	SOUTH Pacific St	0.92 NW
Franklin St	0.67 NW	SOUTH River Rd	0.00 --
Garner St	0.76 SE	SOUTH Westport Dr	0.00 --
Georgia Ave	0.32 NW	Spain St	0.64 NE
Gila St	0.78 SE	Spanish Town Road	0.74 NE
Glacier St	0.91 SE	St Charles St	0.87 NE
Gladiolus St	0.40 SW	St Ferdinand St	0.84 NE
Government St	0.65 NE	St James St	0.67 NE
Grain Dr	0.00 --	St Louis St	0.77 NE
Haig St	0.66 SE	St Philip St	0.73 NE
Harding Ave	0.00 --	State Capitol Dr	0.80 NE
Hazel St	1.00 SE	Sun Plus Pky	0.67 SW
Heliotrope St	0.46 SW	Terrace St	0.68 SE
Highland Rd	0.85 NE	Tower Rd	0.00 --
I-10	0.00 --	Trey Way	0.79 NW
Illinois St	0.86 SE	University Walk	0.84 NE
Indiana St	0.77 SE	Van Buren St	0.67 SE
Iowa St	0.96 SE	Veta St	0.97 SE
Johnson St	0.64 NW	Village St	0.49 SW
Julia St	0.89 SE	W Chimes St	0.86 SE
Kentucky	0.30 NW	W Garfield St	0.76 SE
Kentucky Ave	0.19 NW	W Grant St	0.74 SE
La Highway 1 NORTH	0.75 NW	W Johnson St	0.87 SE
La Highway 1 SOUTH	0.00 --	W Margaret St	0.88 SE
Lafayette St	0.69 NE	W Mc Kinley St	0.73 SE
Lakeland Dr	0.93 NE	W Roosevelt St	0.77 SE
Laurel St	0.63 NE	W Washington St	0.97 SE
Leblanc Rd	0.00 --	Washington St	0.00 --
Levee Rd	0.46 SW	WEST Alice	0.97 SE
Louisiana Ave	0.57 NW	WEST Chimes St	0.86 SE
Magnolia	0.05 NW	WEST Garfield St	0.76 SE
Mahaffey Rd	0.00 --	WEST Grant St	0.74 SE
Main St	0.63 NE	WEST Johnson St	0.87 SE
Maryland Ave	0.25 NW	WEST Margaret St	0.88 SE
Mayflower St	0.65 NE	WEST Mc Kinley St	0.73 SE
Mc Clung St	0.74 SE	WEST Roosevelt St	0.77 SE
Michigan Ave	0.45 NW	WEST Washington St	0.97 SE
Miller St	0.95 NE	Whitehead Blvd	0.00 --
Monrovia St	0.90 NE	Woodrow Dr	0.87 NE

Environmental FirstSearch
Street Name Report for Streets within 1 Mile(s) of Target Property

TARGET SITE: PORT ALLEN LA 70767

JOB: 0407-01

Street Name	Dist/Dir	Street Name	Dist/Dir
Moody St	0.76 NW	Wyoming St	0.77 SE
Myrtle Ave	0.86 SE		
N 10th St	0.26 NW		



Environmental FirstSearch

1 Mile Radius from Area
ASTM Map: NPL, RCACOR, STATE Sites

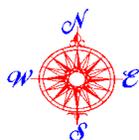


, PORT ALLEN LA 70767



Source: 1999 U.S. Census TIGER Files

- Area Polygon
- Identified Site, Multiple Sites, Receptor
- NPL, Solid Waste Landfill (SWL) or Hazardous Waste
- Railroads
- Black Rings Represent 1/4 Mile Radii; Red Ring Represents 500 ft. Radius



Environmental FirstSearch

.5 Mile Radius from Area
ASTM Map: CERCLIS, RCRATSD, LUST, SWL

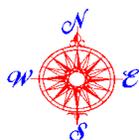


, PORT ALLEN LA 70767



Source: 1999 U.S. Census TIGER Files

- Area Polygon
- Identified Site, Multiple Sites, Receptor
- NPL, Solid Waste Landfill (SWL) or Hazardous Waste
- Railroads
- Black Rings Represent 1/4 Mile Radii; Red Ring Represents 500 ft. Radius



Environmental FirstSearch

.25 Mile Radius from Area
ASTM Map: RCAGEN, ERNS, UST



, PORT ALLEN LA 70767



Source: 1999 U.S. Census TIGER Files

- Area Polygon
- Identified Site, Multiple Sites, Receptor
- NPL, Solid Waste Landfill (SWL) or Hazardous Waste
- Railroads
- Black Rings Represent 1/4 Mile Radii; Red Ring Represents 500 ft. Radius

Appendix B

ECONOMIC GUIDANCE MEMORANDUM 03-04

Economic Guidance Memorandum 03-04
Unit Day Values for Recreation, Fiscal Year 2003

The national economic development (NED) benefit evaluation procedures contained in ER 1105-2-100 (22 Apr 00), Appendix E, Section VII, include three methods of evaluating the beneficial and adverse NED effects of project recreation: travel cost method (TCM), contingent valuation method (CVM), and unit day value (UDV) method.

The criteria for selecting the appropriate method are described in paragraph E-50b(4) and Figure E-10 of ER 1105-2-100 and in the attached document. If the UDV approach is used, the range of unit day value for FY 2002 studies is:

General Recreation	\$2.94	\$8.82
Specialized Recreation	\$11.95	\$34.92

If, when using the UDV method, evidence indicates a value outside the published range, use either TCM or CVM to evaluate recreation benefits.

The attached document provides a detailed description of the application of the UDV method. The tables provided in the attachment are constructed as guidance for planners in the selection of unit day values for particular recreation activities. Tables 1 and 2 illustrate a method of assigning a point rating to a particular activity. Point values are assigned based on measurement standards described for five criteria: activities, facilities, relative scarcity, ease of access, aesthetic factors.

Table 1 covers general recreation, involving relatively intensive development of access and facilities. The specialized recreation category of Table 2 includes less common activities such as big game hunting, wilderness pack trips, white water canoeing, and other activities generally characterized by more extensive, low density use.

Values provided for FY 2003 may be used to convert points to a UDV dollar amount if the point assignment method is used. The table was adjusted from Table K-3-1, Federal Register Vol. 44, No. 242, p.72962, December 4, 1979, using the CPI factor.

It is important to recognize that all specialized recreation activities require a regional model or a site-specific study, the results of which might not conform to the specialized values in the attached table. The only exceptions are those specific cases where it can be shown TCM or CVM is unreliable, infeasible, or unjustified.

Conversion of Points to Dollar Values

Point Values	General Recreation Values (1)	General Fishing and Hunting Values (1)	Specialized Fishing and Hunting Values (2)	Specialized Recreation Values other than Fishing and Hunting (2)
0	\$2.94	\$4.23	\$20.58	\$11.95
10	3.49	4.78	21.13	12.68
20	3.86	5.15	21.50	13.60
30	4.41	5.70	22.05	14.70
40	5.51	6.25	22.60	15.62
50	6.25	6.80	24.81	17.64
60	6.80	7.53	27.02	19.48
70	7.17	7.90	28.67	23.52
80	7.90	8.45	30.87	27.38
90	8.45	8.64	33.08	31.24
100	8.82	8.82	34.92	34.92

- (1) Points from Table 1 in attachment.
- (2) Points from Table 2 in attachment.

Attachment

Unit Day Value Method

1. Overview. The unit day value (UDV) method for estimating recreation benefits relies on expert or informed opinion and judgment to approximate the average willingness to pay of users of Federal or Federally assisted recreation resources. If it can be demonstrated that more reliable TCM or CVM estimates are either not feasible or not justified for the particular project under study, the UDV method may be used. By applying a carefully thought-out and adjusted unit day value to estimated use, an approximation is obtained that may be used as an estimate of project recreation benefits.

2. Implementation.

(a) When the UDV method is used for economic evaluations, planners will select a specific value from the range of values provided annually. Application of the selected value to estimated annual use over the project life, in the context of the with- and without-project framework of analysis, provides the estimate of recreation benefits.

(b) Two categories of outdoor recreation days, general and specialized, may be differentiated for evaluation purposes. "General" refers to a recreation day involving primarily those activities that are attractive to the majority of outdoor users and that generally require the development and maintenance of convenient access and adequate facilities. "Specialized" refers to a recreation day involving those activities for which opportunities in general are limited, intensity of use is low, and a high degree of skill, knowledge, and appreciation of the activity by the user may often be involved.

(c) Estimates of total recreation days of use for both categories, where applicable, will be developed. The general category comprises the great majority of all recreation activities associated with water projects, including swimming, picnicking, boating, and most warm water fishing. Activities less often associated with water projects, such as big game hunting and salmon fishing, are included in the specialized category. A separate range of values is provided annually for each category and for fishing and hunting to facilitate adoption of a point system in determining the applicable unit values for each individual project under consideration.

(d) When employing this method to determine recreation benefits, select appropriate values from the range of values provided. If evidence indicates a value outside the published range, use the TCM or CVM method.

(e) In every case planners are expected to explain the selection of any particular value. To assist in explaining a specific value a point rating method may be used. The method illustrated here contains five specific criteria and associated measurement standards designed to reflect quality, relative scarcity, ease of access, and esthetic features. Since the list of criteria and weights assigned may vary with the situation, public involvement should occur in the value determination process. Planners are also expected to make appropriate use of studies of preferences, user satisfaction, and willingness to pay for different characteristics. When these studies are used, particular efforts should be made to use estimates derived elsewhere from applications of the TCM and CVM techniques, to support the value selected.

(1) General recreation (Table 1). Activities in this category are those associated with relatively intensive development of access and facilities as compared to the specialized recreation category. Generally, progressively higher physical standards for each unit of carrying capacity is involved in selecting higher unit values, and these may be accompanied by larger related non-project costs.

(2) Specialized recreation (Table 2).

(a) This category includes those activities whose values are generally lowered, if not actually excluded, by the type of development that enhances activities in the general recreation category. Thus, extensive or low-density use and development constitutes the higher end of this range of values (e.g., big game hunting, and wilderness pack trips). Also included in the upper end of the range are relatively unique experiences such as inland and marine fishing for salmon and steelhead, white water boating and canoeing, and long-range boat cruises in areas of outstanding scenic value. Examples of activities to which values at the lower end of the range would be assigned include upland bird hunting and specialized nature photography.

(b) The unit day values to be used for both the general and specialized recreation categories should be further adjusted to reflect additional quality considerations expected to prevail at various project sites in various regions of the Nation, and weighted according to their importance to users. For example, a reservoir that is expected to carry a relatively heavy load of suspended silt or is expected to be used beyond optimum capacity would be less desirable, and therefore of lower unit value, than one that will have clear water and be less crowded.

(c) Hunting and fishing may be treated either as general recreation (Table 1) or specialized recreation (Table 2) depending upon whether it is associated with developed areas or back country areas, respectively. In either case, the recreation experience (criterion "a" in the tables) will be given points according to the additional consideration of the chances of success; the midpoint of the value range is associated with the region's average catch or bag. Other criteria may be modified if appropriately based on available evidence about the preferences and willingness to pay of hunters and fishermen for different recreation quality factors.

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(d) The degree to which alternative non-project opportunities are available to users is also considered in the assignment of values. Higher values should be assigned if the population to be served does not have existing water-oriented recreation opportunities. If water-oriented recreation opportunities are relatively abundant, as compared to other outdoor recreation opportunities, lower unit values should be assigned, even if a large number of visitations are expected at the proposed development.

(e) The choice of a unit day value must account for transfers to avoid double counting of benefits. The net value of a transfer of use from one site to another is the difference in unit day values for recreation at the two sites. If recreation activities at the two sites are comparable, travel cost savings are the only NED benefits associated with the transfer. Use at the site must therefore be separated into that proportion that is not transfers from other sites and that proportion that is transfers. The respective types of uses must then be assigned different daily values as indicated.

(f) Unit values selected are to be considered net of all associated costs of both the users and others in using or providing these resources and related services.

3. Estimating Use.

(a) Using the ranges of values requires the study of estimates of annual use foregone and expected at recreation sites. Use can be estimated by a use estimating equation or per capita use curve as discussed above, but when these means are available, the second step of the travel cost method should generally be used instead of UDV's to derive the benefit.

(b) The capacity method is an alternative method of estimating use, but it has severe limitations. The capacity procedure involves the estimation of annual recreation use under without project and with project conditions through the determination of resource or facility capacities (taking into consideration instantaneous rates of use, turnover rates, and weekly and seasonal patterns of use). Seasonal use patterns are dependent on climate and culture and probably account for the greatest variation in use estimates derived through this method. In general, annual use of outdoor recreation areas, particularly in rural locations and in areas with pronounced seasonal variation, is usually about 50 times the design load, which is the number of visitors to a recreation area or site on an average summer Sunday. In very inaccessible areas and in those known for more restricted seasonal use, the multiplier would be less; in urban settings or in areas with less pronounced seasonal use patterns, the multiplier would be greater. In any case, the actual estimation of use involves an analytical procedure using instantaneous capacities, daily turnover rates, and weekly and seasonal use patterns as specific data inputs.

(c) Because the capacity method does not involve the estimation of site-specific demand, its

use is valid only when it has been otherwise determined that sufficient demand exists in the market area of project alternatives to accommodate the calculated capacity. Its greatest potential is therefore in urban settings where sufficient demand obviously exists. Additionally, its use should be limited to small projects with (1) a facility orientation (as opposed to a resource attraction), and (2) restricted market areas that would tend to make the use of alternative use estimating procedures less useful or efficient.

4. Calculating Values. The estimates of annual use are combined with the selected unit day values to get an estimate of annual recreation benefits. The value assigned to each activity or category of activities is multiplied by the number of recreation days estimated for that activity. The products are then summed to obtain the estimate of the total value of an alternative. Recreation days to be gained and lost or foregone as a result of a particular alternative are listed and evaluated separately, not merely shown as net recreation days. Transfers of recreational users to or from existing sites in the region must be calculated, and the net regional gain or loss used in the final benefit estimated. Adequate information must appear in the discussion of the use estimation and valuation procedure or elsewhere in the report concerning the alternative being considered, so that the reader can derive a similar value for each activity.

Table 1: Guidelines for Assigning Points for General Recreation

Criteria	Judgment factors				
Recreation experience ¹ Total Points: 30 Point Value:	Two general activities ² 0-4	Several general activities 5-10	Several general activities: one high quality value activity ³ 11-16	Several general activities; more than one high quality high activity 17-13	Numerous high quality value activities; some general activities 24-30
Availability of opportunity ⁴ Total Points: 18 Point Value:	Several within 1 hr. travel time; a few within 30 min. travel time 0-3	Several within 1 hr. travel time; none within 30 min. travel time 4-6	One or two within 1 hr. travel time; none within 45 min. travel time 7-10	None within 1 hr. travel time 11-14	None within 2 hr. travel time 15-18
Carrying capacity ⁵ Total Points: 14 Point Value:	Minimum facility for development for public health and safety 0-2	Basic facility to conduct activity(ies) 3-5	Adequate facilities to conduct without deterioration of the resource or activity experience 6-8	Optimum facilities to conduct activity at site potential 9-11	Ultimate facilities to achieve intent of selected alternative 12-14

Table 1 (Continued)

Accessibility	Limited access by any means to site or within site	Fair access, poor quality roads to site; limited access within site	Fair access, fair road to site; fair access, good roads within site	Good access, good roads to site; fair access, good roads within site	Good access, high standard road to site; good access within site
Total Points: 18					
Point Value:	0-3	4-6	7-10	11-14	15-18
Environmental	Low esthetic factors ⁶ that significantly lower quality ⁷	Average esthetic quality; factors exist that lower quality to minor degree	Above average esthetic quality; any limiting factors can be reasonably rectified	High esthetic quality; no factors exist that lower quality	Outstanding esthetic quality; no factors exist that lower quality
Total Points: 20					
Point Value:	0-2	3-6	7-10	11-15	16-20

¹Value for water-oriented activities should be adjusted if significant seasonal water level changes occur.

²General activities include those that are common to the region and that are usually of normal quality. This includes picnicking, camping, hiking, riding, cycling, and fishing and hunting of normal quality.

³High quality value activities include those that are not common to the region and/or Nation, and that are usually of high quality.

⁴Likelihood of success at fishing and hunting.

⁵Value should be adjusted for overuse.

⁶Major esthetic qualities to be considered include geology and topography, water, and vegetation.

⁷Factors to be considered to lowering quality include air and water pollution, pests, poor climate, and unsightly adjacent areas.

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Table 2: Guidelines for Assigning Points for Special Recreation

Criteria	Judgment factors				
<p>Recreation experience¹</p> <p>Total Points: 30</p> <p>Point Value:</p>	<p>Heavy use or frequent crowding or other interference with use</p> <p>0-4</p>	<p>Moderate use, other users evident and likely to interfere with use</p> <p>5-10</p>	<p>Moderate use, some evidence of other users and occasional interference with use due to crowding</p> <p>11-16</p>	<p>Usually little evidence of other users, rarely if ever crowded</p> <p>17-13</p>	<p>Very low evidence of other users, never crowded</p> <p>24-30</p>
<p>Availability of opportunity²</p> <p>Total Points: 18</p> <p>Point Value:</p>	<p>Several within 1 hr. travel time; a few within 30 min. travel time</p> <p>0-3</p>	<p>Several within 1 hr. travel time; none within 30 min. travel time</p> <p>4-6</p>	<p>One or two within 1 hr. travel time; none within 45 min. travel time</p> <p>7-10</p>	<p>None within 1 hr. travel time</p> <p>11-14</p>	<p>None within 2 hr. travel time</p> <p>15-18</p>
<p>Carrying capacity³</p> <p>Total Points: 14</p> <p>Point Value:</p>	<p>Minimum facility for development for public health and safety</p> <p>0-2</p>	<p>Basic facility to conduct activity(ies)</p> <p>3-5</p>	<p>Adequate facilities to conduct without deterioration of the resource or activity experience</p> <p>6-8</p>	<p>Optimum facilities to conduct activity at site potential</p> <p>9-11</p>	<p>Ultimate facilities to achieve intent of selected alternative</p> <p>12-14</p>

Table 2 (Continued)

Accessibility	Limited access by any means to site or within site	Fair access, poor quality roads to site; limited access within site	Fair access, fair road to site; fair access, good roads within site	Good access, good roads to site; fair access, good roads within site	Good access, high standard road to site; good access within site
Total Points: 18					
Point Value:	0-3	4-6	7-10	11-14	15-18
Environmental	Low esthetic factors ⁴ that significantly lower quality ⁵	Average esthetic quality; factors exist that lower quality to minor degree	Above average esthetic quality; any limiting factors can be reasonably rectified	High esthetic quality; no factors exist that lower quality	Outstanding esthetic quality; no factors exist that lower quality
Total Points: 20					
Point Value:	0-2	3-6	7-10	11-15	16-20

¹Value for water-oriented activities should be adjusted if significant seasonal water level changes occur.

²Likelihood of success at fishing and hunting.

³Value should be adjusted for overuse.

⁴Major esthetic qualities to be considered include geology and topography, water, and vegetation.

⁵Factors to be considered to lowering quality include air and water pollution, pests, poor climate, and unsightly adjacent areas.

**INDEPENDENT
TECHNICAL REVIEW
CERTIFICATION**

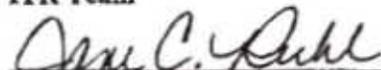
STATEMENT OF TECHNICAL REVIEW

West Baton Rouge Parish, Louisiana
Riverfront Development Project
Section 905(b) Analysis

COMPLETION OF INDEPENDENT TECHNICAL REVIEW

The District completed the 905(b) Analysis for the West Baton Rouge Parish, Louisiana Riverfront Development Project. Notice is hereby given that an independent technical review has been conducted that is appropriate to the level of risk and complexity inherent in the project. During the independent technical review, compliance with established policy principles and procedures, utilizing justified and valid assumptions, was verified. This included review of assumptions; methods, procedures, and materials used in analyses; alternatives evaluated; appropriateness of data used and level of data obtained; and reasonableness of the results, including whether the product meets the customer's needs consistent with law and existing Corps policy. The independent technical review was accomplished by an independent team from the Louisville District.

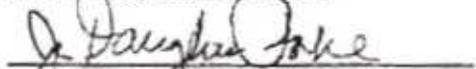
ITR Team



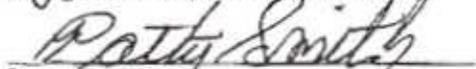
Jane C. Ruhl
Plan Formulation/ITR Team Leader, CELRL-PM-P



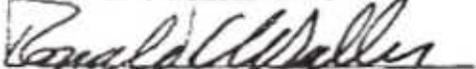
Mitchell P. Laird
Economics, CELRL-PM-P



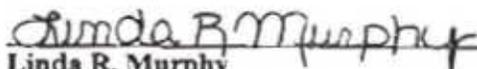
J. Douglas Pohl
Design Branch, CELRL-ED-D-A



Patty Smith
Real Estate, CELRL-RE-C



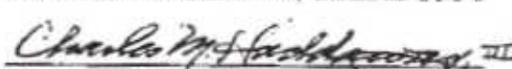
Ronald C. Waller
Operations, CELRL-OP-TO



Linda R. Murphy
Project Management, CELRL-PM-C



Michael J. Saffran
Environmental/HTRW, CELRL-PM-P



Charles M. Haddaway, III
Construction, CELRL-CD-M



Martin L. Lockard
Cost Engineering, CELRL-ED-M-C

	OFFICE/PERSON	OFFICE		SECTION		
ITEM	GENERATING	ADDRESSING	PAGE	PARA.		
NO.	COMMENT	COMMENTS	NO.	NO.	COMMENT	RESOLUTION
	Planning Division					
1	CELRL-PM-P-F/Mike Saffran (502) 315-6882		2	1	The paragraph following the quoted authority attempts to define one of the purposes, restoration, for the authorized multi-purpose project. Recommend either deleting paragraph, or defining each element of "...waterfront and riverine preservation, restoration and enhancement modifications."	The paragraph will be expanded to indicate that while this phase of the study concentrates on riverfront development features to reestablish the human connection to the river, the opportunities for riverine and ecosystem restoration will be acknowledged for further exploration in the feasibility study.
2	Mike Saffran		2	2	Stated study purpose seems ambiguous and/or inconsistent, "...riverfront development in West Baton Rouge Parish." Actual project considered appears to be limited to 1,600 feet of shore line in Port Allen. Based on information provided, there appears to be opportunity (potential benefits from) for and authorization to evaluate more extensive waterfront and riverine preservation, restoration and enhancement modifications than were considered in report. Also, study/analysis does not address, even qualitatively, opportunities for environmental benefits of preserving, restoring or enhancing waterfront and riverine areas in subject parish. Recommend limiting text under study purpose section to two key points. 1) To determine (and provide adequate documentation to support) whether Federal participation in project is appropriate and justifiable; and 2) To determine if there is a viable sponsor advocating the project and capable of fulfilling cost share and other Federal participation requirements.	This paragraph will be rewritten to include a discussion of opportunities for environmental benefits.
3	Mike Saffran		3 & 19	3	Per comment 2 above, actual location of project is not clearly depicted. Recommend actual area studied be delineated in the figure on page 19. Also recommend last 2 sentences of paragraph be deleted or moved to plan formulation section.	Concur. A location map will be included in the final version of the 905(b) study.
4	Mike Saffran		3 to 6	4	First 2 paragraphs of section describe existing conditions, not a discussion of previous studies. Recommend they be moved to Section 5.a.(1). Paragraphs 4, 5 and 6 in the section all attempt to tie elements of proposed project to results of previous studies. Since plan formulation has yet to be discussed, this creates confusion. Recommend each paragraph end with relevant conclusion of the prior study and that relevant tie-ins to proposed project be discussed in subsequent plan formulation section. Area of most confusion is the extent of developments and footprint of the TEA-21 project relative to the footprint for the recommended alternative. Recommend Plan Formulation section provide clear description of the tie-in or relationship of TEA-21 project to the recommended alternative.	The first two paragraphs will be moved to the plan formulation section.
5	Mike Saffran		7 & 8	MR 5.a. (1)(e)	Last paragraph, conclusion that flora and fauna in project area are inconsequential for riverfront design is not supported, and could be point of contention with resource agencies. For example, loss of wetlands is a problem. Potential for wetland preservation and ecosystem restoration and enhancement in batture appear to be substantial opportunities to accrue both economic and environmental benefits. Granted, if 1600 linear feet of riverfront is the limit of the study, opportunities for significant ecosystem restoration and enhancement in the historic Mississippi River floodplain may be inconsequential. On the other hand, if riverfront in West Baton Rouge Parish is study limit, there is much greater opportunity for substantial benefits associated with waterfront and riverine restoration and enhancement.	The paragraph will be revised to include mention of the other opportunities that may exist and that they will be explored more fully in the feasibility study.

