

- Construction of a water control structure at the Savannah NWR for fisheries benefits,
- Mitigation of impacts in Georgia due to disposal area operations;
 - Restoration of 6.4 acres of tidal marsh in the harbor area,
- Freshwater supply to the Savannah National Wildlife Refuge;
 - Maintenance of the Diversion Canal, the channels in Little Back River and Middle River, and the canals and control works for the Refuge.

2.7 Lower Savannah River Basin Environmental Restoration Project

In 1996, the Savannah District of the US Army Corps of Engineers completed a final interim feasibility report for environmental restoration of the lower Savannah River Basin. The recommended plan included an 80-foot diversion structure at the upstream of Navigation Cut #3, which forces water back into an old oxbow previously cut off for navigation, opening the channel to Bear Creek, and realigning the mouths of both Bear and Mill Creeks. The plan restored more natural flow into an area which includes a major portion of the Savannah National Wildlife Refuge. Construction was authorized under Section 102 of the 1996 Water Resources Development Act. Construction of the project was completed in 2003.

3 Problems and Opportunities

This chapter describes the existing problems and opportunities at Savannah Harbor. The identification of problems and opportunities is the first step in the six-step planning process described in the P&G. Water resource-related problems at Savannah Harbor occur under existing conditions and are projected to continue to occur in the future under without-project conditions. The problems are related to container ship operations in the Federal navigation channel leading to the Garden City Terminal. The opportunities described in this chapter include potential improvements to navigation efficiency, which address the federal objective, and opportunities developed by Federal agencies, stakeholders, and the public during the study process.

3.1 Problems

The primary problems identified in this analysis relate to the inefficient operation of containerships in the Federal channel at Savannah Harbor, which affect the Nation's international trade transportation costs. The following problem statements describe these inefficiencies:

1. Existing shippers are experiencing increased/ inflated operations costs due to light loading and tidal delays;

2. Light loading and tidal delays will increase as present harbor users increase their annual tonnage and as larger, more efficient ships replace older, smaller ones;
3. Existing ships are experiencing problems associated with turning capabilities and overall maneuverability in certain reaches of the inner harbor;
4. The severity of problems associated with turning capabilities and overall maneuverability in certain reaches of the inner harbor will increase as vessel size increases.

3.2 Opportunities

A number of opportunities were identified in the initial and subsequent steps and iterations of the planning process. Opportunities identified in terms of the Federal interest include:

- Reduce the transportation cost of import and export trade through Savannah Harbor and contribute to increases in national net income (NED); and
- Reduce operations and maintenance costs for the Federal channel.

Opportunities were also developed that reflect priorities and preferences of the Federal Government, the non-Federal sponsors and other groups participating in the study process. These opportunities include:

- Beneficial placement of new work sediments (Tybee Island and other locations);
- Development of new upper harbor disposal area with new work material;
- Enhance the natural resources in the project area;
- Advance the understanding of the natural resources in the project area;
- Contribute to the preservation of historically significant resources in the project area;
- Contribute to other agencies environmental decision making resources through development of state of the art modeling tools;
- Reduce constraints of harbor pilot operating practices;
- Identify the cumulative environmental impacts from past harbor development and operation; and
- When consistent with the USACE authorities and policies, include appropriate actions in the plan alternatives.

4 Inventory of Existing Conditions

This chapter provides an inventory of critical resources (physical, demographic, economic, social etc.) relevant to the problems and opportunities under consideration in the planning area. The inventory of critical resources is a component of the second step of the planning process.