

DRAFT

ST. JOSEPH BAY AQUATIC PRESERVE

MANAGEMENT PLAN

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The Bureau of Land and Aquatic Resource Management
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Chapter I

INTRODUCTION

This plan addresses the management of the St. Joseph Bay Aquatic Preserve located on the southwest coast of Gulf County in northwest Florida. This aquatic preserve is one of 39 officially designated preserves in the statewide system (Figure 1).

St. Joseph Bay Aquatic Preserve is bounded on the outside by water and on the inside by the St. Joseph Peninsula (Figure 2). The community of Port St. Joe lies on the nearby mainland. The Preserve includes most of the actual Bay bottom or submerged land below the mean high water line, except for a strip along the eastern shore, six inholdings along the south and west shores, and the area north of and including the navigation channel. It also includes open Gulf waters extending out three miles all along the length of St. Joseph Peninsula. Thus, the area within the boundary, approximately 74,000 acres, encompasses open Gulf waters, intertidal beach zone, both deep and shallow bay waters, intertidal muds flat and salt marsh rim.

The shallow Bay waters are of particular interest because of the relatively high water quality and extensive seagrass beds which provide prime habitat for marine life, including several species of commercial and recreational importance. The coastal barrier and salt marsh communities are also important centers of wildlife activity.



Figure 1.