6	Mike Saffran		MR 5.a. (1)(g) and Add. II.D.	MR pp. 8-9 and Add. Pp. 15-16	<p>Level of consideration/discussion of HTRW does not meet requirements specified in ER 1165-2-132. Report does not depict the locations of any of the suspected contaminated sites listed relative to the study area, does not address potential contaminants of concern from the suspect sites, and does not explain techniques used to determine which listed sites may pose HTRW issues that could impede project development. Recommendations - 1) Describe the specific procedures (available document and database search and review, interviews with persons knowledgeable of site use history and site reconnaissance by properly qualified environmental professional) used to assess potential for HTRW issues. 2) Clearly depict study area bounds on a map or figure; 3) Clearly depict distance criteria (boundaries of search) used in environmental database search on that map; 4) Search and review District aerial photos (probably in survey and mapping group of ED) of area within and adjacent to study area for as far back in time as available; 5) On map recommended in first recommendation, plot and label potential</p> <p>HTRW sites identified; 6) Provide concise summary text of assessment results of whether or not HTRW issues are likely to occur, especially for listed sites located within or in close proximity upgradient of study area boundaries, and if known, magnitude of potential impedance(s) to project development; and 7) Provide recommendations for consideration of HTRW in next project phase.</p>	The level of detail requested seems excessive for a 905(b) study. The main report contains an extensive data search and location map. This will be referenced in the 905(b).
6	Mike Saffran		5.a.(3)	10 & 11	<p>Problems and Opportunities section focuses on recreation, without making connection with project purpose - waterfront and riverine preservation, restoration and enhancement. Perhaps the only significant opportunities are for recreational development; however, there are numerous ecosystem restoration projects being developed along Mississippi River and its tributaries which combine economic and environmental benefits. Recommend considering broader array of potential opportunities.</p>	The paragraphs will be revised so that other development and restoration opportunities can be considered.
7	Mike Saffran		5.b.	11 & 12	<p>Recommend explanation of how project goes from broad perspective (waterfront and riverine preservation, restoration and enhancement ...riverfront development in West Baton Rouge Parish) to narrowly focused project (1,600-foot strip + bike path) in Port Allen. Recommend term "final design for" in last sentence of fourth paragraph be replaced with "schematic depiction of"</p>	The project actually includes a bike path extending several miles north to the Highway 190 Bridge and south to the Brusly/Addis area in addition to the core development at Port Allen. The plan at this stage is heavily influenced by the desires of the local sponsor, in addition to the fact that the ecosystem restoration opportunities in the river batture are limited. However, the focus of the project does need to be expanded to include riverine restoration and enhancement. Therefore, the paragraph will be revised to explain that the somewhat narrow focus in the reconnaissance phase will be expanded in the feasibility study.
8	Mike Saffran		11 & 12	17 & 18	<p>Two primary objectives of the 905(b) Analysis determine Federal Interest and identify viable local sponsor. No local sponsor is identified.</p>	Concur. The City of Port Allen will be the local sponsor and will be contacted for a letter.
9	LRL-PM-P-E / Mitch Laird		905(B), pg. 15	5.c.(5), Benefits	<p>A brief description should be given of the way the benefit estimate was made. The Justification Report should be referenced for a more detailed account of this.</p>	Concur. This will be provided.
10	Mitch Laird		905(B), pg. 15	5.c.(5), Benefits	<p>The benefit/cost ratio should be expressed with only one decimal place unless it is below 1.1 to 1. It would be good to also provide net benefits in this section.</p>	Concur. These changes will be made.

11	Mitch Laird		905(B), pg. 15	6, Federal Interest	The 2nd sentence states: "The NED benefits are from recreational opportunities and spending." However, para. E-50.b.(1).(a), page E-183, of ER 1105-2-100 states that recreation benefits are measured in terms of willingness to pay. The connotation and meaning of "spending" is different than that of "willingness to pay". The word "spending" should be replaced with "willingness to pay".	Concur. The wording will be revised to say "willingness to pay."
12	Mitch Laird		Justification Report., pg. 80	B.1.a, General Recreation Usage, para. 1.	The top ten most popular activities of the Louisiana SCORP are referred to, but only nine are listed.	The tenth activity will be listed in the revised report.
13	Mitch Laird		Justification Report., pg. 80	B.1.a, General Recreation Usage, para. 3.	The last sentence states the five events would result in an additional 80,000 annual visitors. Existing visitation for the three currently held events is 30,000. Therefore, the additional annual visitation is 50,000 and total annual visitation is 80,000.	Concur. The paragraph will be revised to show the correct number for increased visitation.
14	Mitch Laird		Justification Report., pg. 81	Table 3	Table 3 is entitled "Projected Usage by Activity". This table actually presents maximum annual capacity for each activity. It is a liberal assumption that these equal annual visitor days. It is unlikely that there would be separate visits for each activity and that maximum capacity would be met within only four years after project completion. If this is indeed expected to be the case, then the UDV points for carrying capacity should be adjusted downward for overuse.	The approach used is consistent with IWR Report 86-R-4.
15	Mitch Laird		Justification Report., pg. 81	B.1.b, General Recreation Usage Valuation, para. 3.	FY03 Unit Day Values were used. These should be updated with FY04 values published in EGM 04-03.	Concur. The FY 04 values will be used.
16	Mitch Laird		Justification Report., pg. 81	B.1.b, General Recreation Usage Valuation, para. 3.	In the 4th sentence, "\$648" apparently should be "48".	Concur. \$648 will be replaced with "48."
17	Mitch Laird		Justification Report., pg. 82	B.1.b, General Recreation Usage Valuation, Criteria Points table.	Ten points for the Environmental criteria is the highest of the point range for "Above average esthetic quality; any limiting factors can be reasonably rectified" guideline of Table 1 in EGM 04-03. However, footnote 7 states "Factors to be considered to lowering quality include air and water pollution, pests, poor climate, and unsightly adjacent areas." The 905(B) report states the Barry Moore Landfill is adjacent to the project area. This facility may produce smells or be unsightly for visitors to the project. Mosquitoes or other pests, hot and humid summers, and other pollution are additional potential factors that would justify lowering the points for this category. The Environmental point assignment should be reconsidered.	While 10 points in the highest for the "above average esthetic quality" category, it is only midway the total range of 0 to 20 points. Due to the virtual lack of similar recreation features, view of the Mississippi River, view of Baton Rouge CBD, etc., we feel that 10 points is reasonable. The Barry Moore Landfill is not located near the Wharf Structure, nature trails, playing fields, etc.
18	Mitch Laird		Justification Report., pg. 82 & 83	B.1.c and Table 4, General Recreation Benefits.	What are presented as benefits are actually estimates of the value of future recreation with the proposed project. An estimate of the without project recreation resource value has not been made in order to compare this to the with-project recreation value to make a benefit estimate. Visitation of the new promenade should be included in the without project condition.	Concur. The without visitation for the promenade will be estimated.
19	Mitch Laird		Justification Report., pg. 84	Para. C, Project Cost	All of the construction on the batture will be susceptible to periodic flooding. Was the frequency of flooding along with clean-up and repair due to flooding included in the O&M cost estimate? If so, the report should state this. One related cost that should not be overlooked is turf maintenance for the proposed soccer fields. This usually needs to be of good quality and very well maintained.	The O&M estimate will be reviewed to ensure that high water cleanup costs are adequately accounted for.

20	Mitch Laird		Justification Report., pg. 89	Table 8	The last column on the right is labeled "Total Benefits" and should be "Total Costs".	Concur. The table will be revised.
21	Mitch Laird		Justification Report., pg. 89	Table 8	Interest during construction is not calculated correctly. The \$434,719 to be expended in 2005 should have a period of 3.5 years, assuming a mid-year expenditure. This and the costs for the other three years of construction have apparently had IDC calculated for a mid-year expenditure but for only one year each, effectively meaning that all costs have IDC calculated for only a half year period.	The interest during construction calculations will be revised to consider the project as a single construction investment rather than separate construction features.
22	Mitch Laird		Justification Report., pg. 89	Table 8	Because the base year of the project is 2009, project costs have only been evaluated for a 46-year period of analysis instead of 50 years.	The analysis will be revised to show 2009 as the base year.
23	Mitch Laird		Justification Report., pg. 89	Table 8	Costs prior to the base should be brought forward to the base year by using negative periods in the present worth calculation. This was not done.	Costs prior to 2009 will be brought forward using negative periods in the present worth calculation.
24	Mitch Laird		Justification Report., pg. 92	Table 10	Monetary units should be shown for Table 10.	Monetary units will be shown for Table 10.
25	CELRL-PM-P-F/Jane Ruhl (502) 315-6862		905(B), pg. 2	Study Authority	The study authority addresses the entire West Baton Rouge Parish and riverine restoration. This 905(b) addresses only a part of what is authorized. The report should highlight the fact that only a portion of the parish and only part of the project authority is addressed in this 905(b) analysis. Perhaps this could be done in the Study Purpose and Recommendations section. This would leave the door open for additional studies using this same authority.	The 905(b) Analysis will be revised to show that the other portions of the study authority will be more fully considered in subsequent study phases.
26	Jane Ruhl		905(b), p. 16	Feasibility Phase Milestones	Because recreation and regional development currently receive low budget priority, the report should not recommend proceeding into feasibility. Additionally, it seems clear from the authorizing language and from communications with Congressional staff that the intent of the bill language was to proceed directly into preconstruction engineering and design. Therefore, the report should not identify feasibility phase milestones.	This decision is not within the purview of MVN. The MVD is requiring that this study proceed to the feasibility phase.
27	Jane Ruhl		905(b), p. 17	Feasibility Phase Cost Estimate	Because recreation and regional development currently receive low budget priority, the report should not recommend proceeding into feasibility. Additionally, it seems clear from the authorizing language and from communications with Congressional staff, that the intent of the bill language was to proceed directly into preconstruction engineering and design. Therefore, the report should not identify the cost of a feasibility study. Additionally, the cost of \$3,000,000 for a feasibility study seems extremely high. Using a rule of thumb that PED costs should be 8 to 15% of the cost of construction, and feasibility cost should range from 25 to 33% of PED, the reasonable range for a feasibility study cost would be \$400,000 to \$1,000,000.	The current feasibility study cost estimate is \$3,000,000. While we concur that PED costs should be in the 8 to 15% range, feasibility study costs of \$400,000 to \$1,000,000 for a project such as this seem low unless some elements are contained in this PED budget.
28	Jane Ruhl		905(b), p. 16	Summary of Feasibility Study Assumptions	Again, the recommendation should not be to proceed into feasibility, therefore, this section is not needed.	Because of a MVD directive, the section must remain.
29	Jane Ruhl		905(b), p. 17	Recommendations	Again, this study should not recommend proceeding into feasibility. It is a low budget priority, and therefore will not be budgetable. Additionally, this study has already examined various alternatives, and it does not appear as though there would be significant advantage in conducting a feasibility. Recommend changing the "Recommendations" section to read: "Based on the results of this 905(b) analysis, there appears to be a potentially viable project for improvements along the riverfront in West Baton Rouge, Louisiana. Additional studies would be required to confirm the economics of individual project components. There is a strong local sponsor that would support implementation of such a project. However, it is recognized that recreation and regional economic development currently receive low budget priority. Therefore, I recommend no follow-on studies at this time."	MVD has directed MVN to proceed to feasibility.

30	Jane Ruhl				General comment - I understand that there is significant interest in this study and appropriations have been made to further the project. Not recommending feasibility would seem to run counter to the momentum that the project has developed. However, the recon study has already looked at various alternatives, and more examination of alternatives will not really achieve any optimization that cannot be achieved during development of the design. I would focus future efforts into producing a decision document that can support a PCA, completing such items as NEPA compliance and an MCACES cost estimate. I would also recommend addressing the remainder of the parish and the "riverine restoration" named in the authorization in the recommendations paragraph so as to leave the door open for future 905(b) studies related to those areas.	Concur with the need to address the remainder of the parish and the "riverine restoration" named in the authorization. However, we must proceed to feasibility at the urging of MVD.
31	Jane Ruhl		905(b), p. 18	Views of Other Resource Agencies	I would recommend the phrase "as the master plan is further developed" rather than "as the proposed project is further developed." This leaves the door open for future appropriations to be used to further develop the master plan (which is not the same as conducting a feasibility study).	Concur. The 905(b) will be revised to adapt the phrase "as the master plan is further developed."
	Engineering Division					
32	CELR-ED-D/Doug Pohl, RA (502) 315-6233				Consideration must be made for worst case impact loads on wharf type structures. Consult with the barge industry to determine whether a glancing blow, direct hit or other will represent an actual possible scenario. This will give form the edge of the wharf and must be dealt with early on.	Shipping interests will be contacted relative to worst case impact loads.
33	Doug Pohl, RA				Consider how silt will affect the usable areas and how removal of silt will take place.	O&M costs will be reviewed to ensure that they include allowance for silt removal.
34	Doug Pohl, RA				Involve the sewer utility in the early planning phases. Because of the location, there may challenges that will shape where toilets can be located.	Cost estimates will be reviewed to ensure that adequate allowance for utilities is included.
35	Doug Pohl, RA				Consider how emergency vehicles will access the site. Will fire trucks be required to access the site? And then, how will other vehicles be restricted from the site?	Concur. Ingress and egress will be considered in more detail in the feasibility phase.
36	Doug Pohl, RA				Strongly urge designers to consult with Accessibility Groups from the area. Typically, accessible parking is provided at a reasonable distance from the site. Planning may need to consider a drop off area for the handicapped of other means to reduce the distance from parking.	Concur. Existing plans will be reviewed/revised to show adequate parking. Provisions for the handicapped will be refined in the feasibility phase.
37	CELR-ED-M-C/Martin Lockard (502) 315-6382		Justification Report p. 87		Overall, the cost estimate is not detailed enough to offer substantive comments. However, the costs in Table 7 for item number 12, Bicycle Paths, appear to be high. Does this unit cost include recreational amenities such as benches and/or lighting? This should be clarified, if it does.	Costs for the wharf structure are based on cost per square foot estimates for recently designed bridge structures by GEC. Costs for benches, trails, trash receptacles, etc. were based on recently completed recreation master plans by GEC's subcontractor, Perez. Bicycle path costs are based on recently designed and/or constructed bicycle paths in a similar environment. The report will be revised to more fully explain the origins of the cost estimates.
	Real Estate Division					
38	CELR-RE/Patty Smith (502) 315-7017				The report prepared for this project starts by reading "Easements will need to be obtained..." Fee acquisition is required for recreation projects. Does the cost estimate include an estimate for real estate acquisition?	The report will be revised to include the cost of easements/fee acquisition based on recent similar experiences by MVN.

39	Patty Smith				Recommend using the following paragraph for the 905(b) report: "The Non-Federal Sponsor will be required to acquire all lands, easements, and rights-of-way required for the construction, operation, and maintenance of the project. The Corps Real Estate Division will prepare a Real Estate Plan (REP) during the next phase of study. The REP will address land classification types, types of estates required, gross estimate of acreage and land value, facility and utility relocations, and Public Law 91-646 requirements. Real Estate Division has not performed any reconnaissance level investigations for this report. The land value estimate of \$_____ is not based on appraisal principals. Estimated costs for real estate will need to be refined during the next study phase. It is expected that the non-federal sponsor will seek credit for the land value of the sponsor-owned property that will be required for the project. The estimate presented here should not be used by the non-federal sponsor to determine future funding requirements for the construction phase."	Concur. The paragraph will be used.
	Construction Division					
40	CELRL-CD-M/Charlie Haddaway, (502) 772-3492 ex 7481		Page ES-I		EXECUTIVE SUMMARY, paragraph A, PROJECT AUTHORITY AND PURPOSE, speaks of "riverine preservation," but the report fails to address anything about preserving the bank of the Mississippi River. Something should be added to cover this subject because it is mentioned in the authority.	This section will be revised to show that while congress authorized riverine preservation, this report focused on riverfront development as an early test of the economic viability of the concept and in order to identify a local sponsor. The other objectives of the authority will be more fully explored in the feasibility phase.
41	Charlie Haddaway		Page 15		EXISTING CONDITIONS, par. II.D. HAZARDOUS, TOXIC, AND RADIOACTIVE WASTE (HTRW) SITES, the reader must assume that the industrial sites listed are all inside the existing levee, but the reader should not have to assume. Clearly state the location (inside or outside) of each site's relationship with the levee.	The main report contains a map showing the location of HTRW sites. The 905(b) will be revised to reference that map.
42	Charlie Haddaway		Page 21		WATERWAYS, par. II.G.1. The Mississippi River, last sub-paragraph, should also address the frequency of flooding on the batture and what months of the year the flooding can be expected.	Concur. The report will be revised to describe frequency of flooding.
43	Charlie Haddaway		Page 44		ADDITIONAL SERVICE INDUSTRIES, par. III.I.1. Visitor Center/Rest Area, needs to clearly address what is wrong with the existing "West Baton Ridge Visitor Information Center" located at I-10 and LA 415. Internet site http://www.portallen.org/admin/profile/interest.html speaks about this existing visitor center.	A visitors center is no longer a feature of the new riverfront development. The report will be revised accordingly.
44	Charlie Haddaway		Page 56		COMPREHENSIVE PLAN FORMULATION, par. V.C. ALTERNATIVE PLANS, Schemes A & B show what appears to be an old boat with a rear paddle (Figures 11 – 13). I'm curious; does West Baton Rouge own such a boat? If yes, it should be shown in the Comprehensive Plan (Figure 18).	West Baton Rouge does not own a paddle boat. The paddle boat is shown to be indicative of the type of excursion boats that may stop at the development in the future.
45	Charlie Haddaway		Page 59		Figure 12, Scheme A Sections, the section titles are reversed. The top title belongs on the bottom section; and the bottom title belongs on the top section.	Concur. The corrections will be made.
46	Charlie Haddaway		Page 60		COMPREHENSIVE PLAN FORMULATION, par. V.C.2. Scheme B, last sentence in first sub-paragraph, add "and beyond" after the words: the levee.	Concur. The wording of this paragraph will be changed to include the words "and beyond."
47	Charlie Haddaway		Page 63		COMPREHENSIVE PLAN FORMULATION, par. V.C.2. Scheme B, the Corps Project elements include "Parking." What parking? Are we referring to parking along the new Riverfront Drive? This is not clear.	For this scheme the parking would have been under the buildings.
48	Charlie Haddaway		Page 67		COMPREHENSIVE PLAN FORMULATION, par. V.C.4. Scheme D, last sub-paragraph, the Corps Project elements need to include "parking." It appears that parking is a necessity if you hope to reach the usage figures shown in Section VIII.	In this scheme the parking is street side.

49	Charlie Haddaway		Page 71		Comprehensive Plan (Figure 18) lacks the new parking spaces along the foot of the levee which were in the Corps Project (Figure 17)? These parking spaces are still needed with the Comprehensive Plan. Especially if the Government is paying for it! After all, "the Corps Project is defined as the riverside improvements as well as landside improvements that promote public access to the riverside."	Concur. The scheme will be revised to show parking areas.
50	Charlie Haddaway		Page 73		Figure 19, Section of Corps Project at Court Street, we need to be realistic with the artist rendition of this section. It is probably impossible to grow trees to the size of those illustrated on the wharf.	Concur. The trees will be shown at the appropriate size in the final report.
51	Charlie Haddaway				General Comment. There should be a suggested solution to overcome the Bicycle/Multipurpose Paths "access to the Port of Greater Baton Rouge" that "is severely limited because of security concerns."	Concur. The proposed path avoids the Port properties by utilizing existing road routes adjacent to the Port. This will be made more clear in the final report.
52	CELRL-PM-C/Linda Murphy (502) 315-6784		905(B), pg. 1	3	Reference is made to the levee promenade and river overlook project at various places in both documents and indicates that the Corps was involved in the Justification Report. This should be stated in the 905(b) report with some reference to the original authority.	Concur. The appropriate references will be made in the 905(b).
53	CELRL-PM-C/Linda Murphy (502) 315-6784		905(B) and Justification Report		Reference is made to conducting a feasibility study. This type of traditional study does not lend itself to waterfront projects because you are not looking for an NED type plan. The authorization in the next paragraph gives you authority to move right into PED. Suggest all references to a feasibility study be dropped and indicate that the next step would be to enter into a cost-shared PED agreement in which you would prepare a "decision document" to support an authorization and PCA execution. The decision document would need to describe the scope of the project, a MCACES estimate, NEPA compliance, economics, real estate report.	MVD has directed MVN to proceed to feasibility rather than PED.
54	CELRL-PM-C/Linda Murphy (502) 315-6784		905(B), pg. 3 and 10	4. Para. 2	Reference is made to the original levee project that the Corps built. Future authorization for access and recreation may want to refer back to the original authorization for the levee. On a project in southern Indiana we were allowed to separate access and recreation and can budget for the access features. We still have to cost share them 50/50 (similar to recreation) only because the project received a congressionally added authorization prior to our report that identified a 50/50 cost share. You may want to check with you Division and HQ about this and possibly some of the work that can be identified as access could be cost-shared 65/35 and you may be able to budget for this in the future.	Concur. This may be beneficial to MVN in the future.
55	CELRL-PM-C/Linda Murphy (502) 315-6784		905(B), pg. 14	6	Navigation Impacts - next phase definitely needs full involvement of your Operations Division early before any design.	Concur. The local pilots' association will be contacted.
56	CELRL-PM-C/Linda Murphy (502) 315-6784		905(B), pg. 15/ Justification Report., pg. 87	item (4) /Table 7	It doesn't appear that the cost estimate has much detail. Understand a 20% contingency is typically used for a reconnaissance level report but considering the uncertainty of navigation impacts and geotechnical information you may want to consider using a 25% contingency. Also, for this type of report you should be at least providing a narrative on the cost basis of the pricing used, as well as the E&D and S&A. Total project costs also need to include real estate costs and utilities.	Concur. A 25 percent contingency will be used.
57	CELRL-PM-C/Linda Murphy (502) 315-6784		Justification Report, pg. 20 and pg.68	3	Adequate parking areas need to be included in the Corps plan in the next phase. We have received many public comments on our projects regarding providing enough parking.	Concur. Provision for adequate parking will be made and included in the concept and costs for the final report.
58	CELRL-PM-C/Linda Murphy (502) 315-6784		Justification Report, pg. 22	H	The existing levee improvement program and the proposed new work seems like pieces of a larger project. I could not determine from both reports the Corps involvement in the part that has already been completed, whether the Corps cost-shared in the construction or not. Has any thought been given to combining these (and maybe other elements) into a larger project and the sponsor could then seek credit for what they have invested already?	MVN is credited for existing developments in its draft WRDA language. The 905(b) will be revised to make more clear the Corps role in existing improvements.

59	CELRL-PM-C/Linda Murphy (502) 315-6784		Justification Report, pg. 53, 87, 95		Pg. 54 indicates that the potential sponsor does not own the area, there are no real estate costs indicated in Table 7 on page 87, and write-up on page 95 indicates work that needs to be done to obtain real estate costs. An attempt needs to be made for this report to quantify the real estate cost since it is part of total project costs.	Concur. Estimates for real estate costs will be made and included in the final report.
60	CELRL-PM-C/Linda Murphy (502) 315-6784		Justification Report, pg. 56	4	Last sentence that starts with "Figure 11", I believe this should be Figure 12.	Concur. The correction will be made.
61	CELRL-PM-C/Linda Murphy (502) 315-6784		Justification Report, pg. 63, 64, 65, 66		Figures 15 and 16 come before pages 63 and 65. Correct order would be Figure 15 after page 63 and Figure 16 after page 65.	The extra copies of the report made for Louisville's review for some reason had these pages out of order. They are correct in the correct version of the report as it stands.
62	CELRL-PM-C/Linda Murphy (502) 315-6784		Justification Report, pg. 94 and 95		These pages are out of order (reversed) in the report I have.	The extra copies of the report made for Louisville's review for some reason had these pages out of order. They are correct in the correct version of the report as it stands.

**PROJECT
MANAGEMENT PLAN
(includes clean FCSA)**



US Army Corps
of Engineers
New Orleans District

West Baton Rouge Riverfront Development Study

Draft

**Project Management Plan
August 2004**

**West Baton Rouge Riverfront Development
Project Management Plan**

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**FEASIBILITY COST SHARING AGREEMENT
BETWEEN THE DEPARTMENT OF THE ARMY
AND
CITY OF PORT ALLEN, LOUISIANA
FOR THE WEST BATON ROUGE RIVERFRONT DEVELOPMENT STUDY**

THIS AGREEMENT is entered into this _____ day, of _____, 20 __, by and between the Department of the Army (hereinafter the "Government"), represented by the District Engineer executing this Agreement, and the Mayor of the City of Port Allen, Louisiana (hereinafter the "Sponsor"),

WITNESSETH, that

WHEREAS, the Congress has authorized the United States Army Corps of Engineers to conduct general investigation studies pursuant to the authority provided by Section 517 of the Water Resource Development Act of 1999; and

WHEREAS, the U.S. Army Corps of Engineers has conducted a reconnaissance study of Riverfront Development in West Baton Rouge Parish, Louisiana along the Mississippi River pursuant to this authority, and has determined that further study in the nature of a "Feasibility Phase Study" (hereinafter the "Study") is required to fulfill the intent of the study authority and to assess the extent of the Federal interest in participating in a solution to the identified problem; and

WHEREAS, Section 105 of the Water Resources Development Act of 1986 (Public Law 99-662, as amended) specifies the cost sharing requirements applicable to the Study;

WHEREAS, the Sponsor has the authority and capability to furnish the cooperation hereinafter set forth and is willing to participate in study cost sharing and financing in accordance with the terms of this Agreement; and

WHEREAS, the Sponsor and the Government understand that entering into this Agreement in no way obligates either party to implement a project and that whether the Government supports a project authorization and budgets it for implementation depends upon, among other things, the outcome of the Study and whether the proposed solution is consistent with the *Economic and Environmental Principles and Guidelines for Water and Related Land Resources Implementation Studies* and with the budget priorities of the Administration;

NOW THEREFORE, the parties agree as follows:

ARTICLE I - DEFINITIONS

For the purposes of this Agreement:

A. The term "Study Costs" shall mean all disbursements by the Government pursuant to this Agreement, from Federal appropriations or from funds made available to the Government by the Sponsor, and all negotiated costs of work performed by the Sponsor pursuant to this Agreement. Study Costs shall include, but not be limited to: labor charges; direct costs; overhead expenses; supervision and administration costs; the costs of participation in Study Management and Coordination in accordance with Article IV of this Agreement; the costs of contracts with third

parties, including termination or suspension charges; and any termination or suspension costs (ordinarily defined as those costs necessary to terminate ongoing contracts or obligations and to properly safeguard the work already accomplished) associated with this Agreement.

B. The term "estimated Study Costs" shall mean the estimated cost of performing the Study as of the effective date of this Agreement, as specified in Article III.A. of this Agreement.

C. The term "excess Study Costs" shall mean Study Costs that exceed the estimated Study Costs and that do not result from mutual agreement of the parties, a change in Federal law that increases the cost of the Study, or a change in the scope of the Study requested by the Sponsor.

D. The term "study period" shall mean the time period for conducting the Study, commencing with the release to the U.S. Army Corps of Engineers New Orleans District of initial Federal feasibility funds following the execution of this Agreement and ending with the Chief of Engineers' acceptance of the study.

E. The term "PMP" shall mean the Project Management Plan, which is attached to this Agreement and which shall not be considered binding on either party and is subject to change by the Government, in consultation with the Sponsor.

F. The term "negotiated costs" shall mean the costs of in-kind services to be provided by the Sponsor in accordance with the PMP.

G. The term "fiscal year" shall mean one fiscal year of the Government. The Government fiscal year begins on October 1 and ends on September 30.

ARTICLE II - OBLIGATIONS OF PARTIES

A. The Government, using funds and in-kind services provided by the Sponsor and funds appropriated by the Congress of the United States, shall expeditiously prosecute and complete the Study, in accordance with the provisions of this Agreement and Federal laws, regulations, and policies.

B. In accordance with this Article and Article III.A., III.B. and III.C. of this Agreement, the Sponsor shall contribute cash and in-kind services equal to fifty (50) percent of Study Costs other than excess Study Costs. The Sponsor may, consistent with applicable law and regulations, contribute up to 50 percent of Study Costs through the provision of in-kind services. The in-kind services to be provided by the Sponsor, the estimated negotiated costs for those services, and the estimated schedule under which those services are to be provided are specified in the PMP. Negotiated costs shall be subject to an audit by the Government to determine reasonableness, allocability, and allowability.

C. The Sponsor shall pay a fifty (50) percent share of excess Study Costs in accordance with Article III.D. of this Agreement.

D. The Sponsor understands that the schedule of work may require the Sponsor to provide cash or in-kind services at a rate that may result in the Sponsor temporarily diverging from the obligations concerning cash and in-kind services specified in paragraph B. of this Article. Such temporary divergences shall be identified in the quarterly reports provided for in Article III.A. of this Agreement and shall not alter the obligations concerning costs and services specified in paragraph B. of this Article or the obligations concerning payment specified in Article III of this Agreement.

E. If, upon the award of any contract or the performance of any in-house work for the Study by the Government or the Sponsor, cumulative financial obligations of the Government and the Sponsor would result in excess Study Costs, the Government and the Sponsor agree to defer award of that and all subsequent contracts, and performance of that and all subsequent in-house work, for the Study until the Government and the Sponsor agree to proceed. Should the Government and the Sponsor require time to arrive at a decision, the Agreement will be suspended in accordance with Article X., for a period of not to exceed six months. In the event the Government and the Sponsor have not reached an agreement to proceed by the end of their 6-month period, the Agreement may be subject to termination in accordance with Article X.

F. No Federal funds may be used to meet the Sponsor's share of Study Costs unless the Federal granting agency verifies in writing that the expenditure of such funds is expressly authorized by statute.

G. The award and management of any contract with a third party in furtherance of this Agreement which obligates Federal appropriations shall be exclusively within the control of the Government. The award and management of any contract by the Sponsor with a third party in furtherance of this Agreement which obligates funds of the Sponsor and does not obligate Federal appropriations shall be exclusively within the control of the Sponsor, but shall be subject to applicable Federal laws and regulations.

ARTICLE III - METHOD OF PAYMENT

A. The Government shall maintain current records of contributions provided by the parties, current projections of Study Costs, current projections of each party's share of Study Costs, and current projections of the amount of Study Costs that will result in excess Study Costs. At least quarterly, the Government shall provide the Sponsor a report setting forth this information. As of the effective date of this Agreement, estimated Study Costs are \$775,000 and the Sponsor's share of estimated Study Costs is \$387,500. In order to meet the Sponsor's cash payment requirements for its share of estimated Study Costs, the Sponsor must provide a cash contribution currently estimated to be \$387,500. The dollar amounts set forth in this Article are based upon the Government's best estimates, which reflect the scope of the study described in the PMP, projected costs, price-level changes, and anticipated inflation. Such cost estimates are subject to adjustment by the Government and are not to be construed as the total financial responsibilities of the Government and the Sponsor.

B. The Sponsor shall provide its cash contribution required under Article II.B. of this Agreement in accordance with the following provisions:

1. For purposes of budget planning, the Government shall notify the Sponsor by August 31 of each year of the estimated funds that will be required from the Sponsor to meet the Sponsor's share of Study Costs for the upcoming fiscal year.

2. No later than 60 calendar days prior to the scheduled date for the Government's issuance of the solicitation for the first contract for the Study or for the Government's anticipated first significant in-house expenditure for the Study, the Government shall notify the Sponsor in writing of the funds the Government determines to be required from the Sponsor to meet its required share of Study Costs for the first fiscal year of the Study. No later than 30 calendar days thereafter, the Sponsor shall provide the Government the full amount of the required funds by delivering a check payable to "FAO, B2, USACE MVN" to the District Engineer.

3. For the second and subsequent fiscal years of the Study, the Government shall, no later than 60 calendar days prior to the beginning of the fiscal year, notify the Sponsor in writing of the funds the Government determines to be required from the Sponsor to meet its required share of Study Costs for that fiscal year, taking into account any temporary divergences identified under Article II.D of this Agreement. No later than 30 calendar days prior to the beginning of the fiscal year, the Sponsor shall make the full amount of the required funds available to the Government through the funding mechanism specified in paragraph B.2. of this Article.

4. The Government shall draw from the funds provided by the Sponsor such sums as the Government deems necessary to cover the Sponsor's share of contractual and in-house fiscal obligations attributable to the Study as they are incurred.

5. In the event the Government determines that the Sponsor must provide additional funds to meet its share of Study Costs, the Government shall so notify the Sponsor in writing. No later than 60 calendar days after receipt of such notice, the Sponsor shall make the full amount of the additional required funds available through the funding mechanism specified in paragraph B.2. of this Article.

C. Within ninety (90) days after the conclusion of the Study Period or termination of this Agreement, the Government shall conduct a final accounting of Study Costs, including disbursements by the Government of Federal funds, cash contributions by the Sponsor, the amount of any excess Study Costs, and credits for the negotiated costs of the Sponsor, and shall furnish the Sponsor with the results of this accounting. Within thirty (30) days thereafter, the Government, subject to the availability of funds, shall reimburse the Sponsor for the excess, if any, of cash contributions and credits given over its required share of Study Costs, other than excess Study Costs, or the Sponsor shall provide the Government any cash contributions required for the Sponsor to meet its required share of Study Costs other than excess Study Costs.

D. The Sponsor shall provide its cash contribution for excess Study Costs as required under Article II.C. of this Agreement by delivering a check payable to " FAO, B2, USACE MVN " to the District Engineer as follows:

1. After the project that is the subject of this Study has been authorized for construction, no later than the date on which a Project Cooperation Agreement is entered into for the project; or

2. In the event the project that is the subject of this Study is not authorized for construction by a date that is no later than 5 years of the date of the final report of the Chief of Engineers concerning the project, or by a date that is no later than 2 years after the date of the termination of the study, the Sponsor shall pay its share of excess costs on that date (5 years after the date of the Chief of Engineers or 2 year after the date of the termination of the study).

ARTICLE IV - STUDY MANAGEMENT AND COORDINATION

A. To provide for consistent and effective communication, the Sponsor and the Government shall appoint named senior representatives to an Executive Committee.

For the Sponsor:

Lynn Robertson,
Mayor, Port Allen
750 North Jefferson Ave
West Baton Rouge Parish
Port Allen, LA 70767

For the Government:

John Saia,
Deputy District Engineer for Project
Management
CEMVN-PM
P.O. Box 60267
New Orleans, LA 70160

Thereafter, the Executive Committee shall meet regularly until the end of the Study Period.

B. Until the end of the Study Period, the Executive Committee shall generally oversee the Study consistently with the PMP.

C. The Executive Committee may make recommendations that it deems warranted to the District Engineer on matters that it oversees, including suggestions to avoid potential sources of dispute. The Government in good faith shall consider such recommendations. The Government has the discretion to accept, reject, or modify the Executive Committee's recommendations.

D. The Executive Committee shall appoint representatives to serve on a Study Management Team. The Study Management Team shall keep the Executive Committee informed of the progress of the Study and of significant pending issues and actions, and shall prepare periodic reports on the progress of all work items identified in the PMP.

E. The costs of participation in the Executive Committee (including the cost to serve on the Study Management Team) shall be included in total project costs and cost shared in accordance with the provisions of this Agreement.

ARTICLE V - DISPUTES

As a condition precedent to a party bringing any suit for breach of this Agreement, that party must first notify the other party in writing of the nature of the purported breach and seek in good faith to resolve the dispute through negotiation. If the parties cannot resolve the dispute through negotiation, they may agree to a mutually acceptable method of non-binding alternative dispute resolution with a qualified third party acceptable to both parties. The parties shall each pay 50 percent of any costs for the services provided by such a third party as such costs are incurred. Such costs shall not be included in Study Costs. The existence of a dispute shall not excuse the parties from performance pursuant to this Agreement.

ARTICLE VI - MAINTENANCE OF RECORDS

A. Within 60 days of the effective date of this Agreement, the Government and the Sponsor shall develop procedures for keeping books, records, documents, and other evidence pertaining to costs and expenses incurred pursuant to this Agreement to the extent and in such detail as will properly reflect total Study Costs. These procedures shall incorporate, and apply as appropriate, the standards for financial management systems set forth in the Uniform Administrative Requirements for Grants and Cooperative Agreements to state and local governments at 32 C.F.R. Section 33.20. The Government and the Sponsor shall maintain such books, records, documents, and other evidence in accordance with these procedures for a minimum of three years after completion of the Study and resolution of all relevant claims arising therefrom. To the extent permitted under applicable Federal laws and regulations, the Government and the

Sponsor shall each allow the other to inspect such books, documents, records, and other evidence.

B. In accordance with 31 U.S.C. Section 7503, the Government may conduct audits in addition to any audit that the Sponsor is required to conduct under the Single Audit Act of 1984, 31 U.S.C. Sections 7501-7507. Any such Government audits shall be conducted in accordance with Government Auditing Standards and the cost principles in OMB Circular No. A-87 and other applicable cost principles and regulations. The costs of Government audits shall be included in total Study Costs and shared in accordance with the provisions of this Agreement.

ARTICLE VII - RELATIONSHIP OF PARTIES

The Government and the Sponsor act in independent capacities in the performance of their respective rights and obligations under this Agreement, and neither is to be considered the officer, agent, or employee of the other.

ARTICLE VIII - OFFICIALS NOT TO BENEFIT

No member of or delegate to the Congress, nor any resident commissioner, shall be admitted to any share or part of this Agreement, or to any benefit that may arise therefrom.

ARTICLE IX - FEDERAL AND STATE LAWS

In the exercise of the Sponsor's rights and obligations under this Agreement, the Sponsor agrees to comply with all applicable Federal and State laws and regulations, including Section 601 of Title VI of the Civil Rights Act of 1964 (Public Law 88-352) and Department of Defense Directive 5500.11 issued pursuant thereto and published in 32 C.F.R. Part 195, as well as Army Regulations 600-7, entitled "Nondiscrimination on the Basis of Handicap in Programs and Activities Assisted or Conducted by the Department of the Army".

ARTICLE X - TERMINATION OR SUSPENSION

A. This Agreement shall terminate at the conclusion of the Study Period, and neither the Government nor the Sponsor shall have any further obligations hereunder, except as provided in Article III.C.; provided, that prior to such time and upon thirty (30) days written notice, either party may terminate or suspend this Agreement. In addition, the Government shall terminate this Agreement immediately upon any failure of the parties to agree to extend the study under Article II.E. of this agreement, or upon the failure of the sponsor to fulfill its obligation under Article III. of this Agreement. In the event that either party elects to terminate this Agreement, both parties shall conclude their activities relating to the Study and proceed to a final accounting in accordance with Article III.C. and III.D. of this Agreement. Upon termination of this Agreement, all data and information generated as part of the Study shall be made available to both parties.

B. Any termination of this Agreement shall not relieve the parties of liability for any obligations previously incurred, including the costs of closing out or transferring any existing contracts.

IN WITNESS WHEREOF, the parties hereto have executed this Agreement, which shall become effective upon the date it is signed by the District Engineer for the U.S. Army Corps of Engineers, New Orleans District.

DEPARTMENT OF THE ARMY

CITY OF PORT ALLEN

BY _____
Colonel, Corps of Engineers
District Engineer
New Orleans District

BY _____
Mayor, City of Port Allen

CERTIFICATION REGARDING LOBBYING

The undersigned certifies, to the best of his or her knowledge and belief that:

(1) No Federal appropriated funds have been paid or will be paid, by or on behalf of the undersigned, to any person for influencing or attempting to influence an officer or employee of any agency, a Member of Congress, an officer or employee of Congress, or an employee of a Member of Congress in connection with the awarding of any Federal contract, the making of any Federal grant, the making of any Federal loan, the entering into of any cooperative agreement, and the extension, continuation, renewal, amendment, or modification of any Federal contract, grant, loan, or cooperative agreement.

(2) If any funds other than Federal appropriated funds have been paid or will be paid to any person for influencing or attempting to influence an officer or employee of any agency, a Member of Congress, an officer or employee of Congress, or an employee of a Member of Congress in connection with this Federal contract, grant, loan, or cooperative agreement, the undersigned shall complete and submit Standard Form-LLL, "Disclosure Form to Report Lobbying," in accordance with its instructions.

(3) The undersigned shall require that the language of this certification be included in the award documents for all subawards at all tiers (including subcontracts, subgrants, and contracts under grants, loans, and cooperative agreements) and that all subrecipients shall certify and disclose accordingly.

This certification is a material representation of fact upon which reliance was placed when this transaction was made or entered into. Submission of this certification is a prerequisite for making or entering into this transaction imposed by Section 1352, Title 31, U.S. Code. Any person who fails to file the required certification shall be subject to a civil penalty of not less than \$10,000 and not more than \$100,000 for each such failure.

Mayor
City of Port Allen

DATE: _____

CERTIFICATE OF AUTHORITY

I, _____, do hereby certify that I am the principal legal officer for the City of Port Allen, Louisiana, and that the city is a legally constituted public body with full authority and legal capability to perform the terms of the Agreement between the Department of the Army and the City of Port Allen, Louisiana, in connection with the scope of work as outlined in the PMP and that the person who has executed this Agreement on behalf of the City of Port Allen, Louisiana, has acted within his/her statutory authority.

IN WITNESS WHEREOF, I have made and executed this certification this _____ day of _____, 2004.

Signature

Typed Name

Title in Full

**West Baton Rouge Riverfront Development,
West Baton Rouge Parish, Louisiana**

PROJECT MANAGEMENT PLAN

August 2004

1.0 INTRODUCTION

The Project Management Plan (PMP) is a plan of study, or a detailed scope of work with costs, that is used to define and enable the efficient management of a feasibility study. In this case, a Feasibility Study, entitled “West Baton Rouge Riverfront Development” shall address Riverfront Development opportunities in West Baton Rouge Parish, Louisiana. This PMP documents the assumptions, work tasks, products, and the level of detail that will be necessary for the feasibility study. The PMP also provides the management of the New Orleans District (CEMVN) and the local sponsor a mechanism, for cost and schedule control, establishes the basis for changes, promotes internal communications, and minimizes potential review problems of the feasibility study.

The study area for this PMP is West Baton Rouge Parish, Louisiana. The PMP includes all of the requirements to complete a feasibility study of Riverfront Development. It includes the tasks required to determine existing and future without-project conditions, formulate a range of alternatives, assess the effects of the alternatives, present a clear rationale for the selection of a plan, and develop the detailed designs, cost estimates, and environmental documentation required for the implementation of a Federal project. The alternative plans developed for the feasibility study must meet Federal economic and environmental criteria. Additionally, the PMP provides for the development and selection of the alternative plan that reasonably maximizes net economic development benefits and for the assessment of the environmental and social effects of the selected plan.

2.0 STUDY AUTHORITY (FEDERAL)

This study shall be conducted under the authority of Section 517 of the Water Resource Development Act of 1999.

3.0 GENERAL DESCRIPTION OF THE STUDY AREA

West Baton Rouge Parish is located directly across the Mississippi River from Baton Rouge, Louisiana’s State Capital. West Baton Rouge (WBR) Parish is approximately 191 square miles, and is the smallest parish in Louisiana. In 2000, the population of WBR Parish was 21,601. The city of Port Allen is the parish’s largest city with a population of 5,278 in 2000. Port Allen is the center of the proposed project. It was chosen due to it’s close proximity to Interstate 10, Highway 190, Highway 1, and the Mississippi River. Key linkages are proposed to the communities of Brusly and Addis.

4.0 SCOPE OF WORK

4.1 General. The feasibility study presented in this PMP provides for the development of alternative plans for addressing Riverfront Development in West Baton Rouge Parish, for the evaluation and screening of those plans, and for the development of a plan to be recommended for implementation as a Federal project. The investigations will include an assessment of existing conditions and projected conditions with and without the proposed Federal project. Alternative plans will be developed and evaluated at a feasibility level of detail. Detailed designs, cost estimates, and the environmental documentation necessary for the implementation of the recommended plan will be prepared and presented in a draft report. The draft report will be coordinated with the public and other agencies, and a final report will be prepared.

The Corps of Engineers will use the outputs of this feasibility study to approve the construction of the recommended plan. The feasibility report will include a complete presentation of study analyses and results. It will document compliance of the recommended plan with all applicable statutes, executive orders, and policies.

The end product of the study will be a feasibility report, including environmental documentation compliant with NEPA; a U.S. Fish and Wildlife Service Coordination Act report; an engineering appendix including a baseline cost estimate; a real estate plan; and other supporting appendixes for the study of Riverfront Development in West Baton Rouge Parish.

This PMP was prepared generally in accordance with the following guidelines:

- a. Engineering Regulation (ER) 1105-2-100: "Guidance for Conducting Civil Works Planning Studies" dated 22 April 2000,
- b. ER 5-7-1: "Project Management," dated 30 September 1992,
- c. ER 1110-2-1150: "Engineering and Design for Civil Works Projects,"
- d. ER 405-1-12: "Draft Chapter 12, Real Estate handbook,"
- e. ER 1105-2-208: "Preparation and Use of Project Study Plans," dated 23 December 1994, and
- f. ER 1105-2-101: "Risk-Based Analysis for Evaluation of Hydrology/Hydraulics, Geotechnical Stability, and Economics in Flood Damage Reduction Studies."

4.2 Scope of Studies. The scope of studies that would be conducted for the feasibility study of Riverfront Development in West Baton Rouge Parish is presented below.

4.2.1 Alternative Plans. Four preliminary alternative plans and a preferred alternative plan have been developed for West Baton Rouge Parish, concentrating in Port Allen, Louisiana.

Planning for riverfront development in West Baton Rouge Parish was conducted through extensive discussions that included the New Orleans District, potential project sponsors, other stakeholders, and the general public. The general consensus among the participants was that the

planning effort should be directed toward a set of features that would: (1) increase opportunities for public access to the Mississippi River; (2) increase recreational opportunities in the study area; (3) improve environmental conditions and preserve and enhance the historical and cultural characteristics of the study area; (4) provide appropriate infrastructure; and (5) strengthen the economic value of the riverfront.

The planning objectives led to the development of four conceptual design alternatives for riverfront development that included riverside features that could be constructed under Federal authority and landside features that might be constructed through private and other public sources. The landside features included such things as a hotel, apartments, an assisted living facility, condominiums, townhomes, restaurants, offices, civic buildings, an entertainment complex, a water taxi, and a riverboat. The various alternatives advanced different mixes and locations for these elements.

With respect to the riverside features, Alternative A proposed a wharf structure/plaza, open green space, interpretive trails, an overlook, terraces, parking, entry road improvements, and lighting. Alternative B proposed a bulkhead structure, a riverfront promenade, a riverboat landing, interpretive trails, lawn areas, parking, entry road improvements, and lighting. Alternative C proposed a wharf structure/plaza, a batture trail, green space, entry road improvements, and lighting. Alternative D proposed a wharf structure/plaza, batture trail, green space, entry road improvements, and lighting.

All of the riverside alternatives shared in common a central wharf structure in Port Allen; open green spaces and trails that would be suitable for recreational activities and festivals and that would include interpretation, landscaping, and day-use facilities; and bicycle and pedestrian paths that would extend to the north and south of Port Allen. Variations in the riverside alternatives were largely in the placement and configuration of similar features. Consequently, costs and environmental impacts were expected to be fairly similar, with participants expressing a desire for a mixture of specific features from alternatives A and C. These features were assimilated into a design schematic that was reviewed with the Engineering Division of the New Orleans District and resulted in a final design for the preferred alternative.

Corps of Engineers regulations on construction on the batture and levee were determinative with respect to the selection of the preferred alternative. These regulations include: (1) a prohibition on driving piles closer than five feet of the landside levee toe or 40 feet of the flood side levee toe and no closer than 50 feet from top of bank; (2) no structures to be located on the Mississippi levee slopes or crown; (3) fill on the batture must not exceed one foot in thickness; (4) no penetrations of the levee slope or crown; and (5) utilities are to be placed above the authorized design levee section. In addition, for facility user and navigation safety, it was determined that the wharf should not extend out into the river.

4.2.2 Engineering, Design, and Construction Cost Estimates. Engineering Studies will include designs and cost estimates for the alternative plans to a feasibility level of detail. These designs and cost estimates may include the wharf structure, open space, interpretive trails, parking facilities, lighting, and other recreations features. An engineering appendix will be prepared for the feasibility report.

4.2.3 Real Estate Cost Estimates. Real Estate cost estimates include the cost of obtaining rights-of-entry for field investigations, such as surveys, Hazardous Toxic Radioactive Waste (HTRW) investigations and cultural resource investigations. The report will include preliminary real estate cost estimates for each alternative plan, including lands as well as administrative costs of acquisition. A Real Estate Plan will be prepared for the tentatively selected plan, and will be included as an exhibit to the Feasibility Report. In addition to these tasks, Real Estate will provide consulting services to the non-Federal Sponsor regarding their roles and responsibilities prior to and post project authorization. Real Estate attorneys will assist to develop and review the Project Cooperation Agreement between the CEMVN and the local sponsor.

4.2.4 Economic Analyses. The economic analysis will include calculation of recreational benefits based on user days for the proposed features. These benefits will be annualized to obtain the average annual benefits for the alternative plans over the life of the project. Implementation costs and operation, maintenance, repair, replacement, and rehabilitation costs will be converted to an average annual cost, and benefit-to-cost ratios will be calculated for each plan. These studies will have the level of detail necessary to identify the national economic development (NED) plan. The NED plan is the plan with the maximum difference between average annual benefits and average annual costs. An economics appendix will be prepared for the feasibility report.

4.2.5 Environmental Analyses. Environmental analyses will include the preliminary assessment of direct construction and maintenance impacts, and the impacts of development induced by recreational developed. Preliminary fish and wildlife mitigation costs will be developed for the alternative plans and efforts will be made to identify any potential environmental problems that could preclude implementation of the alternatives. An initial HTRW site assessment will be performed to determine the potential for encountering HTRW in the implementation of the alternative plans. For the tentatively recommended plan, environmental analyses will include an assessment of the environmental impacts of the feasibility plans based on more detailed design and cost estimates. A habitat evaluation procedure will be performed to assess fish and wildlife losses and determine the mitigation requirements. A cultural resources survey will be performed to identify cultural resources and potential impacts, and mitigation requirements. Environmental documentation and an environmental appendix will be prepared for the feasibility report.

4.2.6 Report Preparation, Coordination, and Processing. The results of the feasibility study will be presented in a draft report, which will include environmental documentation. The draft report and environmental documentation will be distributed for public and agency review, a public meeting will be held to discuss the report/environmental documentation and the tentatively recommended plan, and the final report/environmental documentation will be submitted to the Mississippi Valley Division for review. Upon the completion of the review by the Mississippi Valley Division, the Division Engineer will prepare and promulgate the Notice of Completion of the Feasibility Study. Further work will be required after the notice, such as responding to comments from the Headquarters, US Army Corps of Engineers resulting from Washington-level review.

4.2.7 Study Assumptions. There are numerous assumptions that must be made concerning the

outcomes of various tasks in a feasibility study. These assumptions are necessary to develop the scope of subsequent dependent tasks and are based on professional judgment and experience and knowledge of the study area. If the outcomes of the prerequisite tasks vary significantly, changes to this project study plan could be required. Some of the pertinent assumptions are:

- Public involvement would be achieved through continuing public meetings.
- A real estate evaluation will be conducted to determine the necessary rights and costs associated with acquiring rights-of-way for this project.
- Consideration for hydrodynamic sediment transport studies and safety concerns will be included.
- The study will comply with the Clean Water Act, as amended. A NEPA document will be prepared, as appropriate, to address any proposed action.
- Additional HTRW surveys will be conducted to update existing data and to access areas of interest not previously studied.
- The selected plan will consider maintaining the value of the existing levee-top bicycle route.

5.0 SPECIFIC WORK SCOPE

Appendix A presents a specific work scope for the activities required to accomplish the West Baton Rouge Riverfront Development Feasibility Study. Activities are grouped generally according to the organization responsible for performing the task. Appendix A presents a general description of **what, why, who, when, and how**, and the **cost**, and **duration** required to accomplish each task.

6.0 WORK BREAKDOWN STRUCTURE

Appendix B is the Work Breakdown Structure (WBS), which is an outline of the component products and sub-products for the feasibility study in a hierarchy of levels. The Appendix also cross-references each activity and product in the WBS of Appendix B with the Responsibility Assignment Matrix (RAM) in Appendix D.

7.0 ORGANIZATIONAL BREAKDOWN STRUCTURE

Appendix C contains a list of the various offices within the CEMVN and other agencies that will be involved in the feasibility study efforts.

8.0 RESPONSIBILITY ASSIGNMENT MATRIX (RAM)

Appendix D presents organizational responsibility for the products shown in the WBS. This report generally defines the organization(s) required to perform the specific activities associated

with production of the feasibility report and other associated products of the feasibility study effort. Appendix C presents each organization responsible for each product and activity cross-referenced with the organizational breakdown structure.

9.0 BUDGET AND COST ESTIMATES

Appendix E shows the baseline cost estimate. The incremental feasibility study cost estimate shown is \$775,000. Revisions to the PMP will be required if significant changes are made to the proposed action, scope of work, and associated specific work scope.

10.0 SCHEDULE

A Critical Path Method (CPM) network schedule showing the logical progression of all the activities required for the feasibility study is presented in Appendix F. This schedule is based on the assumptions presented in the scope of work and APPENDIX A, SPECIFIC WORK SCOPE. The current schedule assumes that the CEMVN will initiate the feasibility study by 1 January 2005. To initiate the feasibility study, the PMP must be funded by Headquarters, U.S. Army Corps of Engineers and the New Orleans District, U.S. Army Corps of Engineers and the non-Federal sponsor must execute a feasibility cost sharing agreement.

The schedule of major tasks and study milestones are listed below:

Milestone	Action
March 05	Initiate Feasibility Study
April 05	Hold Kick-off Meeting
May 05	Initiate Plan Formulation
July 05	Hold Public Meeting
Nov 05	Complete Plan Formulation
Dec 05	Select NED Plan
Jan 06	Conduct Engineering Design
April 06	Submit Draft Feasibility Report
May 06	MVD Review
Jun 06	Submit Draft EA for Public Review
Sept 06	Final Report to MVD

11.0 CURRENT BENEFITS PLAN

Project benefits for the plan will be developed and will reflect an effective date corresponding to submission of the draft feasibility report. The feasibility report and the PMP will present a plan for updating project benefits for the plan every year.

12.0 LOCAL COOPERATION PLAN

The cash requirements of the local sponsor, presented in Appendix E, Baseline Cost Estimate, will be made available as follows: for each fiscal year of the study, the Government shall, no later than 60 days prior to the beginning of the fiscal year, notify the local sponsor of the

sponsor's cash requirement for the upcoming fiscal year. No later than 30 calendar days after the beginning of the fiscal year, the local sponsor shall verify to the satisfaction of the Government that it has deposited the requisite amount in an escrow account acceptable to the Government, with interest accruing to the local sponsor. As the study progresses, the Government will adjust the cash amounts required to be provided by the local sponsor such sums, as the Government deems necessary to cover contractual and in-house fiscal obligations attributable to the study as they are incurred.

Appendix G is an escrow agreement that could be executed between the Government, the local sponsor, and the financial institution.

13.0 ACQUISITION PLAN

The Federal Acquisition Regulations (FAR) and the Engineer Federal Acquisition Regulations (EFAR) require the preparation of an acquisition plan. The acquisition plan will provide a comprehensive and concise picture of what is being procured, how the proposed acquisition will take place, and to document why the type or manner of procurement was most appropriate for the acquisition planned. The acquisition plan will be a coordinated product of the appropriate functional elements, contracting, and the Small and Disadvantaged Business Utilization Office (SADBU). The acquisition plan will be developed during the feature-design memorandum phase of project development for construction contracts.

14.0 REAL ESTATE PLAN

The Corps will acquire all necessary rights-of-entry for the accomplishment of field investigations such as surveys, soil borings, cultural resource investigations, environmental assessments, HTRW determinations, and other exploratory activities, including the right of ingress and egress to perform these activities, as deemed necessary for completion of the study.

The Real Estate Division will prepare preliminary real estate estimates for each alternative plan. Once the tentatively selected plan is determined, Real Estate will prepare a Real Estate Plan (REP) to be included in the Feasibility Report. The REP includes such information as the estates to be acquired, acquisition milestones, total acquisition costs, and the compensability of utilities to be relocated. The Real Estate Division of the CEMVN does not have technical review authority for Real Estate Plans; therefore, the report will be forwarded for approval to the Division Office.

15.0 QUALITY CONTROL PLAN

The quality control plan (QCP) for the West Baton Rouge Riverfront Development feasibility study provides a technical review mechanism insuring that quality products are developed during the course of the study by the CEMVN. Technical review will consist of a single level study review performed at CEMVN throughout the course of the study. The Mississippi Valley Division (MVD) will be responsible for verifying that the CEMVN's products meet the needs and expectations of the customer, and that competent technical resources are utilized throughout the design and review process. One level of policy review for the West Baton Rouge Riverfront

Development study will be performed at the Headquarters of the United States Army Corps of Engineers (HQUSACE), and will insure that all applicable statutes have been applied with respect to cost sharing, project purpose, and budget criteria. All processes, quality control, quality assurance, and policy review should complement each other, producing a seamless review process that identifies and resolves technical and policy issues during the course of the study and not during the final study stages.

The QCP has been formulated to provide for a sound technical review process at the CEMVN level that focuses on several objectives. Primarily, quality technical products will be produced through an effective and comprehensive single-level technical review process throughout product development while verifying that functional, legal, safety, health, and environmental requirements are satisfied. This review process will insure that a cost-effective solution, while maintaining product requirements, is developed. Technical review will also act as a mechanism to avoid false starts and redesign efforts and will assure accountability for the technical quality of the product. Each technical review objective in the QCP will be satisfied through a seamless review process performed by CEMVN (technical review), MVD (quality assurance of technical products), and HQUSACE (policy review). The quality control plan is based upon applicable guidance from higher authority including the Report of the Task Force on Technical Review, dated December 1994, and CELMV-ET memorandum of 23 September 1995, subject: Lower Mississippi Valley Division, Directorate of Engineering and Technical Services, Quality Control and Quality Assurance Guidance.

15.1 Technical Review. Based upon cost, technical expertise, and current and projected workload, the technical review will be conducted by in-house resources. The local sponsor, and the U. S. Fish and Wildlife Service will also be involved in the review process by participating in Project Delivery Team (PDT) meetings. These agencies will also be invited to have a representative on the Technical Review Team. In-house technical review is expected to result in a lower project and review cost when compared to non-Corps contractual services, thereby adding value to the project and yielding the most cost effective method for technical review. In terms of technical expertise, CEMVN has a vast amount of experience and capability in order to produce a quality product for the West Baton Rouge Riverfront Development Feasibility Study given the similarity to numerous other water resource projects constructed throughout the CEMVN area.

Based upon the current and projected workload of CEMVN, the project management plan indicates that the study will take approximately 18 months.

15.2 Technical Review Team (TRT). The TRT for Planning, Programs, Project Management Division and Engineering Division, Economic Branch, Environmental Branch, and Real Estate Division will be responsible for performing an independent technical review of the West Baton Rouge Riverfront Development Feasibility Study. The TRT will be established at the initial stages of the study and will be maintained to the maximum extent possible during the life of the study. At the initial study stages, the TRT will consist of one or more reviewers from each functional area within each division and existing senior staff that perform other technical work but are not involved in the technical products under review. The TRT will be comprised of the same disciplines on the PDT, and will have experience in the types of analyses that they are

responsible for reviewing. Each TRT member will be senior or equal in experience to the analyst or production person. The TRT will be responsible for verifying: (1) assumptions, (2) methods, procedures, and material used in analyses based on the level of analyses, (3) alternative evaluated is reasonable, (4) appropriateness of data used, and level of data obtained, (5) reasonableness of results, and (6) products meet customer needs and are consistent with law and existing policy. The makeup of the TRT may be modified as the study progresses to match the review requirements. The changes to the TRT may result in out-of-house resources.

15.2.1 Planning, Programs, and Project Management Division Technical Review Team

Members. Technical Review Members will be from the functional areas within the Planning, Programs, and Project Management Division, which includes the Project Management Branch-West, Economics and Social Analysis Branch, and the Environmental Planning and Compliance Branch. Each functional area will be represented by one or more reviewers on the TRT from the various disciplines. Thus, a minimum of three members from Planning, Programs, and Project Management Division will reside on the TRT for the West Baton Rouge Riverfront Development Feasibility Study.

15.2.2 Engineering Division Technical Review. The Technical Review Members will be selected from the various design offices. The members may change as the project progresses and specific project features are better defined. The TRT will consist of a Technical Review Manager (TRM) and representatives from the various design offices. The design offices include Civil Branch, Cost Engineering Branch, Design Services Branch, General Engineering Branch, Geotechnical Branch, Hydraulics & Hydrologic Branch, and Structures Branch. One or more reviewers on the TRT will represent each branch from the various disciplines. There will be a minimum of 6 Engineering Division members on the TRT for the West Baton Rouge Riverfront Development Feasibility Study.

15.3 Technical Review Meetings and Critical Checkpoints. The quality control process recognizes that the appropriate place to perform one-on-one verification for Planning, Programs, Project Management Division and Engineering Division, Economics Branch, Environmental Branch, and Real Estate Division products will vary among the functional areas. However, the verifications will occur before the release of data and/or final products to another office/division, but may include reviewers and PDT members from other functional areas. The one-on-one verifications for both divisions will occur numerous times throughout the current 18-month schedule. Each one-on-one verification meeting will be documented and become part of the quality control records used in the quality assurance process by MVD.

In addition to the one-on-one verification process, there are also points within the study process where it is appropriate for the TRT and PDT to perform the verification process as a team. This feature of the quality control process allows the flexibility to optimize the one-on-one verification process within the functional area while maintaining the team concept during the Technical Review Meetings. Each meeting will be documented and become part of the quality control records used in the quality assurance process by MVD. These points in the study process would typically occur during: scoping and plan formulation, defining of existing conditions, alternative screening, plan selection, report review, and the preparation of the project management plan.

15.4 Quality Control Records. Quality control records for Planning, Programs, Project Management Division and Engineering Division, Economic Branch, Environmental Branch, and Real Estate Division products will be maintained in a technical review package prepared by the PDT leader and included in the West Baton Rouge Riverfront Development Feasibility Study. The package will consist of review comments and a certification checklist. The review comments will summarize the major issues/comments from the independent technical review along with the response or resolution to each comment. The Planning, Programs, and Project Management Division technical review checklist will also be included within the report as a means of documenting the independent technical review. The Planning, Programs, and Project Management Division and Engineering Division checklists will assure that the major elements of the quality control plan have been followed. Planning, Programs, and Project Management Division reviewers will sign the checklist, certifying that, for their particular subject area, the document conforms to pertinent regulations, guidance, and sound professional practices. Prior to the submittal of the draft report to HQUSACE, the checklist will be completed by the Planning, Programs, and Project Management Division functional chief, reviewed by the Chief of Planning, Programs, and Project Management Division, and signed by the District Commander as part of the required report documentation. Engineering Division's quality control records, comments, and resolutions will accompany the design document. The design checklists will serve as a tool for the TRT and will become part of the CEMVN's files.

16.0 VALUE-ENGINEERING PLAN

During the feasibility study, the Value Engineer will review the project and appropriate action, if needed, will be taken. A Value Engineering Plan will be developed for the plan and detailed in the Project Management Plan. This plan will discuss the need for a cost effectiveness review.

17.0 SAFETY PLAN

Field investigations will be conducted following current safety regulations. The local sponsor will assist the study team in identifying hospitals and emergency facilities throughout the project area.

18.0 SECURITY PLAN

This element has been evaluated and is not applicable to the study.

19.0 CULTURAL AND RECREATIONAL RESOURCE PLAN

This work activity requires an in-house evaluation of project design features. Effort will focus on designing and implementing cultural resources investigations, monitoring project development, and coordinating efforts with the State Historic Preservation Officer (SHPO) and the Advisory Council on Historic Preservation (ACHP).

Contractor assistance will be required to conduct a cultural resources survey of the project area. The contractor will be responsible for conducting investigations using appropriate professional

methods and techniques to identify cultural resources within the project area and assessing them for National Register (NR) of Historic Places eligibility according to established criteria. The contractor will complete any NR forms, if appropriate, and prepare a written report of findings. The report will provide recommendations for the protection and preservation of significant cultural resources and include a discussion on the potential for sites in the un-surveyed portions of the project area.

20.0 ENVIRONMENTAL PLAN

The CEMVN will conduct the necessary investigations to assure that no unmitigated adverse impacts to significant resources would be caused by the implementation of the plan. This will be done using the following:

- a. Environmental Planning. Project features will be designed to avoid environmental impacts and minimize unavoidable impacts in the immediate area of construction. Environmental design will include recommendations of the U.S. Fish and Wildlife Service and various State and local agencies. Cultural and aesthetic resources will be assessed and impacts considered in plan formulation, design, and mitigation planning.
- b. Environmental Assessment. An Environmental Assessment will be prepared and coordinated with appropriate Federal, State, and local agencies as required for National Environmental Protection Act (NEPA) compliance. Compliance documents for Coastal Zone consistency, Section 404 (b) 1 guidelines, and Water Quality certification will be prepared as required.
- c. Mitigation Plan. A mitigation plan will be prepared to compensate for any unavoidable environmental or cultural resource losses caused by construction, operation, and maintenance activities.

21.0 OPERATION AND MAINTENANCE

The Operations Division CEMVN will coordinate with the Engineering Division to review the alternative design features, determine the operation and maintenance requirements, recommend typical standard operating procedures, and estimate the operation, maintenance, replacement, and rehabilitation costs. This information will be coordinated with and approved by the non-Federal sponsor.

22.0 MANAGEMENT CONTROL PLAN

Management of this study will be in accordance with ER 5-7-1 and ER 1105-2-100. Cost, schedule, and technical performance will be monitored by the project manager utilizing standard procedures outlined in the regulations referenced above. The Feasibility Cost Sharing Agreement (FCSA) shall formalize an Executive Committee and its responsibilities. The committee will be comprised of the District Engineer, his chief planner, a person of commensurate decision making authority for the non-Federal sponsor, and his primary technical advisor. The District Engineer and his local sponsor counterpart will co-chair the committee. During the feasibility phase, the

Committee will participate in the Issue Resolution Conference and in decisions and recommendations made by the Project Delivery Team. The Executive Committee will also be responsible for resolving any disputes that may arise during the feasibility phase and determining appropriate solutions and study direction, including termination or suspension.

In accordance with EC 1105-2-208, changes that significantly alter the scale and scope of the study as originally agreed to in the PMP will result in the CEMVN notifying HQUSACE so that all levels can reach a new agreement on the conduct of the study.

23.0 REPORTING REQUIREMENTS

Reporting of study progress and expenditures will be made utilizing the guidelines given in ER 1105-2-100 and ER 5-7-1.

24.0 CHANGE CONTROL PLAN

If a change in activity cost or schedule is identified during preparation of Management Control Reports or other study activities, the identifying team member will submit a Schedule and Cost Change Report (SACCR).

The project manager, in consultation with the sponsor and appropriate technical managers, will determine whether a Technical Review Conference, or a reduced variation thereof, is necessary to determine project scope. After the revised scope is agreed upon, the affected team members will submit SACCRs.

Submission and approval of SACCRs are not a correction for poor planning, poor execution, or efforts/expenditures outside the scope of the PMP. Necessary efforts/expenditures outside the scope of the PMP will be reviewed and approved by the project manager and sponsor before being undertaken.

25.0 SCREENING AND SCOPE REVISIONS

During the study process, alternatives will be screened to determine the potential of Federal participation in the next phase, Preconstruction Engineering and Design (PED). Federal participation is primarily based upon the benefit-to-cost ratio and environmental acceptability. Currently, the benefit-to-cost ratio must exceed 1.0 for Federal participation. If during the course of the study, significant plan modifications, additional plans, or other study modifications are required, the total study cost will be adjusted and the PMP revised accordingly.

26.0 UNCERTAINTIES IN SCOPE OF WORK

The scope of work in this PMP defines the tasks required to complete the West Baton Rouge Riverfront Development Feasibility Study as currently scoped. The required tasks use Federal criteria to evaluate the plan developed in the reconnaissance phase into the tentatively selected plan for development. The required tasks and related costs are subject to change during the course of the study if additional plans are warranted. Amendments to the scope of work will be

developed through consultations between the Federal and non-Federal cost-sharing partners. All scope of work amendments must be agreed upon by both cost-sharing partners prior to initiating any new task(s). If changes in the scope of work are required, the total study cost will be adjusted to reflect such changes. The cost sharing for any changes shall equate to 50 percent Federal and 50 percent non-Federal.

27.0 COMMUNICATIONS PLAN

The Project Manager will have regular communication with the local sponsor to facilitate resolution of the issues of particular concern to the local sponsor and update the local sponsor on project status. The local sponsor will be an integral part of the Project Delivery Team and will be informed of all meetings and correspondence through coordination with the project manager.

Public information meetings will be planned and the outcome of these meetings will be recorded in the Public Coordination Appendix of the Feasibility Study. The project manager will communicate in writing to the local sponsor any changes in scheduled completion of milestones.

28.0 SAFETY AND OCCUPATIONAL HEALTH PLAN

The Project Manager will coordinate with the local sponsor and the Project Delivery Team to determine if there are particular hazards to this project. The Project Delivery Team will start a Hazard Tracking List at the beginning of the Feasibility Study. The Hazard Tracking List will be maintained through completion of the Feasibility Study. The Project Delivery Team will then decide if an Intervention Strategy would be useful during the Preconstruction, Engineering and Design (PSD) Phase and Construction Phase.

29.0 RISK MANAGEMENT PLAN

The risks that the project will not obtain the study objectives or will exceed the budget will initiate risk reduction procedures. The known risks for the project are archeological discoveries impacting construction, bank stability impacting the foundation of the structure to be built on the batture, the possibility of barge impact, and additional information increasing total project cost.

Additional risks will be determined by the Project Delivery Team at the beginning of the Feasibility Study and documented by the Project Manager. At this time the probability of occurrence and severity of these risks will be estimated. These risks will be input into a risk analysis sheet.

Appendix A

SPECIFIC WORK SCOPE

**West Baton Rouge Riverfront Development
Project Management Plan
Appendix A
Specific Work Scope**

ESTIMATED PROJECT COST SUMMARY

Planning, Programs and Project Management Division	\$310,742
Engineering Division	\$275,250
Real Estate Division	\$56,280
Operations Division	\$15,000
Construction Division	\$15,000
Contingency	<u>\$102,728</u>
TOTAL PROJECT COSTS:	\$775,000
Federal share (50%)	\$387,500
Non-Federal Share (50%)	\$387,500

West Baton Rouge Riverfront Development Project Management Plan

PLANNING, PROGRAMS, AND PROJECT MANAGEMENT DIVISION

Project Management Branch-West (PM-W)

Organization Code: B2H4300

What: Supervision. Supervision of Plan Formulation Branch, Basin Special Planning Section, providing input to the subject project, as well as review of all input.

Why: To assure that Branch goals and objectives are satisfied.

Who: One GS-12 Project Manager

When: Throughout the feasibility study.

How: Through meetings and oral, written, and electronic communications.

Manpower/Cost: 20 man-days = \$14,000

Duration: Throughout the project.

Project Management Branch-West (PM-W)

Organization Code: B2H4300

What: Public Involvement. Develop and implement a public involvement plan.

Why: To assure that agencies, groups, and individuals interested in the study are identified and contacted, and their views and concerns relative to the study process and plan formulation are identified and addressed in the study.

Who: One GS-12 Project Manager

When: Throughout the feasibility study.

How: A public involvement plan will be developed and implemented through a notice of study initiation, public meetings, workshops, and other public involvement. A notice of study initiation will be prepared and distributed according to an updated mailing list developed during the reconnaissance phase. News releases will be prepared in coordination with the public affairs office and distributed to the appropriate media. Responses to the notice of study initiation and media releases will be reviewed to identify study issues and concerns and responses will be prepared. Issues and concerns will be presented to the Interdisciplinary Planning Team (IPT) for consideration. Public meetings and workshops will be conducted as required to provide and receive information to and from the public, formulate a consensus, and develop a method for future interaction. One public meeting will be scheduled subsequent to the public release of the draft report and environmental assessment to present the study conclusions. Public meetings or workshops will be held during other stages of the study, if needed, to exchange information with the public. Recordings of the public meetings will be analyzed to ensure that the study is responsive to the needs and concerns of the public. Additional public coordination will include preparing correspondence to address individual issues and concerns, preparing and making presentations to business and civic groups interested in the study, and conducting meetings with local interests to determine their views and gather input to the study.

Manpower/Cost: 80 man-days = \$46,000

Duration: Throughout the project.

Project Management Branch-West (PM-W)

Organization Code: B2H4300

What: Plan Formulation. The plans developed during the reconnaissance study will be refined, and additional plans developed if necessary.

Why: To assure that the National Economic Development (NED) Plan and the locally preferred plan are identified and that the best plan, from an overall standpoint, is recommended.

Who: One GS-12 Project Manager, one GS-12 Civil Engineer, and one GS-11 Program Analyst

When: Throughout the feasibility study, prior to plan selection.

How: Plans will be investigated by the IPT to assure that a range of viable alternative plans bracketing the national Economic Development plan are developed. Plan features will be refined, to the extent practical, to minimize costs and maximize benefits. Separable project features will be identified and incrementally analyzed. Input from other District elements will be analyzed to assure that all plan features are developed to the appropriate scope; that plan features and analyses are consistent with each other; that all adverse effects of the plan that may require modifications to the project are identified; and that appropriate modifications are included in the plan. Other plans will be developed to assure that the locally preferred plan is identified, developed, and evaluated. All plans considered will be responsive to all significant public concerns. The recommended plan will be developed through coordination with the IPT, the Project Review Board (PRB), the local Sponsor, and other interests. This includes the development, presentation, and coordination of tentative study recommendations.

Manpower/Cost: 70 man-days/= \$35,000

Duration: Throughout the feasibility study, prior to plan selection.

Project Management Branch-West (PM-W)

Organization Code: B2H4300

What: Study Management. Coordinate the implementation of the study in accordance with the Project Management Plan (PMP); coordinate the development and evaluation of plans; prepare budget documents; develop and revise input to automated office systems and other miscellaneous requests; respond to correspondence; and coordinate with non-Federal sponsor.

Why: To implement the study in accordance with the PMP.

Who: One GS-12 Project Manager

When: Throughout the feasibility study.

How: Conduct the study in accordance with the PMP through the management of the IPT. Coordinate and synthesize the efforts of the IPT members, District technical specialists, support personnel, consultants, contractors, and State, Federal, and local agencies participating in the study. Determine the work to be accomplished, work assignments, schedules, and guidance; and assist in resolving unusual or controversial problems. Distribute funds to various study participants, monitor funding, and redistribute funds, as necessary to assure maximum funds utilization. Monitor the progress of the study and report to higher echelons and the non-Federal sponsor. Meet and deal with representatives of various governmental agencies and private organizations to discuss study-related matters and problems. Review the completed study material to assure that conclusions and decisions reached are consistent with sound engineering and planning practices and conform to Corps and other governmental policies and requirements. Research, review, and analyze available engineering material to assist in the development of information pertaining to the study area, which may be required by IPT members or higher echelon. Direct team members in the preparation of required report input. Prepare and update budget data. Prepare input to various automated office systems such as the P2 database.

Manpower/Cost: 31 days at \$650/day= \$20,000

Duration: Throughout the project.

Project Management Branch-West (PM-W)

Organization Code: B2H4300

What: Report Preparation. Report preparation includes the preparation of the preliminary draft, draft, and final reports.

Why: A draft and final report must be prepared to present study results for review by higher echelons within the Corps of Engineers, the non-Federal sponsor, other Federal and state agencies, and the public.

Who: One GS-12 Project Manager, and one GS-9 Civil Engineer Technician.

When: The report will be prepared, reviewed, and submitted after receipt of input from all offices.

How: Write and edit the main report, coordinate the preparation of plates and other illustrations, compile and edit supporting appendices from other district elements, and assemble the report and its appendices. Coordinate the printing of draft reports and the final report. Distribute the draft report.

Manpower/Cost: 45 man-days \$25,000

Duration: Throughout the study.

Project Management Branch-West (PM-W)

Organization Code: B2H4300

What: Budget Preparation. To support the Programs and Project Management Division with periodic updates of budget documents and study status reports.

Who: One GS-12 Project Manager.

When: Throughout the feasibility study.

How: Prepare PB-6's, justification sheets, supplemental information sheets, fact sheets, issue papers, etc., required for Initial, Office of Management and Budget (OMB), and Congressional budget submissions. Assist the Project Manager with the Division Engineer's annual budget presentation for Congressional hearings and follow-up responses to questions developed by Division, HQUSACE, and Congressional interests regarding the annual budget testimony.

Manpower/Cost: 20 man-days \$10,000

Economic and Social Analysis Branch

General Water Resources Section (PM-AW)

INTRODUCTION

For this work effort, the plans that are economically feasible and supported by the non-Federal sponsor will be developed to feasibility level. A Section 905(b) Analysis and a Justification Report for this project were completed in April 2004. The Section 905(b) Analysis identified four alternatives. A preferred plan was distilled from the four alternatives and a B/C ratio was developed for the preferred plan. The resulting B/C ratio warranted future Federal participation in this project.

General Water Resources Section (PM-AW)

Organization Code: B2H4600

What: Net Benefit and Optimization Analyses. Estimates of net benefits for each construction alternative will be prepared. The alternative that shows the highest level of net project benefits will be identified (NED Plan).

Why: The alternative that exhibits the greatest difference between estimated benefits and costs contributes the most to national income, constitutes the preferred plan from a public investment standpoint, and is identified as the National Economic Development Plan.

Who: IDIQ Contractor

When: This task can begin once project benefit and cost estimates have been completed.

How: In net benefit analysis, estimates of average annual project costs are subtracted from average annual project benefits for each alternative plan to yield estimates of average annual net project benefits. In optimization analysis, each alternative is evaluated according to the magnitude of average annual net project benefits. The plan that shows the highest level of net project benefits is designated as the National Economic Development Plan. In addition, the ratio of project benefits to project costs is calculated for all alternatives. Those alternatives that show benefit-to-cost ratios of 1.0 or greater are economically justified.

Manpower/Costs: 48 days / \$30,000

General Water Resources Section (PM-AW)

Organization Code: B2H4600

What: Conduct Financial Analysis. The local sponsor's financing plan will be reviewed and a preliminary commander's assessment of the local sponsor's ability to cost share will be prepared.

Why: This analysis is necessary in order to determine whether the local sponsor has the capability to meet the financial obligations for the selected plan in accordance with the project funding schedule. A preliminary commander's assessment is a required part of the project cost sharing agreement.

Who: One GS-12 senior economist.

When: This can begin once the selected plan is determined, a fully-funded project cost estimate is prepared, and the local sponsor submits a copy of their financing plan.

How: The local sponsor submits a copy of their financing plan which features a sources and uses of funds statement and an explanation of the method that will be used to acquire funds to meet its obligations under the project cost sharing agreement. The financing plan will be assessed using information supplied by the local sponsor, such as financial statements and documents related to the statutory tax and bonding authorities, and private organizations, such as Moody's and Standard and Poor's. Section personnel will work closely with representatives of the local sponsor in order to ensure that the financing plan is accurate and meets all regulatory requirements. The conclusions of the review of the financing plan will be presented in the commander's assessment.

Time and Cost: GS-12 10 days of labor \$6,000

Duration:

General Water Resources Section (PM-AW)

Organization Code: B2H4600

What: Study Coordination and Preparation of Report. Study coordination includes: the planning and monitoring of study budgets and schedules; participation in staff meetings, interdisciplinary planning team meetings, in-progress review conferences, and *ad hoc* meetings; staff supervision; the processing of official correspondence; and the preparation of inputs to meetings, conferences, and reviews to brief the New Orleans District, Mississippi Valley Division, and Headquarters USACE on study issues and status. Report preparation consists of writing and editing a manuscript, which describes the methodology used in the economic analysis and the conclusions of the investigation. The report narrative, tables, graphs and related documentation will be presented in a logical manner to illustrate study results. Included in this task are section and branch review of the economics report and district review of the feasibility report.

Why: Study coordination is essential to ensure that the economic analysis is prepared within established schedules and budgets and that all resources are available to accomplish this goal. Report preparation is the principal means by which the results of the economic analysis is documented and communicated to other corps elements, the local sponsor, and the public.

Who: IDIQ Contractor.

When: Study coordination occurs throughout the feasibility study. Report preparation begins once risk-based analysis is completed.

How: Study coordination is accomplished through staff meetings, one-on-one meetings, official correspondence and other written communication. Report input is a product of expository writing, which presents in a detailed, clear, and logical manner an explanation of each step that was performed in the economic analysis and the results that were achieved. Report input is supplemented with numerous graphs and tables which not only provide all relevant data used in reaching conclusions but which systematically illustrate the study methodology employed.

Time and Cost: \$14,000

Duration:

Environmental Planning and Compliance Branch

Ecological Planning and Restoration Section (PM-RS)

Organization Code: B2H4710

Personnel of Ecological Planning and Restoration Section will be responsible for preparation and coordination of an Environmental Assessment (EA, a NEPA document) and other related environmental documentation. Applicable guidance including ER 1105-2-100, ER 200-2-2, and CFR 1500-1508 will be followed during preparation and processing of the NEPA documents. It has been determined that this project may have a significant impact on the human environment. Therefore, the completion of an EA is warranted.

Natural and Cultural Resource Analysis Section (PM-RN)

Organization Code: B2H4730

Each project alternative will be evaluated to determine its potential impact on cultural resources. A New Orleans District (NOD) staff archeologist from the Natural and Cultural Resource Analysis Section will check cultural resource records and reports to determine if previously recorded cultural resource sites are located in the project area. Geologic data will also be examined to determine the potential the project area has for the presence of cultural resource sites. Following completion of the above noted evaluation, coordination with the State Historic Preservation Officer (SHPO) will begin. This will initiate compliance with Section 106 of the National Historic Preservation Act (NHPA). **If needed**, in-house labor will be utilized to prepare a Scope of Work for the completion of a cultural resource survey for each project alternative. Following completion of the survey, the contractor will prepare a technical report summarizing his/or her findings. Preliminary evaluations and recommendations will also be made regarding National Register Eligibility and the need for additional investigations. In-house labor will be utilized to manage and monitor the contractor's work and coordinate the review process with the SHPO. The completion of the above noted cultural resource investigation will enable the New Orleans District to develop a cultural resource management plan and develop realistic cost estimates for the completion of future survey, testing, and mitigation efforts.

A Land-Use History will be completed for the selected project alternative. Natural and Cultural Resource Analysis staff, using in-house labor or contractor assistance, will prepare a comprehensive commercial/industrial land-use history of the project area.

Environmental Analysis and Support Section (PM-RP)

Organization Code: B2H4720

A Hazardous, Toxic, and Radioactive Waste (HTRW) Initial Site Assessment will be prepared by the Environmental Analysis and Support Section staff to reduce the risk of HTRW health and safety problems during later project development and to satisfy Engineer Regulation (ER) 1165-2-132.

TASK # PM-R 1: Prepare Draft EA

Ecological Planning and Restoration Section (PM-RS)

Organization Code: B2H4710

What: **Develop and Describe Proposed Action and Alternatives**. Coordinate with PM and Engineering Division to develop and describe alternatives and features of the proposed action.

Why: ER 1105-2-100, ER 200-2-2, and CFR 1500-1508 require analysis of effects on the environment. Documentation of the alternatives is necessary to determine potential impacts.

Who: GS-11 or 12 biologist.

When: To be accomplished early in the feasibility phase.

How: Field trips will be required to develop and describe the alternatives. Additional information will be obtained through published reports, aerial photography interpretation, unpublished information from other agencies, and local interviews. This task also includes time and cost to coordinate project features, costs, and alternatives with other District elements.

Ecological Planning and Restoration Section (PM-RS)

Organization Code: B2H4710

What: **Determine Environmental Setting and Significant Resources**. Conduct field investigations and describe the significant resources and the environmental setting of the project area.

Why: ER 1105-2-100, ER 200-2-2, and CFR 1500-1508 require analysis of effects on the environment. Documentation of the environmental setting (existing condition) is necessary to determine potential impacts.

Who: GS-11 or 12 biologist.

When: To be accomplished early in the feasibility phase, as soon as alternatives are established.

How: Field trips will be required to assess habitat conditions of the project sites and dredged material disposal areas being considered. Additional information will be obtained through published reports, aerial photography interpretation, unpublished information from other agencies, and local interviews. This task also includes time and cost to coordinate project features, costs, and alternatives with other District elements.

Ecological Planning and Restoration Section (PM-RS)

Organization Code: B2H4710

What: **Determine Most Probable Future.** Determine the most probable future for each of the significant resources in the project area for all alternative plans.

Why: NEPA and the Principles and Guidelines require that the no action conditions be documented as the basis of comparison of alternative plans.

Who: GS-11 or 12 biologist.

When: After the environmental setting is documented and the project team determines the no-action assumptions.

How: Using trend analysis, parish planning reports, and professional judgment.

Ecological Planning and Restoration Section (PM-RS)

Organization Code: B2H4710

What: **Document Impacts of Alternative Plans.** Determine direct, indirect, and cumulative impacts on biological resources, including non-monetary benefits.

Why: NEPA and Principles and Guidelines require that impacts of alternative plans be disclosed. CFR 1500-1508 requires that analysis of alternatives including methods to avoid and minimize environmental impacts of alternatives.

Who: GS-11 or 12 biologist.

When: After environmental setting and no-action assumptions are documented.

How: Use Habitat Evaluation System (HES), Habitat Evaluation Procedures (HEP) analyses, and hydraulics computer modeling in cooperation with FWS and LDWF.

Ecological Planning and Restoration Section (PM-RS)

Organization Code: B2H4710

What: **Prepare Mitigation Plan.** Formulate mitigation plan to compensate for the unavoidable impacts.

Why: ER1105-2-100 requires that mitigation of impacts be formulated, evaluated, and recommended to the extent justified.

Who: GS-11 or 12 biologist will be the primary responsible party. Other District elements,

including RE, ED, and PM will participate and provide Cost information. ED will have to provide engineering expertise in the development of the mitigation plans.

When: During and after Impact Analysis.

How: Use Habitat Evaluation System (HES), Habitat Evaluation Procedures (HEP) analyses in cooperation with FWS and LDWF.

Ecological Planning and Restoration Section (PM-RS)

Organization Code: B2H4710

What: Complete preliminary Draft EA for Corps, non-federal sponsor, and USFWS review. Prepare preliminary DEA for technical review.

Why: An EA is required by the National Environmental Policy Act of 1969. An Environmental Appendix is necessary to document compliance with various other environmental laws and regulations such as the Endangered Species Act, the Clean Water Act, and the Coastal Zone Management Act.

Who: The EA coordinator.

When: Preparation of the draft EA will occur following the AFB. All of the Phase II task will have to be essentially completed before the draft EA can be prepared. The draft EA will be prepared along the same time frame as the draft feasibility report.

How: Narrative accounts of significant resources, existing conditions, effects of alternatives, study history, study authority, coordination with other agencies, and mitigation features will be formatted into an EA utilizing Microsoft Word and Excel software programs. The EA will contain those sections required by CFR 1500-1508.

Ecological Planning and Restoration Section (PM-RS)

Organization Code: B2H4710

What: Complete DEA and Draft FONSI. Revise preliminary DEA for public review.

Why: The report will be revised based on technical review comments in order to gain approval from higher authority to release the report. The EA must be distributed to the public and other agencies in order to comply with NEPA and CEQ guidelines (CFR 1500-1508).

Who: GS-11 or 12 biologist would be primarily responsible. Input from other District elements may be necessary to resolve the technical review comments. The public distribution of the report and EA will be a joint effort between the study manager and the environmental documentation coordinator.

When: As soon as the planning guidance memo (PGM) is received from MVD/HQUSACE, the revision process will begin.

How: The EA coordinator will be responsible for responding to review comments on the environmental documents. The EA coordinator will refer technical review comments on cultural resources and socioeconomic items to the appropriate District elements for resolution. Also, the EA coordinator would prepare letters to distribute the draft report/EA, file the draft EA with the EPA, and coordinate the mailing of the draft report/EA.

Ecological Planning and Restoration Section (PM-RS)

Organization Code: B2H4710

What: Attend project team meetings.

Why: To facilitate project team performance.

Who: GS-11 or 12 biologist

When: Throughout the investigation.

How: Participate in project team meetings and meetings with the non-Federal sponsor.

TASK # PM-R 1: Prepare Draft EA

Cost:

\$11,627

TASK # PM-R 2: Other Environmental Laws

Ecological Planning and Restoration Section (PM-RS)

Organization Code: B2H4710

What : **Prepare 404(b)(1) Evaluation (only for selected plan).** Prepare evaluation document, obtain input from ED-HM (only for selected plan) **Note:** [Funds to obtain physical and chemical impact data from ED-HM should be included in ED's Cost Estimate].

Why: To obtain compliance with Section 404 of the Clean Water Act.

Who: GS-11 or 12 biologist.

When: During impact and mitigation analysis.

How: Document wetland areas to be filled, obtain data from engineering technical function on quantities and types of fill, and obtain water quality input from H&H technical function.

Ecological Planning and Restoration Section (PM-RS)

Organization Code: B2H4710

What: **Prepare 404(b)(1) Public Notice.** Prepare and mail public notice (selected plan only) for 30-day review.

Why: To obtain compliance with Section 404 of the Clean Water Act.

Who: GS-11 or 12 biologist.

When: During impact and mitigation analysis.

How: Use standard mailing list and modify as needed.

Ecological Planning and Restoration Section (PM-RS)

Organization Code: B2H4710

What: **Place ad in Baton Rouge Advocate for WQC.**

Why: To obtain compliance with Section 401 of the Clean Water Act.

Who: GS-11 or 12 biologist.

When: After completion of impacts and 404(b)(1) analysis.

How: Send Public Notice to Baton Rouge Advocate.

Ecological Planning and Restoration Section (PM-RS)

Organization Code: B2H4710

What: Obtain Water Quality Certification from LDEQ (only for selected plan). Prepare application and coordinate with LDEQ (selected plan only).

Why: To obtain compliance with Section 401 of the Clean Water Act.

Who: GS-11 or 12 biologist.

When: After completion of impacts and 404(b)(1) analysis.

How: Prepare application and coordinate with LDEQ.

Ecological Planning and Restoration Section (PM-RS)

Organization Code: B2H4710

What: Conduct Endangered Species and Essential Fish Habitat (EFH) Coordination. Coordinate with USFWS and NMFS.

Why: To obtain compliance with Endangered Species Act.

Who: GS-11 or 12 biologist.

When: During impact analysis.

How: Literature searches, field inspections, and coordination with USFWS, LDWF, and NMFS, if needed. Assumes formal consultation will not be needed.

Ecological Planning and Restoration Section (PM-RS)

Organization Code: B2H4710

What: Prepare Coastal Zone Consistency Determination. Prepare document and coordinate with Louisiana Department of Natural Resources.

Why: To obtain compliance with the Coastal Zone Management Act.

Who: GS-11 or 12 biologist.

When: When a plan is selected.

How: Coordinate with Louisiana Coastal Resources Program personnel and complete a

consistency Determination.

Ecological Planning and Restoration Section (PM-RS)

Organization Code: B2H4710

What: Conduct Air Quality Determination. Determine “Attainment” status and complete applicability determination, if necessary.

Why: To obtain compliance with Air Quality Regulations.

Who: GS-11 or 12 biologist.

When: After impacts and mitigation analysis.

How: Coordinate with Louisiana Department of Environmental Quality.

TASK # PM-R 2: Other Environmental Laws

Cost:

\$1,868

TASK # PM-R 4: Cultural Resources Write-up

Natural Resources and Cultural Resources Section (PM-RN)

Organization Code: B2H4730

What: Prepare and Manage Land-use History Contract. Manage contract.

Why: Satisfy Engineer Regulation (ER) 1165-2-132.

Who: GS-11 or 12 archeologist.

When: At the initiation of the investigation after the project maps are received from the project manager.

How: Input will be prepared for technical report and for utilization in Phase I HTRW Assessment.

Natural Resources and Cultural Resources Section (PM-RN)

Organization Code: B2H4730

What: Cultural Resource Evaluation. Initial evaluation.

Why: Satisfy the National Historic Preservation Act requirements and associated regulations.

Who: GS-11 or 12 archeologist.

When: At the initiation of the investigation after the project maps are received from the project manager.

How: Literature and records review to determine if known cultural resource sites are located within study area and if study area has potential for the presence of cultural resources.

Natural Resources and Cultural Resources Section (PM-RN)

Organization Code: B2H4730

What: Preparation and Management of Cultural Resource Contract. Contract management.

Why: Satisfy the National Historic Preservation Act requirements and associated regulations.

Who: GS-12 archeologist.

When: At the initiation of the investigation after the project maps are received from the project manager.

How: In-house labor will be utilized to prepare a scope of work for the completion of a cultural resource sample survey for each project alternative. In-house labor will also be utilized to award and manage contract. Following award of contract, a cultural resource contractor will complete field investigations and prepare a technical report of findings.

Natural Resources and Cultural Resources Section (PM-RN)

Organization Code: B2H4730

What: Cultural Resource Write-up and Coordination. Report writing and coordination.

Why: Satisfy the National Historic Preservation Act requirements and associated regulations.

Who: GS-11 or 12 archeologist.

When: Following completion of the cultural resource field investigation and technical report.

How: Input will be prepared for engineering technical report and the EA. A coordination letter will also be sent to Louisiana State Historic Preservation Officer.

Natural Resources and Cultural Resources Section (PM-RN)

Organization Code: B2H4730

What: Land-use History Contract. Contract.

Why: Satisfy Engineer Regulation (ER) 1165-2-132.

Who: Land-use History Contractor.

When: At the initiation of the investigation after the project maps are received from the project manager.

How: Contractor will prepare land-use report for utilization in Phase I HTRW Assessment.

Natural Resources and Cultural Resources Section (PM-RN)

Organization Code: B2H4730

What: Cultural Resource Survey and Technical Report Contract.

Why: Satisfy the National Historic Preservation Act requirements and associated regulations.

Who: Cultural Resource Contractor.

When: At the initiation of the investigation after the project maps are received from the project

manager.

How: A cultural resource contractor will complete field investigations and prepare a technical report of findings.

TASK # PM-R 4: Cultural Resources Write-up Cost:

\$49,900

TASK # PM-R 5: Recreation and Aesthetic Write-up

Natural Resources and Cultural Resources Section (PM-RN)

Organization Code: B2H4730

What: **Prepare Recreation Input.** Provide description of recreational activities and opportunities when applicable. (PM-RN)

Why: NEPA and the Principles and Guidelines require that baseline conditions be documented.

Who: GS-11 or 12 Recreation Specialist.

When: At the initiation of the investigation after the project area maps are received from the project manager.

How: Provide descriptions of recreational activities and opportunities and description of project effects.

Natural Resources and Cultural Resources Section (PM-RN)

Organization Code: B2H4730

What: **Preparation and Management of Recreational Resource Contract.** Contract management.

Why: NEPA and the Principles and Guidelines require that baseline conditions be documented.

Who: GS-11 or 12 Recreation Specialist.

When: At the initiation of the investigation after the project maps are received from the project manager.

How: To provide descriptions of recreational activities and opportunities and description of project effects.

Natural Resources and Cultural Resources Section (PM-RN)

Organization Code: B2H4730

What: **Prepare Evaluation of Aesthetics.** Evaluate aesthetic impacts and describe aesthetic features, as necessary. (PM-RN)

Why: NEPA and the Principles and Guidelines require that baseline conditions be documented.

Who: GS-11 or 12 Recreation Specialist.

When: At the initiation of the investigation after the project area maps are received from the project manager.

How: evaluate aesthetic impacts and describe aesthetic features.

Natural Resources and Cultural Resources Section (PM-RN)

Organization Code: B2H4730

What: Recreational Resources Survey and Technical Report Contract.

Why: Satisfy recreational analysis requirements.

Who: Recreational Resource Contractor.

When: At the initiation of the investigation after the project maps are received from the project manager.

How: A recreational resource contractor will complete field investigations and prepare a technical report of findings.

TASK # PM-R 5: Recreation and Aesthetic Write-up

Cost: \$29,450

TASK # PM-R 6: HTRW Write-up

Environmental Analysis and Support Section (PM-RP)

Organization Code: B2H4720

What: HTRW Initial Site Assessment (Field inspection and preparation of assessment).
Field inspection and preparation of initial assessment (PM-RP).

Why: COE policy (ER 1165-2-132) requires that HTRW conditions be documented for safety, cost, and legal liability reasons.

Who: GS-11 or 12 biologist

When: After land-use history report.

How: Consult land-use history report, walk project areas with contractor, provide contractor with aerial photographs and other available pertinent information.

Environmental Analysis and Support Section (PM-RP)

Organization Code: B2H4720

What: HTRW Investigation. Determine probability and location of HTRW sites, in-house or contract management.

Why: COE policy (ER 1165-2-132) requires that HTRW conditions be documented for safety, cost, and legal liability reasons.

Who: GS-11 or 12 biologist

When: After land-use history report, agency review, and initial site assessment.

How: Manage HTRW contract, review contractor's report, and prepare a memo defining risks, based on the HTRW report.

TASK # PM-R 6: HTRW Write-up

Cost:

\$6,825

TASK # PM-R 7: Technical Review

Ecological Planning and Restoration Section (PM-RS)

Organization Code: B2H4710

What: Technical Review Checklist. Provide District technical review for all environmental tasks and documents.

Why: To conform with current USACE policy that Districts will perform their own internal review of reports before releasing to the public.

Who: One GS-11 or 12 biologist.

When: Once a preliminary draft version of the EA and environmental appendix is produced.

How: Complete List.

Duration: 2 weeks

TASK # PM-R 7: Technical Review **Cost:** \$

TASK # PM-R 8: Public Review

Ecological Planning and Restoration Section (PM-RS)

Organization Code: B2H4710

What: Prepare transmittal letters and mail documents for public review. Prepare and submit DEA for public, and agency review.

Why: To satisfy public review requirement for NEPA compliance.

Who: GS-11 or 12 biologist

When: After comments are received on the preliminary draft.

How: Use standard mailing list and modify as needed.

TASK # PM-R 8: Public Review

Cost:

\$348

TASK # PM-R 9: Feasibility Report Write-up

Ecological Planning and Restoration Section (PM-RS)

Organization Code: B2H4710

What: Provide Feasibility Report Input. Provide PM with environmental input to Feasibility Report.

Why: Feasibility report must contain a summary of environmental findings, costs for adopted mitigation, and an environmental appendix.

Who: GS-11 or 12 biologist

When: After impacts and mitigation analysis.

How: Summarize environmental findings.

TASK # PM-R 9: Feasibility Report Write-up

Cost: \$10,000

TASK # PM-R 10: Prepare Final EA & FONSI

Ecological Planning and Restoration Section (PM-RS)

Organization Code: B2H4710

What: Respond to Comments on Draft EA. Review public and agency comments on the DEA, provide responses and revise the DEA and Feasibility Report, as necessary.

Why: ER 200-2-2 requires that the public be involved and the COE must respond to public comments and make revisions, as needed.

Who: GS-11 or 12 biologist

When: After 30-day public review period.

How: Review all comment letters, respond to comments, and make revisions to the draft DEA, as needed.

Ecological Planning and Restoration Section (PM-RS)

Organization Code: B2H4710

What: Revise FONSI for signature. Prepare for District Engineer's signature.

Why: To complete NEPA compliance process.

Who: GS-11 or 12 biologist

When: After public review of the draft report/EA.

How: The EA will be revised as necessary to address public and agency comments and issues raised. Depending on the scope of comments and issues, additional information may have to be researched and documented, text may have to be edited, and mitigation plans may have to be modified. The EA coordinator will be responsible for responding to environmental comments and issues and will work with the project manager and the rest of the IPT to respond to the rest of the comments. The list of respondents to the draft EA would be used to distribute the final report/EA.

Ecological Planning and Restoration Section (PM-RS)

Organization Code: B2H4710

What: Attend project team and interagency meetings.

Why: To facilitate project team performance.

Who: GS-11 or 12 biologist

When: Throughout the investigation.

How: Participate in project team meetings and meetings with the non-Federal sponsor.

Ecological Planning and Restoration Section (PM-RS)

Organization Code: B2H4710

What: Prepare PCA Checklist Memo. Documents the completion of environmental compliance.

Why: To list completion of environmental compliance.

Who: GS-11 or 12 biologist

When: After environmental compliance has been reached.

How: Prepare list.

TASK # PM-R 10: Prepare Final EA & FONSI	Cost:	\$724
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PLANNING, PROGRAMS, AND PROJECT MANAGEMENT DIVISION SUBTOTAL:	<u>\$310,742</u>
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WEST BATON ROUGE RIVERFRONT DEVELOPMENT PROJECT MANAGEMENT PLAN

ENGINEERING DIVISION

Engineering Division (ED)

Organization Code: B2L0000

What: Technical Management. Provide for the management, supervision, technical oversight and review of all offices in Engineering Division that will work on this study and also all output developed by those offices.

Why: To assure that the goals and objectives for all offices within Engineering Division working on this study are met.

Who: GS-15 Chief of Engineering Division
GS-14 Assistant Chief of Engineering Division
GS-14s Branch Chiefs
GS-13s Section Chiefs
GS-05s Secretaries

When: During all phases of the project requiring input from Engineering Division.

How: Through meetings and oral, written and electronic communications.

Cost: \$3,000

Duration: Length of the Study

Engineering Division (ED)

Organization Code: B2L0000

What: Technical Review Participation. Technical review of all feasibility study input (including costs estimates) provided by Engineering Division.

Why: To ensure that all investigations, findings, analysis, designs and cost estimates provided by Engineering Division meet all technical, functional, legal, safety, health and environmental requirements.

Who: The Technical Review for Engineering Division will be coordinated through Projects Engineering Section. The Technical Review Team for Engineering Division will include:

- GS-12 Functional Team Leader – Projects Engineering Section
- GS-12 Cost Engineer
- GS-12 Civil Engineer (Geotechnical)
- GS-12 Civil Engineer (Hydraulics)
- GS-12 Civil Engineer (Levees)
- GS-12 Civil Engineer (Structural)

When: The technical review will proceed concurrently with Engineering Division's development of input to the Engineering Appendix to the study. Two formal meetings of the team will take place during the review process. The first meeting will be held when the selected alternatives are identified. The second meeting will be conducted towards the end of the study after the Draft Report is completed.

How: The Technical Review process will consist of a single level of review performed by Engineering Division personnel independent of this particular study. The reviewers will review the work of the study team engineers, participate in Technical Review meetings and provide comments based on their review. The study team members will review the comments, provide a response and amend their Engineering Division input as necessary.

Cost: \$10,000

Duration: Length of the Study.

Engineering Division (ED)

Organization Code: B2L0000

What: CADD Licensing. Provide licensing fees for all CADD related services within Engineering Division.

Why: To assure that all CADD related services within Engineering Division are properly licensed.

Who: CADD License

When: During all phases of the project requiring CADD usage within Engineering Division.

How: By payment of necessary CADD licensing fees.

Cost: \$1,000

Duration: Length of the Study

Engineering Division (ED)

Organization Code: B2L0000

What: Value Engineering Study Participation. Coordinate and compile Value Engineering Study input for Engineering Division.

Why: The Value Engineering Study identifies additional alternatives that may be of value to a project. The output from the study is a report with time and rough cost for proposed alternatives with the savings compared to what is in the actual Engineering Appendix.

Who: GS-12 Projects Engineering Section
GS-12 Cost Engineer
GS-12 Civil Engineer (Geotechnical)
GS-12 Civil Engineer (Hydraulics)
GS-12 Civil Engineer (Levees)
GS-12 Civil Engineer (Structural)

When: Prior to the start of the study.

How: Through meetings and oral, written and electronic communications.

Costs: \$5,000

Duration: Throughout the Value Engineering study.

Engineering Control Branch (ED-E)

Organization Code: B2L0700

What: Financial Management. Provide financial management and schedule review of the subject project for Engineering Division.

Why: To track the costs and schedules for the study as required by the Project Management Business Process.

Who: GS-12 Civil Engineer
GS-11 Program Analyst
GS-09 Civil Engineering Technician

When: During all Phases of the project requiring input from Engineering Division.

How: Through meetings and oral, written, and electronic communications involving the Corps of Engineers Financial Management System (CEFMS), the Pre-award Action System and F&A reports.

Cost: \$1,500

Duration: Length of Study

Hydraulic & Hydrologic Branch (ED-H)

Hydrologic Engineering Section (ED-HH)

Organization Code: B2L0240

What: Climatology. Develop the climatology input for the Engineering Appendix to the subject study.

Why: To provide the climatological and hydrologic data that describes the study area.

Who: GS-11 Hydraulic Engineer
GS-09 Hydraulic Technician

When: At the beginning of the study.

How: A detailed write-up explaining all the necessary climatological and hydrological parameters will be submitted along with tables and maps showing where data is collected.

Cost: \$3,000

Duration: 0.5 Months

Hydraulic Design Section (ED-HD)

Organization Code: B2L0250

What: Provide Project Flood Flow line design elevations and review designs to make sure they meet all hydraulic design criteria for construction on a mainline protection levee.

Why: In order to maintain the design integrity of the Mississippi River Main Line Protection levee on the west side of the river in the vicinity of Port Allen, Louisiana

Who: GS-12 Hydraulic Engineer

When: Throughout the design process

How: Using the presently approved Flow Line report and all other Corps of Engineers design criteria.

Cost: \$5,000

Duration: 1 Month

Hydra-Modeling Section (ED-HM)

Organization Code: B2L0260

What: Water Quality Assessment. At this time we have not included a water quality assessment in this estimate. If at a later time one is found to be necessary the cost will be developed and added to the overall study cost.

Why:

Who:

When:

How:

Duration:

Geotechnical Branch (ED-F)

Dams, Geology Section (ED-FG)

Organization Code: B2L0350

What: Drill and process 2 one-hundred-foot-deep, 5-inch diameter undisturbed borings.

Why: For use in the foundation design.

Who: In-house drill crew and lab.

When: Once right and entry and funding is available.

How: Using drill crew and lab.

Manpower/Cost:	Drill Crew	\$13,200
	Lab	\$5,250
	A/E testing	<u>\$6,000</u>
	Total	\$24,450

Duration: 3 Months

Dams, Dams, Levees, and Channel Slopes Section (ED-FD)

Organization Code: B2L0340

What: Conduct bank stability analysis at every revetment range extending from 300' upstream of proposed wharf structure to 300' downstream of proposed wharf structure (Range U-11 to D-07). If bank stability safety factors are less than desirable, grading plans will be designed.

Why: To assure wharf structure to be built on bature has a stable foundation.

Who: GS-09 Civil Engineer Technician
GS-11 Civil Engineer
GS-12 Civil Engineer
GS-13 Supervisory Civil Engineer

When: Immediately after boring testing is completed and surveys are made available.

How: Using engineering judgment, experience and geologic and geotechnical knowledge of the area.

Manpower/Cost: 200 man-hours Costs: \$ 20,000

Duration: 3 Months

Dams, Levees, and Channel Slopes Section (ED-FD)

Organization Code: B2L0340

What: Provide pile capacities for wharf structure

Why: For use by General Engineering in determining length of piles to support wharf structure.

Who: GS-07 Civil Engineer Technician

GS-11 Civil Engineer

GS-12 Civil Engineer

GS-13 Supervisory Civil Engineer

When: After bank stability is complete and pile types and sizes are received from General Engineering.

How: New boring data will be utilized. Plots of depth vs. load for a 1.0 safety factor will be provided.

Manpower/Cost: 100 man-hours Costs: \$10,000

Duration: 1.5 Months

Dams, Levees, and Channel Slopes Section (ED-FD)

Organization Code: B2L0340

What: Attend in-house meetings, site visits, etc.

Why: To coordinate with other elements of Engineering Division and PPPMD.

Who: GS-09 Civil Engineer Technician

GS-11 Civil Engineer

GS-12 Civil Engineer

When: As deemed appropriate by Design or Project Engineer or Project Manager.

How: Verify and discuss project aspects.

Manpower/Cost: 24 man-hours Costs: \$2,400

Duration: 1 Month

Civil Engineering Branch (ED-L)

Levees Section (ED-LS)

Organization Code: B2L0400

What: Review designs to make sure they meet all levee design and permit criteria for construction on or adjacent to the Mississippi River Main Line Protection levee.

Why: In order to maintain the design integrity of the Mississippi River Main Line Protection levee on the west side of the river in the vicinity of Port Allen, Louisiana.

Who: One GS-12 Civil Engineer

When: Throughout the design process.

How: Using Corps of Engineers design and permit criteria.

Cost: \$3,000

Duration: 1 Month

Levees Section (ED-LS)

Organization Code: B2L0400

What: Attend in house meetings, site visits, etc.

Why: To coordinate with other elements of Engineering Division, PPPMD, Operations Division, and the Atchafalaya Basin Levee Board.

Who: GS-12 Civil Engineer

When: As deemed appropriate by the Design or Project Engineer or Project Manager.

How: Verify and discuss project aspects.

Manpower/Cost: 24 man-hours Costs: \$2,400

Duration: Length of study.

Cost Engineering Branch (ED-C)

Organization Code: B2L0600

What: Cost Estimates. Prepare Feasibility cost estimate and an M-CACES estimate on the selected plan.

Why: For input to the development of the total project baseline cost estimate required by ER 1110-2-1302 (and for the subsequent economic analysis).

Who: GS-12 Cost Engineer
GS-05 Secretary

When: This task will be completed upon receipt of all necessary details.

How: For any alternatives, prepare cost estimates based upon an evaluation of each construction line item utilizing Cost Engineering Branch's historical database (including previous MCACES estimates) or abbreviated (non-detailed) estimating procedures. If an M-CACES is required, prepare cost estimate for the 1 selected plan in M-CACES software analyzing each construction line item utilizing detailed cost engineering procedures (inputting the necessary equipment, labor, and material costs) or historical data. Contingency costs will be included and will be based on a risk analysis performed via a range estimating computer program, historical data, or regulation.

Costs:

Feasibility:	\$ 8,000
M-CACES :	<u>\$12,000</u>
Total	\$20,000

Duration: 4 Months

General Engineering Branch (ED-G)

Organization Code: B2L0800

What: Electrical Design. The study will present a preliminary design, drawings and cost estimate for the electrical equipment for lighting and power associated with the rest room facilities and additional power for use at special events.

Why: Provide supporting designs and costs to bring the project forward to the next phase, which is P&S for advertisement and construction.

Who: GS-12 Electrical Engineer
GS-09 Engineer technician

When: Upon determination of basic layout, owners desire, and use requirements.

How: By determining need and usage requirements, researching equipment, designing electrical panels, lighting circuits and power outlets to suit the needs. Written inputs, drawings and cost estimates will be provided for incorporation in the Engineering Appendix of the Feasibility Study Report.

Cost:	GS-12	Electrical Engineer - 80 Labor hours:	\$10,000
	GS-09	Engineer Technician - 20 Labor hours:	<u>\$ 2,000</u>
		Total	\$12,000

Duration: 2 Months

General Engineering Branch (ED-G)

Organization Code: B2L0800

What: Mechanical Design. The study will present a preliminary design, drawings and cost estimate for the mechanical equipment for rest rooms, water fountains and the potable water supply and sewage associated with rest room facilities. Tie-ins to existing services will be made. A small lift station may be required to pump the sewage over the Mississippi River levee.

Why: Provide supporting designs and costs to bring the project forward to the next phase, which is P&S for advertisement and construction.

Who: GS-13 Mechanical Engineer
GS-12 Mechanical Engineer
GS-09 Engineer Technician

When: Upon determination of basic layout, owners desire and use requirements.

How: By determining need and usage requirements, researching equipment, designing potable water supply and sewage tie-ins and designing pipe sizes and facilities to suit. Written inputs, drawings and cost estimates will be provided for incorporation in the Engineering Appendix of the Feasibility Study Report.

Cost:	GS-12	Mechanical Engineer - 80 Labor hours:	\$10,000
	GS-09	Engineer Technician - 20 Labor hours:	<u>\$ 2,000</u>
		Total	\$12,000

Duration: 2 Months

General Engineering Branch (ED-G)

Organization Code: B2L0800

What: Architectural Design. The study will identify public access needs including handicapped access and life safety code requirements. Determine locations and aesthetic requirements for the restroom facilities, and various features such as benches planters, and hand railing.

Why: To provide supporting designs and costs to bring the project forward to the next phase, which is P&S for advertisement and construction.

Who: GS-12 Architect

When: Upon determination of basic layout and use requirements.

How: By developing architectural requirements, plans, cost estimates, and participating in coordinating efforts with other associated disciplines. Written inputs will be provided for incorporation in the Engineering Appendix of the Feasibility Study Report.

Cost: GS-12 Architect – 24 Labor Hours \$3,000

Duration: 2 Months

General Engineering Branch (ED-G)

Organization Code: B2L0800

What: Civil Design. The study will present a preliminary design, drawings and cost estimate for the Civil/Site work for the parking lot, wharf & general wharf features, and barge impact structures.

Why: Provide supporting designs and costs to bring the project forward to the next phase, which is P&S for advertisement and construction.

Who: GS-12 Civil Engineer
GS-09 Engineer technician

When: Upon completion of survey work and geotechnical stability analysis.

How: By developing the civil/site plans, determining any critical Life Safety Code requirements, preparing the survey request, visiting the site, and performing quantity estimates. Written inputs, drawings and cost estimates will be provided for incorporation in the Engineering Appendix of the Feasibility Study Report.

Cost:	GS-12	Civil Engineer - 120 Labor Hours	\$15,000
	GS-09	Engineer Technician - 30 Labor hours	<u>\$ 3,000</u>
		Total	\$18,000

Duration: Length of Study

General Engineering Branch (ED-G)

Organization Code: B2L0800

What: Structural Design. The study will present a preliminary design, drawings and cost estimate for the structural design and analyses of the wharf structure and barge impact structures.

Why: Provide supporting designs and costs to bring the project forward to the next phase, which is P&S for advertisement and construction.

Who: GS-12 Civil Engineer
GS-11 Structural Engineer
GS-09 Engineer Technician

When: Upon completion of survey work and geotechnical stability analysis.

How: By determining loading requirements and performing feasibility scope design for the wharf and barge impact structures, researching the life safety code loading requirements. Written inputs, drawings and cost estimates will be provided for incorporation in the Engineering Appendix of the Feasibility Study Report.

Cost:	GS-12	Civil Engineer - 100 Labor Hours	\$12,500
	GS-11	Structural Engineer – 80 Labor Hours	\$10,000
	GS-09	Engineer Technician - 20 Labor hours	<u>\$ 6,000</u>
		Total	\$28,500

Duration: 4 Months

General Engineering Branch (ED-G)

Organization Code: B2L0800

What: Technical Management and Administration. The study will require coordination and direction of technical issues within Engineering Division as well as coordination with other District Elements and local interest. This will involve creation of a project network, estimating resources, and tracking progress as well as providing input to P2.

Why: To insure organization of work and direction for the PDT and monitor and track progress.

Who: GS-13 Civil Engineer (FTL or Supervisor)

When: For the duration of the design effort.

How: By creating a network of task, tracking progress and expenditures and meeting with the PDT.

Cost: GS-13 Civil Engineer - 32 Labor Hours \$4,000

Duration: Length of Study

Design Services Branch

Survey Section (ED-SS)

Organization Code: B2L0550

What: Surveys. Perform the required surveys for the West Baton Riverfront Development study requested by various Engineering Division elements and prepare plots from the data obtained. The surveys will include 19 cross-sections and a topographic map to locate utilities.

Why: Surveys will be used to develop riverfront development alternatives.

Who: GS-12 Section Chief
GS-11 Supervisor
GS-07 Survey Technician, A/E Administration Tasks
GS-05 Budget Assistant
GS-09 Civil Engineering Technician
GS-07 Civil Engineering Technician
GS-09 Survey Technician (Field)
GS-07 Survey Technician (Field)

When: When request is made for work and right-of-way is available.

How: Surveys will be performed by A/E contracts administrated by Survey Section personnel. The A/E contractor will use conventional and GPS automated survey system methods to obtain the required survey data.

Cost: ED-SS:	\$11,000
A/E Services:	<u>\$29,000</u>
Total:	\$40,000

Duration: 4 Months

Relocations Section (ED-SR)

Organization Code: B2L0510

What: At this time we have not included a relocations investigation in this estimate. If at a later time this work is found necessary the cost will be developed and added to the overall cost estimate.

Why:

Who:

When:

How:

Cost:

Duration:

Projects Engineering Section (ED-SP)

Organization Code: B2L0520

What: Prepare Engineering Appendix as required by ER 1110-2-1150 dated 31 August 1999.

Specifically, to coordinate, review, prepare and assemble input to the Engineering Appendix, including the Code of Accounts cost estimate. Develop E&D and construction schedules. Coordinate review of draft Engineering Appendix and assemble comments. Coordinate, prepare and assemble responses to all comments. Revise Engineering Appendix as required by comments. Schedule and attend meetings and field trips.

Why: To document the engineering designs and cost estimates of alternatives studied and the recommended plan.

Who: GS-12 Civil Engineer (FTL)

GS-12 Civil Engineer

GS-09 Civil Technician

GS-04 Secretary

When: Upon selection of the recommended plan.

How: Through meetings and oral, written, and electronic communications using current word-processing programs.

Cost: \$40,000

Duration: Length of Study

Projects Engineering Section (ED-SP)

Organization Code: B2L0520

What: Review of Draft Report. Coordinate review of draft feasibility report within Engineering Division.

Why: To correct errors and omissions and to upgrade data as feasible prior to submission to Division.

Who: GS-12 Civil Engineer (FTL)
GS-12 Civil Engineer
GS-09 Civil Technician
GS-04 Secretary

When: This task will be undertaken upon completion of the Draft Report.

How: Through meetings and oral, written, and electronic communication.

Cost: \$7,000

Duration: 1 Month

ENGINEERING DIVISION SUBTOTAL:

\$275,250

WEST BATON ROUGE RIVERFRONT DEVELOPMENT PROJECT MANAGEMENT PLAN

REAL ESTATE DIVISION

Local Sponsor Acquisition Branch (RE-L) & Appraisal and Planning Branch (RE-E)

Organization Codes: B2N0100 & B2N0200

What: Real Estate Obtain Right of Entry. Secure rights of entry to perform surveys, HTRW studies, environmental assessments, and cultural resource investigations.

Why: To provide legal access to sites for collecting data relative to each activity.

Who: B2N0100 GS-11 Realty Specialist
B2N0100 GS-12 Attorney
B2N0200 GS-09 Realty Specialist

When: As requested.

How: Tract Ownership Data (TOD) will be obtained from existing information, courthouse research, and/or through a TOD contract. Realty Specialist will send right-of-entry permits to the affected landowners for their signature and make follow-up contact as required. Once these are obtained, Real Estate Division then notifies the requesting district element that right of entry is available.

Time and Cost:

B2N0100 GS-11 Realty Specialist	20 man-days @ \$600/man-day = \$ 12,000
B2N0100 GS-12 Attorney	2.5 man-days @ \$680/man-day = \$ 1,700
B2N0200 GS-09 Realty Specialist	15 days @ \$480/man-day = \$ 7,200
TOD contract	<u>\$ 7,000</u>
Total:	\$ 27,900

Duration: 60 calendar days

NOTE: This estimate is based on obtaining ownership information through a contractor and obtaining permits from 50 ownerships. If the non-Federal sponsor can provide ownership information, it would reduce the cost by approximately \$14,000. If the number of ownerships is less than 50, this would also reduce this cost.

**Local Sponsor Acquisition Branch(RE-L) &
Appraisal and Planning Branch (RE-E)**
Organization Codes: B2N0100 & B2N0200

What: Real Estate Cost Estimates for Study Plans. Prepare real estate cost estimates (COA's) for alternative plan(s). Cost estimates will include value of LERRD's, acquisition, P.L. 91-646 relocation, and all hired labor charges. The scope and format of the estimate is directed by Chapter 12, ER 405-1-12, dated 1 May 1998.

Why: These costs are needed for input to the total project cost.

Who: B2N0100 GS-11 Realty Specialist
B2N0100 GS-12 Attorney

B2N0200 GS-11 Realty Specialist
B2N0200 GS-12 Appraiser

When: These estimates will be developed as requested by Planning, Programs and Project Management Division and/or Engineering Division, and on receipt of the preliminary design drawings, to include any known HTRW sites, disposal areas, staging areas, borrow areas, relocations, utilities, types of easements (w/duration), acreage, and realty interest(s) required.

How: A Realty Specialist in Appraisal and Planning Branch will research, coordinate, and compile information on the number of ownerships, local sponsor, realty interest(s) required, utilities, relocations, etc. and will furnish this information to other Real Estate Division elements to assist them in preparing their input to the COA estimate. This person will also compile the formal COA estimate(s) for Real Estate Division.

An Appraiser in Appraisal & Planning Branch will perform market research, verify comparable sales, and estimate value to prepare the LERRD's estimates.

A Realty Specialist and an Attorney in Local Sponsor Acquisition Branch – in consultation with the non-Federal Sponsor –will develop the acquisition costs based on the number of ownerships involved and other considerations. The Attorney will also estimate the cost for review of deeds, review and negotiations of the project cooperation agreement, review of rights-of-way acquisitions, condemnations, and review of real estate payments.

Time and Costs:

B2N0100 GS-11 Realty Specialist	2 man-days @\$600/man-day = \$ 1,200
B2N0100 GS-12 Attorney	5 man-days @\$680/man-day = \$ 3,400
	Sub-Total \$4,600

Duration: 30 calendar days

B2N0200 GS-11 Realty Specialist	2 man-days @ \$600/man-day = \$ 1,200
B2N0200 GS-12 Appraiser	20 man-days @ \$720/man-day = \$14,400
B2N0200 GS-13 Appraiser	2 man-days @ \$840/man-day = \$ 1,680
Travel, copies, etc.	<u>\$ 500</u>

Sub-Total \$17,780

Duration: 90 calendar days

Total: \$ 22,380

Appraisal and Planning Branch (RE-E)

Organization Codes: B2N0200

What : Functional Team Leader (FTL) Duties. Serves as the Point of Contact for Real Estate Division with the Project Manager, other District organizations, and the non-Federal sponsor. Coordinates all Real Estate activities, manages funds, attends FTL meetings, branch to branch coordination, and keeps all Real Estate point of contacts apprised of latest developments regarding the project.

Why: To keep abreast of the status and progress of the study and activities being undertaken by other elements of the District which may have an impact on Real Estate's budget, work performance, and schedules.

Who: B2N0200 GS-11 Realty Specialist

When: As necessary throughout the study.

How: Self explanatory.

Time and Cost:

B2N0200 GS-11 Realty Specialist 10 man-days @ \$600/man-day = \$ 6,000

Duration: As necessary throughout the study.

REAL ESTATE DIVISION SUBTOTAL:

\$56,280

WEST BATON ROUGE RIVERFRONT DEVELOPMENT PROJECT MANAGEMENT PLAN

OPERATIONS DIVISION

Operations Division

Organization Codes: B2R0600

What : Attend Project Team Meetings

Why: To facilitate project team performance.

Who: GS-11 or 12

When: Throughout the investigation.

How: Participate in project team meetings and meetings with the non-Federal sponsor.

Cost: \$7,500

Operations Division

Organization Codes: B2R0600

What: Participate in Plan Formulation. Assist in refining the plans developed during the reconnaissance study, and in developing additional plans necessary.

Why: To assure that the National Economic Development (NED) Plan and the locally preferred plan are identified and that the best plan, from an overall standpoint, is recommended.

Who: One GS-12 Project Manager

When: Throughout the feasibility study, prior to plan selection.

How: Plans will be investigated by the IPT to assure that a range of viable alternative plans bracketing the national Economic Development plan are developed. Plan features will be refined, to the extent practical, to minimize costs and maximize benefits. Separable project features will be identified and incrementally analyzed. Input from other District elements will be analyzed to assure that all plan features are developed to the appropriate scope; that plan features and analyses are consistent with each other; that all adverse effects of the plan that may require modifications to the project are identified; and that appropriate modifications are included in the plan. Other plans will be developed to

assure that the locally preferred plan is identified, developed, and evaluated. All plans considered will be responsive to all significant public concerns. The recommended plan will be developed through coordination with the IPT, the Project Review Board (PRB), the local Sponsor, and other interests. This includes the development, presentation, and coordination of tentative study recommendations.

Cost: \$7,500

OPERATIONS DIVISION SUBTOTAL:

\$15,000

WEST BATON ROUGE RIVERFRONT DEVELOPMENT PROJECT MANAGEMENT PLAN

CONSTRUCTION DIVISION

Construction Division

Organization Codes: B2M1000

What : Program Write-up for Feasibility Study. Develop program write up for input into the Feasibility Study.

Why: To communicate project input to other corps elements, the local sponsor, and the public.

Who: GS-11 or 12

When: Report preparation begins once plans are formulated and analyzed.

How: Report input is a product of expository writing, which presents in a detailed, clear, and logical manner an explanation of the Division's project input.

Cost: \$15,000

CONSTRUCTION DIVISION SUBTOTAL:

\$15,000

Appendix B

WORK BREAKDOWN STRUCTURE

West Baton Rouge Riverfront Development Project Management Plan

Appendix B Work Breakdown Structure

Level 1, West Baton Rouge Riverfront Development

Level 2, Major Elements of the Project

Reconnaissance Report
Feasibility Report
Plans and Specifications
Construction Contracts

Level 3, Elements Subordinate to Level 2 Major Elements

Level 3a, Elements Subordinate to Feasibility Report

- 3a. 1. Main Report
- 3a. 2. Environmental Assessment
- 3a. 3. Engineering Appendix
 - 3.1 Hydrologic and Hydraulic Analysis
 - 3.2 Geotechnical Analysis
 - 3.3 Design Analysis
 - 3.4 Structural Analysis
 - 3.5 Cost Estimates
- 3a. 4. Environmental Appendix
 - 4.1 Environmental Resources and Setting
 - 4.2 Land Use Analysis
 - 4.3 Habitat Assessment
 - 4.4 Mitigation Analysis
 - 4.5 HTRW Site Assessment
 - 4.6 Endangered Species Compliance
 - 4.7 Section 404(b)(1) Report
 - 4.8 USFWS Coordination Act Report
 - 4.9 Coastal Zone Consistency Determination
 - 4.10 Water Quality Certification

- 3a. 5. Economics Appendix
 - 5.1 Economic Analysis
 - 5.2 Financial Analysis

- 3a. 6. Real Estate Appendix
 - 6.1 Real Estate Plan
 - 6.2 Real Estate Chart of Accounts

- 3a. 7. Public Coordination Appendix
 - 7.1 Summary Report of Public Meeting
 - 7.2 Draft Report Review Comments and Responses
 - 7.3 Final Report Review Comments and Responses

- 3a. 8. Technical Review Appendix
 - 8.1 Quality Control Plan
 - 8.2 Summary of Major Comments and Responses
 - 8.3 Memorandum for Record
 - 8.4 Technical Review Certification

Appendix C

ORGANIZATIONAL BREAKDOWN STRUCTURE

**West Baton Rouge Riverfront Development
Project Study Plan
Appendix C
Organizational Breakdown Structure**

Responsible Organization	Organization Code	Office Symbol
PLANNING, PROGRAMS, AND PROJECT MANAGEMENT DIVISION		
PROJECT MANAGEMENT BRANCH – WEST	B2H4300	CEMVN-PM-W
ECONOMIC AND SOCIAL ANALYSIS BRANCH	B2H4600	CEMVN-PM-Q
General Water Resources Section	B2H4620	CEMVN-PM-AW
ENVIRONMENTAL PLANNING AND COMPLIANCE BRANCH	B2H4700	CEMVN-PM-R
Ecological Planning and Restoration Section	B2H4710	CEMVN-PM-RS
Environmental Analysis and Support Section	B2H4720	CEMVN-PM-RP
Natural/Cultural Resources Analysis Section	B2H4730	CEMVN-PM-RN
ENGINEERING DIVISION		
HYDRAULICS & HYDROLOGY BRANCH	B2L0200	CEMVN-ED-H
Hydrologic Engineering Section	B2L0240	CEMVN-ED-HH
Hydraulic Design Section	B2L0250	CEMVN-ED-HD
Hydraulic Modeling Section	B2L0260	CEMVN-ED-HM
GEOTECHNICAL BRANCH	B2L0300	CEMVN-ED-F
Dams, Levees, & Channel Slopes Section	B2L0340	CEMVN-ED-FD
Geology Section	B2L0350	CEMVN-ED-FG
CIVIL ENGINEERING BRANCH	B2L0400	CEMVN-ED-L
Levees Section	B2L0440	CEMVN-ED-LS
DESIGN SERVICES BRANCH	B2L0500	CEMVN-ED-S
Relocations Section	B2L0510	CEMVN-ED-SR
Projects Engineering Section	B2L0520	CEMVN-ED-SP
Survey Section	B2L0550	CEMVN-ED-SS
COST ENGINEERING BRANCH	B2L0600	CEMVN-ED-C
ENGINEERING CONTROL BRANCH	B2L0700	CEMVN-ED-E
GENERAL ENGINEERING BRANCH	B2L0800	CEMVN-ED-G
STRUCTURES BRANCH	B2L0900	CEMVN-ED-T
Flood Control Structures Section	B2L0920	CEMVN-ED-TF
REAL ESTATE DIVISION		
ACQUISITION BRANCH	B2N0100	CEMVN-RE-A
APPRAISAL BRANCH	B2N0200	CEMVN-RE-E

**West Baton Rouge Riverfront Development
Project Study Plan
Appendix C
Organizational Breakdown Structure
(Continued)**

Responsible Organization	Organization Code	Office Symbol
OPERATIONS DIVISION		
READINESS BRANCH	B2R0600	CEMVN-OD-R
CONSTRUCTION DIVISION		
COST ENGINEERING BRANCH	B2M1000 B2L0600	CEMVN-CD CEMVN-ED-C
OTHER AGENCIES		
U.S. Fish & Wildlife Service	USFWS	
IDIQ CONTRACTOR	None	None

Appendix D

RESPONSIBILITY ASSIGNMENT MATRIX

**West Baton Rouge Riverfront Development
Project Management Plan
Appendix D
Responsibility Assignment Matrix**

Product (in Bold Print) Responsible Organization	Organization Code	Office Symbol
Main Report Project Management Branch – West	B2H4300	CEMVN-PM-W
Environmental Assessment Ecological Planning and Restoration Section	B2H4710	CEMVN-PM-RS
Environmental Analysis and Support Section	B2H4720	CEMVN-PM-RP
Natural/Cultural Resources Analysis Section	B2H4730	CEMVN-PM-RN
Engineering Appendix Projects Engineering Section	B2L0520	CEMVN-ED-SP
H&H Analysis Report Hydraulic & Hydrologic Branch	B2L0240	CEMVN-ED-H
Geotechnical Analysis Report Geotechnical Branch	B2L0300	CEMVN-ED-F
Design Analysis Report General Engineering Branch	B2L0800	CEMVN-ED-G
Structural Analysis Design Services Branch	B2L0500	CEMVN-ED-S
Cost Estimates Cost Engineering Branch	B2L0600	CEMVN-ED-C
<u>Environmental Appendix</u> Environmental Resources and Setting Ecological Planning and Restoration Section	B2H4710	CEMVN-PM-RS
Natural/Cultural Resources Analysis Section	B2H4730	CEMVN-PM-RN
Land Use Analysis Natural/Cultural Resources Analysis Section	B2H4730	CEMVN-PM-RN
Habitat Assessment Ecological Planning and Restoration Section	B2H4710	CEMVN-PM-RS
U.S. Fish & Wildlife Service		USFWS
Mitigation Analysis Ecological Planning and Restoration Section	B2H4710	CEMVN-PM-RS
HTRW Initial Site Assessment Environmental Analysis and Support Section	B2H4720	CEMVN-PM-RP
Endangered Species Compliance Ecological Planning and Restoration Section	B2H4710	CEMVN-PM-RS

**West Baton Rouge Riverfront Development
Project Management Plan
Appendix D
Responsibility Assignment Matrix
(Continued)**

Product (in Bold Print)	Organization	Office Symbol
Responsible Organization	Code	
Section 404 (b) (1) Report		
Ecological Planning and Restoration Section	B2H4710	CEMVN-PM-RS
Hydraulic Modeling Section	B2L0260	CEMVN-ED-HM
USFWS Coordination Act Report		
U.S. Fish & Wildlife Service		USFWS
Ecological Planning and Restoration Section	B2H4710	CEMVN-PM-RS
Coastal Zone Consistency Determination		
Ecological Planning and Restoration Section	B2H4710	CEMVN-PM-RS
Water Quality Certification		
Ecological Planning and Restoration Section	B2H4710	CEMVN-PM-RS
<u>Economic Appendix</u>		
Economic Analysis		
General Water Resources Section	B2H4620	CEMVN-PW-AW
Financial Analysis		
General Water Resources Section	B2H4620	CEMVN-PW-AW
<u>Real Estate Appendix</u>		
Real Estate Plan		
Local Sponsor Acquisition Branch	B2N0100	CEMVN-RE-L
Appraisal and Planning Branch	B2N0200	CEMVN-RE-E
Real Estate Chart of Accounts		
Appraisal Branch	B2N0200	CEMVN-RE-E
<u>Public Coordination Appendix</u>		
Public Views and Responses		
Project Management Branch – West	B2H4300	CEMVN-PM-W
Ecological Planning and Restoration Section	B2H4710	CEMVN-PM-RS

**West Baton Rouge Riverfront Development
Project Management Plan
Appendix D
Responsibility Assignment Matrix
(Continued)**

Product (in Bold Print)	Organization	Office
Responsible Organization	Code	Symbol
<u>Technical Review Appendix</u>		
Quality Control Plan		
Project Management Branch – West	B2H4300	CEMVN-PM-W
Summary of Comments & Responses		
Project Management Branch – West	B2H4300	CEMVN-PM-W
Memorandum for Record		
Project Management Branch – West	B2H4300	CEMVN-PM-W
Technical Review Certification		
Project Management Branch – West	B2H4300	CEMVN-PM-W

Appendix E

BASELINE COST ESTIMATES

**West Baton Rouge Riverfront Development
Feasibility Study
Project Management Plan
Appendix E - Baseline Cost Estimate**

Source Code	Office Symbol	Activity	Incremental Cost		
			Federal	Non-Federal	Total
PLAN, PROGRAMS, & PROJECT MANAGEMENT DIVISION					
Project Management Branch--West					
B2H4300	PM-W-100	Supervision	7,000	7,000	14,000
B2H4300	PM-W-100	Public Involvement	23,000	23,000	46,000
B2H4300	PM-W-100	Plan Formulation	17,500	17,500	35,000
B2H4300	PM-W-100	Study Management	10,000	10,000	20,000
B2H4300	PM-W-110	Report Preparation	12,500	12,500	25,000
B2H4300	PM-W-120	Budget Preparation	5,000	5,000	10,000
Total - Project Management Branch--West			75,000	75,000	150,000
Economic and Social Analysis Branch					
B2H4620	PD-AW	Net Benefits and Optimization Analyses	15,000	15,000	30,000
B2H4620	PD-AW	Conduct Financial Analysis	3,000	3,000	6,000
B2H4620	PD-AW	Study Coordination and Preparation of Report	7,000	7,000	14,000
Total - Economic and Social Analysis			25,000	25,000	50,000
Ecological Planning and Restoration Section					
<u>Task # PM-R1: Prepare Draft EA</u>					
B2H4710	PM-RS	Develop and Describe Proposed Action and Alternatives	182	182	363
B2H4710	PM-RS	Determine Environmental Setting and Significant Resources	182	182	363
B2H4710	PM-RS	Determine Most Probable Future	182	182	363
B2H4710	PM-RS	Determine Impacts of Alternative Plans	363	363	725
B2H4710	PM-RS	Prepare Mitigation Plan	0	0	0
B2H4710	PM-RS	Complete Preliminary Draft EA for Review	725	725	1,450
B2H4710	PM-RS	Complete DEA and Draft FONSI	182	182	363
B2H4710	PM-RS	Attend Project Team Meetings	4,000	4,000	8,000
<u>Task # PM-R2: Other Environmental Laws</u>					
B2H4710	PM-RS	Prepare 404(B)(1) Evaluation	363	363	725
B2H4710	PM-RS	Prepare 404(B)(1) Public Notice	182	182	363

Source Code	Office Symbol	Activity	Incremental Cost		
			Federal	Non-Federal	Total
B2H4710	PM-RS	Place Ad in Local Newspaper	100	100	200
B2H4710	PM-RS	Obtain Water Quality Certification From LDEQ	91	91	181
B2H4710	PM-RS	Conduct Endangered Species and Essential Fish Habitat Coordination	91	91	181
B2H4710	PM-RS	Prepare Coastal Zone Consistency Determination	0	0	0
B2H4710	PM-RS	Conduct Air Quality Determination	109	109	218
		<u>Task # PM-R7: Technical Review</u>			
B2H4710	PM-RS	Technical Review Checklist			
		<u>Task # PM-R8: Public Review</u>			
B2H4710	PM-RS	Prepare Transmittal Letters and Mail Documents for Public Review	174	174	348
		<u>Task # PM-R9: Feasibility Report Write-Up</u>			
B2H4710	PM-RS	Provide Feasibility Report Input	5,000	5,000	10,000
		<u>Task # PM-R10: Prepare Final EA & FONSI</u>			
B2H4710	PM-RS	Respond to Comments on DEA	91	91	181
B2H4710	PM-RS	Revise FONSI for Signature	91	91	181
B2H4710	PM-RS	Attend Project Team and Interagency Meetings	91	91	181
B2H4710	PM-RS	Prepare PCA Checklist Memo	91	91	181
Total - Ecological Planning and Restoration Section			12,284	12,284	24,567
Natural Resources and Cultural Resources Section					
		<u>Task # PM-R4: Cultural Resources Write-up</u>			
B2H4730	PM-RN	Prepare and Manage Land-use History Contract	700	700	1,400
B2H4730	PM-RN	Cultural Resource Evaluation	350	350	700
B2H4730	PM-RN	Preparation and Management of Cultural Resource Contract	700	700	1,400
B2H4730	PM-RN	Cultural Resource Write-up and Coordination	700	700	1,400
B2H4730	PM-RN	Land-use History Contract	5,000	5,000	10,000
B2H4730	PM-RN	Cultural Resource Survey and Technical Report Contract	17,500	17,500	35,000
		<u>Task # PM-R5: Recreation and Aesthetic Write-up</u>			
B2H4730	PM-RN	Prepare Recreation Input	1,575	1,575	3,150
B2H4730	PM-RN	Preparation and Management of Recreational Resource Contract	1,575	1,575	3,150
B2H4730	PM-RN	Prepare Evaluation of Aesthetics	1,575	1,575	3,150
B2H4730	PM-RN	Recreational Resources Survey and Technical Report Contract	10,000	10,000	20,000
Total - Natural Resources and Cultural Resources Section			39,675	39,675	79,350

Environmental Analysis and Support Section

Source Code	Office Symbol	Activity	Incremental Cost		
			Federal	Non-Federal	Total
<i>Task # PM-R6: HTRW Write-up</i>					
B2H4720	PM-RP	HTRW Initial Site Assessment	613	613	1,225
B2H4720	PM-RP	HTRW Investigation	2,800	2,800	5,600
Total - Environmental Analysis and Support Section			3,413	3,413	6,825
Total - Ecological Planning and Restoration Section			12,284	12,284	24,567
Total - Natural Resources and Cultural Resources Section			39,675	39,675	79,350
Total - Environmental Planning and Compliance Branch			55,371	55,371	110,742
Total--Project Management Branch--West			75,000	75,000	150,000
Total-Economic and Social Analysis Branch			25,000	25,000	50,000
TOTAL-PLAN, PROGRAMS, & PROJECT MANAGEMENT DIVISION			155,371	155,371	310,742
ENGINEERING DIVISION					
B2L0000	ED	Engineering Division Technical Management	1,500	1,500	3,000
B2L0000	ED	Engineering Division Technical Review	5,000	5,000	10,000
B2L0000	ED	CADD Licensing	500	500	1,000
B2L0000	ED	Value Engineering Study	2,500	2,500	5,000
Total - Engineering Management			9,500	9,500	19,000
Engineering Control Branch					
B2L0700	ED-E	Financial Management	750	750	1,500
Total - Engineering Control Branch			750	750	1,500
Hydraulics and Hydrologic Branch					
B2L0240	ED-HH	Climatology	1,500	1,500	3,000
B2L0250	ED-HD	Provide Project Flood Flow Line Design Elevations	2,500	2,500	5,000
B2L0260	ED-HM	Water Quality Assessment (not found to be necessary at this time)	0	0	0
Total - Hydraulics and Hydrologic Branch			4,000	4,000	8,000
Geotechnical Branch					
B2L0350	ED-FG	Drill and Process Borings	12,225	12,225	24,450
B2L0340	ED-FD	Conduct Bank Stability Analysis	10,000	10,000	20,000
B2L0340	ED-FD	Provide Pile Capacities for Wharf Structure	5,000	5,000	10,000

Source Code	Office Symbol	Activity	Incremental Cost		
			Federal	Non-Federal	Total
B2L0340	ED-FD	Attend In-house Meetings	1,200	1,200	2,400
Total - Geotechnical Branch			28,425	28,425	56,850
Civil Engineering Branch					
B2L0400	ED-LS	Review Designs	1,500	1,500	3,000
B2L0400	ED-LS	Attend In-house Meetings	1,200	1,200	2,400
Total - Civil Engineering			2,700	2,700	5,400
Cost Engineering Branch					
B2L0600	ED-C	Prepare Cost Estimates	10,000	10,000	20,000
Total - Cost Engineering			10,000	10,000	20,000
General Engineering Branch					
B2L0800	ED-G	Electrical Design	6,000	6,000	12,000
B2L0800	ED-G	Mechanical Design	6,000	6,000	12,000
B2L0800	ED-G	Architectural Design	1,500	1,500	3,000
B2L0800	ED-G	Civil Design	9,000	9,000	18,000
B2L0800	ED-G	Structural Design	14,250	14,250	28,500
B2L0800	ED-G	Technical Management and Administration	2,000	2,000	4,000
Total - Geotechnical Branch			38,750	38,750	77,500
Design Services Branch					
B2L0550	ED-SS	Perform Required Surveys	20,000	20,000	40,000
B2L0510	ED-SR	Relocation (not found to be necessary at this time)	0	0	0
B2L0520	ED-SP	Prepare Engineering Appendix	20,000	20,000	40,000
B2L0520	ED-SP	Review of Draft Report	3,500	3,500	7,000
Total - Design Services			43,500	43,500	87,000
TOTAL - ENGINEERING DIVISION			137,625	137,625	275,250
REAL ESTATE DIVISION					
B2N0100	RE-F	Obtain Rights-of-Entry	13,950	13,950	27,900
B2N0100	RE-F	Prepare Real Estate Cost Estimates for Study Plans	11,190	11,190	22,380

Source Code	Office Symbol	Activity	Incremental Cost		
			Federal	Non-Federal	Total
B2N0100	RE-F	Functional Team Leader (FTL) Duties	3,000	3,000	6,000
TOTAL - REAL ESTATE DIVISION			28,140	28,140	56,280
OPERATIONS DIVISION					
B2R0600	OD-R	Attend Project Team Meetings	3,750	3,750	7,500
B2R0600	OD-R	Participate in Plan Formulation	3,750	3,750	7,500
TOTAL - OPERATIONS DIVISION			7,500	7,500	15,000
CONSTRUCTION DIVISION					
B2M1000	CD	Program Write-up for Feasibility Study	7,500	7,500	15,000
TOTAL - CONSTRUCTION DIVISION			7,500	7,500	15,000
TOTAL- PLAN, PROGRAMS, & PROJECT MANAGEMENT DIVISION			155,371	155,371	310,742
TOTAL - ENGINEERING DIVISION			137,625	137,625	275,250
TOTAL - REAL ESTATE DIVISION			28,140	28,140	56,280
TOTAL - OPERATIONS DIVISION			7,500	7,500	15,000
TOTAL - CONSTRUCTION DIVISION			7,500	7,500	15,000
SUBTOTAL			336,136	336,136	672,272
CONTINGENCY (15 Percent)			51,364	51,364	102,728
ESTIMATED TOTAL STUDY COSTS			387,500	387,500	775,000

Appendix F

P2 PRELIMINARY SCHEDULE

Appendix G

ESCROW AGREEMENT

**FEASIBILITY COST
SHARE AGREEMENT
(Marked-Up)**

AGREEMENT
BETWEEN THE DEPARTMENT OF THE ARMY
AND
THE ~~[SPONSOR]~~ CITY OF PORT ALLEN, LOUISIANA
FOR THE ~~[FEASIBILITY STUDY NAME]~~ WEST BATON ROUGE RIVERFRONT
DEVELOPMENT STUDY

THIS AGREEMENT is entered into this _____ day, of _____, 19__, by and between the Department of the Army (hereinafter the "Government"), represented by the District Engineer executing this Agreement, and the ~~[SPONSOR NAME]~~ Mayor of Port Allen, Louisiana (hereinafter the "Sponsor"),

WITNESSETH, that

WHEREAS, the Congress (Senate and/or House Committees) has authorized ~~[OR requested]~~ the ~~[INSERT APPROPRIATE ENTITY BASED ON PUBLIC LAW OR STUDY RESOLUTION]~~ United States Army Corps of Engineers to conduct a study of ~~[QUOTE LANGUAGE OF PUBLIC LAW OR STUDY RESOLUTION]~~ Riverfront Development in West Baton Rouge, Louisiana pursuant to ~~[CITE PUBLIC LAW OR STUDY RESOLUTION]~~ the authority provided by Section 517 of the Water Development Act of 1999; and

~~[FOR A CONTINUING AUTHORITIES PROGRAM (CAP) STUDY, INSERT THE FOLLOWING IN LIEU OF THE ABOVE "WHEREAS": WHEREAS, the Congress has authorized the [INSERT APPROPRIATE ENTITY BASED ON CONTINUING AUTHORITY] to conduct studies of [IDENTIFY PURPOSE] pursuant to the authority provided by [CITE APPROPRIATE CONTINUING AUTHORITY]; and]~~

WHEREAS, the U.S. Army Corps of Engineers has conducted a reconnaissance study of ~~[QUOTE LANGUAGE OF PUBLIC LAW OR STUDY RESOLUTION RELEVANT TO THE PROBLEM OR, FOR A CAP STUDY, CITE SPECIFIC PROBLEM AND LOCATION OF STUDY]~~ Riverfront Development in West Baton Rouge Parish, Louisiana along the Mississippi River pursuant to this authority, and has determined that further study in the nature of a "Feasibility Phase Study" (hereinafter the "Study") is required to fulfill the intent of the study authority and to assess the extent of the Federal interest in participating in a solution to the identified problem; and

WHEREAS, Section 105 of the Water Resources Development Act of 1986 (Public Law 99-662, as amended) specifies the cost sharing requirements applicable to the Study;

WHEREAS, the Sponsor has the authority and capability to furnish the cooperation hereinafter set forth and is willing to participate in study cost sharing and financing in accordance with the terms of this Agreement; and

WHEREAS, the Sponsor and the Government understand that entering into this Agreement in no way obligates either party to implement a project and that whether the Government supports a project authorization and budgets it for implementation depends upon, among other things, the outcome of the Study and whether the proposed solution is consistent with the Economic and Environmental Principles and Guidelines for Water and Related Land Resources Implementation

Studies and with the budget priorities of the Administration;

NOW THEREFORE, the parties agree as follows:

ARTICLE I - DEFINITIONS

For the purposes of this Agreement:

A. The term "Study Costs" shall mean all disbursements by the Government pursuant to this Agreement, from Federal appropriations or from funds made available to the Government by the Sponsor, and all negotiated costs of work performed by the Sponsor pursuant to this Agreement. Study Costs shall include, but not be limited to: labor charges; direct costs; overhead expenses; supervision and administration costs; the costs of participation in Study Management and Coordination in accordance with Article IV of this Agreement; the costs of contracts with third parties, including termination or suspension charges; and any termination or suspension costs (ordinarily defined as those costs necessary to terminate ongoing contracts or obligations and to properly safeguard the work already accomplished) associated with this Agreement.

B. The term "estimated Study Costs" shall mean the estimated cost of performing the Study as of the effective date of this Agreement, as specified in Article III.A. of this Agreement.

C. The term "excess Study Costs" shall mean Study Costs that exceed the estimated Study Costs and that do not result from mutual agreement of the parties, a change in Federal law that increases the cost of the Study, or a change in the scope of the Study requested by the Sponsor.

D. The term "study period" shall mean the time period for conducting the Study, commencing with the release to the U.S. Army Corps of Engineers ~~_____~~ New Orleans District of initial Federal feasibility funds following the execution of this Agreement and ending with the Chief of Engineers' acceptance of the study. ~~when the Assistant Secretary of the Army (Civil Works) submits the feasibility report to the Office of Management and Budget (OMB) for review for consistency with the policies and programs of the President. [FOR A CAP STUDY, REPLACE ALL AFTER THE WORD "AGREEMENT" WITH THE FOLLOWING: "AND ENDING WITH THE CHIEF OF ENGINEERS' ACCEPTANCE OF THE STUDY.]~~

E. The term "PSPMP" shall mean the Project Study Management Plan, which is attached to this Agreement and which shall not be considered binding on either party and is subject to change by the Government, in consultation with the Sponsor.

F. The term "negotiated costs" shall mean the costs of in-kind services to be provided by the Sponsor in accordance with the PSPMP.

G. The term "fiscal year" shall mean one fiscal year of the Government. The Government fiscal year begins on October 1 and ends on September 30.

ARTICLE II - OBLIGATIONS OF PARTIES

A. The Government, using funds and in-kind services provided by the Sponsor and funds appropriated by the Congress of the United States, shall expeditiously prosecute and complete the Study, in accordance with the provisions of this Agreement and Federal laws, regulations, and policies.

B. In accordance with this Article and Article III.A., III.B. and III.C. of this Agreement, the Sponsor shall contribute cash and in-kind services equal to fifty (50) percent of Study Costs other than excess Study Costs. The Sponsor may, consistent with applicable law and regulations, contribute up to ~~25-50~~ percent of Study Costs through the provision of in-kind services. The in-kind services to be provided by the Sponsor, the estimated negotiated costs for those services, and the estimated schedule under which those services are to be provided are specified in the PSP. Negotiated costs shall be subject to an audit by the Government to determine reasonableness, allocability, and allowability.

C. The Sponsor shall pay a fifty (50) percent share of excess Study Costs in accordance with Article III.D. of this Agreement.

D. The Sponsor understands that the schedule of work may require the Sponsor to provide cash or in-kind services at a rate that may result in the Sponsor temporarily diverging from the obligations concerning cash and in-kind services specified in paragraph B. of this Article. Such temporary divergences shall be identified in the quarterly reports provided for in Article III.A. of this Agreement and shall not alter the obligations concerning costs and services specified in paragraph B. of this Article or the obligations concerning payment specified in Article III of this Agreement.

E. If, upon the award of any contract or the performance of any in-house work for the Study by the Government or the Sponsor, cumulative financial obligations of the Government and the Sponsor would result in excess Study Costs, the Government and the Sponsor agree to defer award of that and all subsequent contracts, and performance of that and all subsequent in-house work, for the Study until the Government and the Sponsor agree to proceed. Should the Government and the sponsor require time to arrive at a decision, the Agreement will be suspended in accordance with Article X., for a period of not to exceed six months. In the event the Government and the sponsor have not reached an agreement to proceed by the end of their 6 month period, the Agreement may be subject to termination in accordance with Article X.

F. No Federal funds may be used to meet the Sponsor's share of Study Costs unless the Federal granting agency verifies in writing that the expenditure of such funds is expressly authorized by statute.

G. The award and management of any contract with a third party in furtherance of this Agreement which obligates Federal appropriations shall be exclusively within the control of the Government. The award and management of any contract by the Sponsor with a third party in furtherance of this Agreement which obligates funds of the Sponsor and does not obligate Federal appropriations shall be exclusively within the control of the Sponsor, but shall be subject to applicable Federal laws and regulations.

~~[USE PARAGRAPH H. WHEN, IAW ER 1165-2-132, THE RECONNAISSANCE REPORT DETERMINES THAT THERE IS A POTENTIAL FOR HTRW CONCERNS REGARDING LANDS THAT MAY BE NECESSARY FOR THE PROJECT]~~

~~H. The Sponsor shall be responsible for the total cost of developing a response plan for addressing any hazardous substances regulated under the Comprehensive Environmental Response, Compensation and Liability Act of 1980, Pub. L. No. 96-510, 94 Stat. 2767, (codified at 42 U.S.C. Sections 9601-9675), as amended, existing in, on, or under any lands, easements or~~

~~rights-of-way that the Government determines to be required for the construction, operation, and maintenance of the project. Such costs shall not be included in total study costs.~~

ARTICLE III - METHOD OF PAYMENT

A. The Government shall maintain current records of contributions provided by the parties, current projections of Study Costs, current projections of each party's share of Study Costs, and current projections of the amount of Study Costs that will result in excess Study Costs. At least quarterly, the Government shall provide the Sponsor a report setting forth this information. As of the effective date of this Agreement, estimated Study Costs are \$~~_____~~\$775,000 and the Sponsor's share of estimated Study Costs is \$~~_____~~\$387,500. In order to meet the Sponsor's cash payment requirements for its share of estimated Study Costs, the Sponsor must provide a cash contribution currently estimated to be \$~~_____~~\$387,500 ~~[EQUAL TO THE SPONSOR'S SHARE LESS THE VALUE OF IN-KIND SERVICES TO BE PROVIDED BY THE SPONSOR]~~. The dollar amounts set forth in this Article are based upon the Government's best estimates, which reflect the scope of the study described in the PSP, projected costs, price-level changes, and anticipated inflation. Such cost estimates are subject to adjustment by the Government and are not to be construed as the total financial responsibilities of the Government and the Sponsor.

~~[USE OPTION I (PARAGRAPH B) IF ALL REQUIRED FUNDS ARE TO BE PROVIDED BY THE SPONSOR AT THE BEGINNING OF THE STUDY, OTHERWISE, USE OPTION II (PARAGRAPH B)]~~

~~OPTION I~~

~~B. The Sponsor shall provide its cash contribution required under Article II.B. of this Agreement in accordance with the following provisions:~~

~~1. No later than [AT LEAST 30] calendar days prior to the scheduled date for the Government's issuance of the solicitation for the first contract for the Study or for the Government's anticipated first significant in-house expenditure for the Study, the Government shall notify the Sponsor in writing of the funds the Government determines to be required from the Sponsor to meet its share of Study Costs. No later than [HALF THE ABOVE NUMBER] calendar days thereafter, the Sponsor shall provide the Government the full amount of the required funds by delivering a check payable to "FAO, USAED, [APPROPRIATE USACE DISTRICT]" to the District Engineer.~~

~~2. The Government shall draw from the funds provided by the Sponsor such sums as the Government deems necessary to cover the Sponsor's share of contractual and in-house financial obligations attributable to the Study as they are incurred.~~

~~3. In the event the Government determines that the Sponsor must provide additional funds to meet its share of Study Costs, the Government shall so notify the Sponsor in writing. No later than [NORMALLY 60] calendar days after receipt of such notice, the Sponsor shall provide the Government with a check for the full amount of the additional required funds.~~

OPTION II

B. The Sponsor shall provide its cash contribution required under Article II.B. of this Agreement in accordance with the following provisions:

1. For purposes of budget planning, the Government shall notify the Sponsor by ~~[SPECIFIC DATE]~~ August 31 of each year of the estimated funds that will be required from the Sponsor to meet the Sponsor's share of Study Costs for the upcoming fiscal year.

2. No later than ~~[30-60]~~ 60 calendar days prior to the scheduled date for the Government's issuance of the solicitation for the first contract for the Study or for the Government's anticipated first significant in-house expenditure for the Study, the Government shall notify the Sponsor in writing of the funds the Government determines to be required from the Sponsor to meet its required share of Study Costs for the first fiscal year of the Study. No later than ~~[HALF THE ABOVE NUMBER]~~ 30 calendar days thereafter, the Sponsor shall ~~[SELECT ONE OF THE FOLLOWING MECHANISMS: [1]~~ provide the Government the full amount of the required funds by delivering a check payable to "FAO-B2, USAED, ~~[APPROPRIATE USACE DISTRICT]~~" to the District Engineer. ~~[2] verify to the satisfaction of the Government that the Sponsor has deposited the required funds in an escrow or other account acceptable to the Government, with interest accruing to the Sponsor. [3] present to the Government an irrevocable letter of credit acceptable to the Government for the required funds.]~~

3. For the second and subsequent fiscal years of the Study, the Government shall, no later than 60 calendar days prior to the beginning of the fiscal year, notify the Sponsor in writing of the funds the Government determines to be required from the Sponsor to meet its required share of Study Costs for that fiscal year, taking into account any temporary divergences identified under Article II.D of this Agreement. No later than 30 calendar days prior to the beginning of the fiscal year, the Sponsor shall make the full amount of the required funds available to the Government through the funding mechanism specified in paragraph B.2. of this Article.

4. The Government shall draw from the ~~[INDICATE MECHANISM: [1]~~ funds ~~[2] escrow or other account [3] letter of credit]~~ provided by the Sponsor such sums as the Government deems necessary to cover the Sponsor's share of contractual and in-house fiscal obligations attributable to the Study as they are incurred.

5. In the event the Government determines that the Sponsor must provide additional funds to meet its share of Study Costs, the Government shall so notify the Sponsor in writing. No later than ~~[NORMALLY 60]~~ 60 calendar days after receipt of such notice, the Sponsor shall make the full amount of the additional required funds available through the funding mechanism specified in paragraph B.2. of this Article.

~~[USE PARAGRAPH C WITH EITHER OPTION I OR II]~~

C. Within ninety (90) days after the conclusion of the Study Period or termination of this Agreement, the Government shall conduct a final accounting of Study Costs, including disbursements by the Government of Federal funds, cash contributions by the Sponsor, the amount of any excess Study Costs, and credits for the negotiated costs of the Sponsor, and shall furnish the Sponsor with the results of this accounting. Within thirty (30) days thereafter, the

Government, subject to the availability of funds, shall reimburse the Sponsor for the excess, if any, of cash contributions and credits given over its required share of Study Costs, other than excess Study Costs, or the Sponsor shall provide the Government any cash contributions required for the Sponsor to meet its required share of Study Costs other than excess Study Costs.

D. The Sponsor shall provide its cash contribution for excess Study Costs as required under Article II.C. of this Agreement by delivering a check payable to "FAO-~~B2, USAED, [APPROPRIATE USACE DISTRICT]~~" to the District Engineer as follows:

1. After the project that is the subject of this Study has been authorized for construction, no later than the date on which a Project Cooperation Agreement is entered into for the project; or

2. In the event the project that is the subject of this Study is not authorized for construction by a date that is no later than 5 years of the date of the final report of the Chief of Engineers concerning the project, or by a date that is no later than 2 years after the date of the termination of the study, the Sponsor shall pay its share of excess costs on that date (5 years after the date of the Chief of Engineers or 2 year after the date of the termination of the study).

ARTICLE IV - STUDY MANAGEMENT AND COORDINATION

~~A. A-~~ To provide for consistent and effective communication, the Sponsor and the Government shall appoint named senior representatives to an Executive Committee. ~~[THE EXECUTIVE COMMITTEE SHALL NORMALLY INCLUDE THE DISTRICT'S CHIEF, PLANNING DIVISION, AND THEIR COUNTERPARTS FROM THE SPONSOR.]~~

For the Sponsor:

Mayor, Port Allen
750 North Jefferson Ave
West Baton Rouge Parish
Port Allen, LA 70767

For the Government:

Deputy District Engineer for Project
Management
CEMVN-PM
P.O. Box 60267
New Orleans, LA 70160

Thereafter, the Executive Committee shall meet regularly until the end of the Study Period.

B. Until the end of the Study Period, the Executive Committee shall generally oversee the Study consistently with the PSPMP.

C. The Executive Committee may make recommendations that it deems warranted to the District Engineer on matters that it oversees, including suggestions to avoid potential sources of dispute. The Government in good faith shall consider such recommendations. The Government has the discretion to accept, reject, or modify the Executive Committee's recommendations.

D. The Executive Committee shall appoint representatives to serve on a Study Management Team. The Study Management Team shall keep the Executive Committee informed of the progress of the Study and of significant pending issues and actions, and shall prepare periodic reports on the progress of all work items identified in the PSPMP.

E. The costs of participation in the Executive Committee (including the cost to serve on the Study Management Team) shall be included in total project costs and cost shared in accordance with the provisions of this Agreement.

ARTICLE V - DISPUTES

As a condition precedent to a party bringing any suit for breach of this Agreement, that party must first notify the other party in writing of the nature of the purported breach and seek in good faith to resolve the dispute through negotiation. If the parties cannot resolve the dispute through negotiation, they may agree to a mutually acceptable method of non-binding alternative dispute resolution with a qualified third party acceptable to both parties. The parties shall each pay 50 percent of any costs for the services provided by such a third party as such costs are incurred. Such costs shall not be included in Study Costs. The existence of a dispute shall not excuse the parties from performance pursuant to this Agreement.

ARTICLE VI - MAINTENANCE OF RECORDS

A. Within 60 days of the effective date of this Agreement, the Government and the Sponsor shall develop procedures for keeping books, records, documents, and other evidence pertaining to costs and expenses incurred pursuant to this Agreement to the extent and in such detail as will properly reflect total Study Costs. These procedures shall incorporate, and apply as appropriate, the standards for financial management systems set forth in the Uniform Administrative Requirements for Grants and Cooperative Agreements to state and local governments at 32 C.F.R. Section 33.20. The Government and the Sponsor shall maintain such books, records, documents, and other evidence in accordance with these procedures for a minimum of three years after completion of the Study and resolution of all relevant claims arising therefrom. To the extent permitted under applicable Federal laws and regulations, the Government and the Sponsor shall each allow the other to inspect such books, documents, records, and other evidence.

B. In accordance with 31 U.S.C. Section 7503, the Government may conduct audits in addition to any audit that the Sponsor is required to conduct under the Single Audit Act of 1984, 31 U.S.C. Sections 7501-7507. Any such Government audits shall be conducted in accordance with Government Auditing Standards and the cost principles in OMB Circular No. A-87 and other applicable cost principles and regulations. The costs of Government audits shall be included in total Study Costs and shared in accordance with the provisions of this Agreement.

ARTICLE VII - RELATIONSHIP OF PARTIES

The Government and the Sponsor act in independent capacities in the performance of their respective rights and obligations under this Agreement, and neither is to be considered the officer, agent, or employee of the other.

ARTICLE VIII - OFFICIALS NOT TO BENEFIT

No member of or delegate to the Congress, nor any resident commissioner, shall be admitted to any share or part of this Agreement, or to any benefit that may arise therefrom.

ARTICLE IX - FEDERAL AND STATE LAWS

In the exercise of the Sponsor's rights and obligations under this Agreement, the Sponsor agrees to comply with all applicable Federal and State laws and regulations, including Section 601 of Title VI of the Civil Rights Act of 1964 (Public Law 88-352) and Department of Defense Directive 5500.11 issued pursuant thereto and published in 32 C.F.R. Part 195, as well as Army Regulations 600-7, entitled "Nondiscrimination on the Basis of Handicap in Programs and Activities Assisted or Conducted by the Department of the Army".

ARTICLE X - TERMINATION OR SUSPENSION

A. This Agreement shall terminate at the conclusion of the Study Period, and neither the Government nor the Sponsor shall have any further obligations hereunder, except as provided in Article III.C.; provided, that prior to such time and upon thirty (30) days written notice, either party may terminate or suspend this Agreement. In addition, the Government shall terminate this Agreement immediately upon any failure of the parties to agree to extend the study under Article II.E. of this agreement, or upon the failure of the sponsor to fulfill its obligation under Article III. of this Agreement. In the event that either party elects to terminate this Agreement, both parties shall conclude their activities relating to the Study and proceed to a final accounting in accordance with Article III.C. and III.D. of this Agreement. Upon termination of this Agreement, all data and information generated as part of the Study shall be made available to both parties.

B. Any termination of this Agreement shall not relieve the parties of liability for any obligations previously incurred, including the costs of closing out or transferring any existing contracts.

IN WITNESS WHEREOF, the parties hereto have executed this Agreement, which shall become effective upon the date it is signed by the District Engineer for the U.S. Army Corps of Engineers, ~~New Orleans~~ District.

DEPARTMENT OF THE ARMY

~~[SPONSOR]~~ CITY OF PORT ALLEN

BY _____
Colonel, Corps of Engineers
District Engineer
 ~~New Orleans~~ District

BY _____
~~(Title)~~ Mayor, City of Port Allen

LETTER OF INTENT



May 5, 2004

OFFICE OF THE MAYOR
Marilyn "Lynn" B. Robertson
Mayor

Colonel Peter J. Rowan
District Engineer
New Orleans District
U.S. Army Corps of Engineers
Post Office Box 60267
New Orleans, LA 70160-0267

Dear Colonel Rowan:

This is to advise you that the City of Port Allen intends to serve as the local sponsor for the West Baton Rouge Riverfront Development project, a study authorized through Sections 517 of the Water Resources Development Act (WBDA) of 1999.

We understand that the Corps of Engineers received funding to advance the WRDA 1999 directive to complete a justification report and 905 (b) Analysis. If the study indicates a feasible solution, our objective will be to proceed with the required planning, design, and construction. We are capable of fulfilling our financial obligations for further study, design, construction, and operation and maintenance to include furnishing lands, easements, right-of-way, and possible relocations. We are also aware that it is the responsibility of the Corps and the City of Port Allen to enter into a Feasibility Cost Share Agreement (FCSA), which both parties will execute prior to advancing the study. Additionally, we understand that a Project Cooperation Agreement (PCA) will be executed between both parties prior to construction. We appreciate that both agreements will fully describe the responsibilities of both parties, including share requirements. We look forward to working with the Corps in this effort in getting the study approved and construction initiated.

The assistance and cooperation of the Corps staff is greatly appreciated. If you need any additional information or have any additional questions, please contact me at your convenience at 225-346-5670.

Sincerely,



Lynn Robertson
Mayor