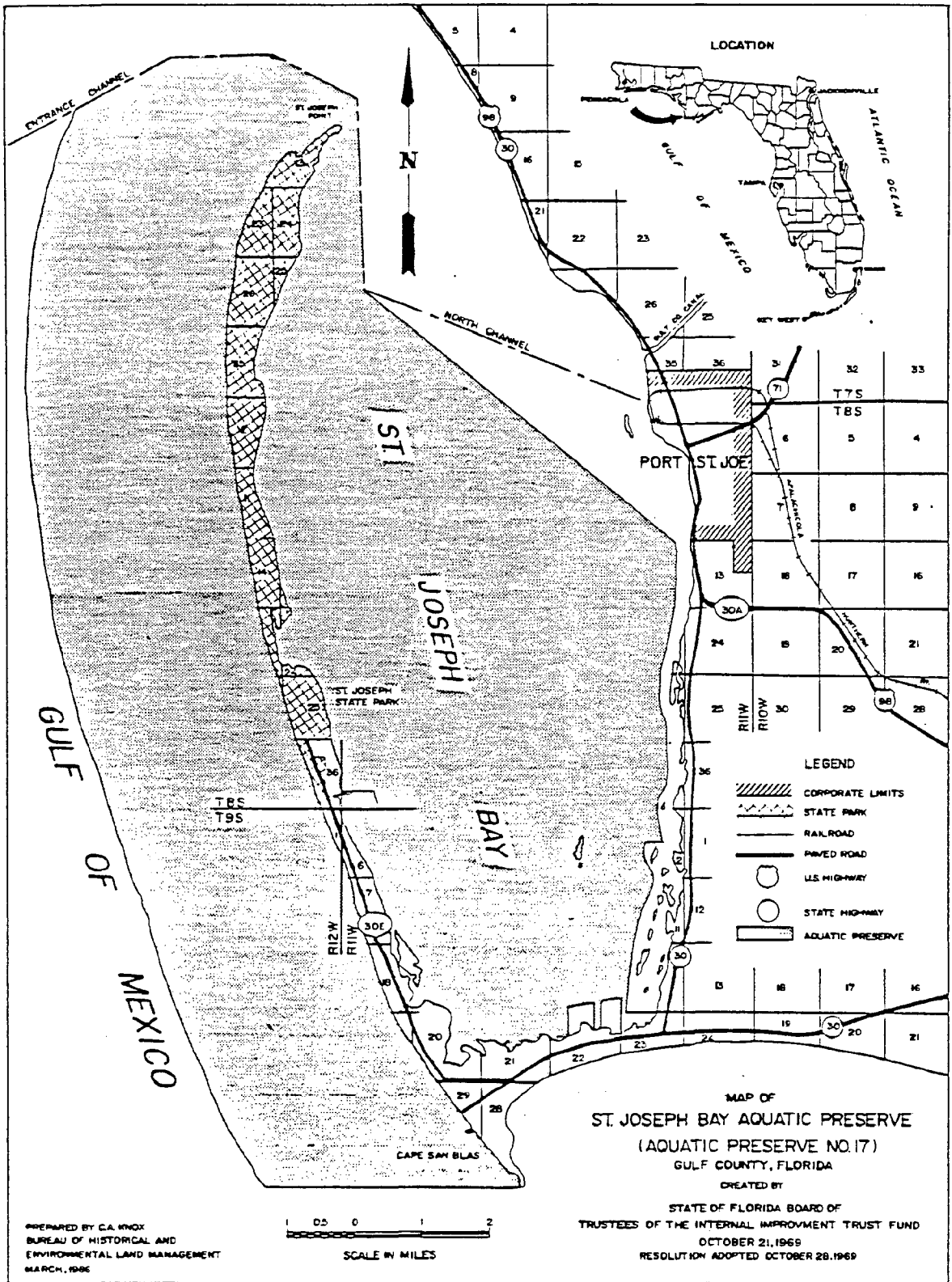


Figure 2.

The climate in Gulf County is transitional like much of northwest Florida. The subtropical climate of peninsular Florida blends with the temperate climate of the southeastern United States. Average rainfall is about 57 inches per year and the mean monthly temperature ranges from 53.0 degrees Fahrenheit in January to 81.4 degrees Fahrenheit in July.

South Gulf County has traditionally been a slow growth area, but coastal development has accelerated rapidly in the 1980's in a largely unplanned fashion, and the potential that exists for high density development is in portions of the peninsula south of the St. Joseph Peninsula State Park. Stormwater runoff from developed areas and septic tank leachate represent a potential threat to the water quality of the lower bay. Other concerns stem from the discharges and runoffs from the industrial area north of Port St. Joe, the level of use of the navigation channel, and possible damage to the seagrass beds from commercial shellfishing operations and recreational boating.

The St. Joseph Aquatic Preserve is designated and will be managed as both an aquatic preserve and an Outstanding Florida Water. The waters of the aquatic preserve are classified as Class II (shellfish propagation or harvesting) by the DER. DNR classifies the Bay as an Approved Shellfish Harvesting Area, while the rest of the aquatic preserve is Unclassified. The boundary line of Figure 2 represents the gross boundary of the aquatic preserve. The actual preserve includes those sovereignty submerged lands located waterward of the mean high water line within this boundary area. This aquatic preserve will be

managed to emphasize maintenance and enhancement of the existing conditions. As more site specific information becomes available, essentially natural conditions shall be identified and resources in disturbed areas restored to that condition where possible.

Due to the current limitation of permanent onsite staff resources, the initial management program described in this plan will be limited in the scope of operations. However, the program will fill the minimum need for active management in the preserve and should provide the framework for future program growth. The administrative support for this management program will be provided by the Department of Natural Resources, Division of Recreation and Park's, Bureau of Land and Aquatic Resource Management (BLARM) in Tallahassee, known as the "central office". Field personnel support and assistance will be provided through the Florida Park Service, Division of Marine Resources and the BLARM staff.

Initially, development of the resource inventory will be heavily dependent on LANDSAT satellite imagery, DOT aerial photography, and existing scientific and other literature. As the program proceeds and a full-time and on-site manager is hired, the experience and additional resource information will likely result in modifications to the program and plan, which are both designed to accommodate such changes, or at least identify areas needing improvement.

This plan is divided into chapters according to their management application. Chapter II cites the authorities upon which this management program and plan

are built. Chapter III (Major Program Policy Directives) highlights the major policy areas set forth by this plan. Chapter IV presents a brief resource description.

Chapter V presents the management objectives of both the on-site managers, who actually work in the preserve, and the administrative staff in Tallahassee.

Chapter VI addresses how this plan will interface with local, regional, state, and federal agencies and programs; as well as its relevance to non-government organizations, interest groups, and individuals.

Chapters VII through IX address the various uses, from public to private to commercial. Chapters X and XI address the use of the aquatic preserve for scientific research and environmental education, respectively.

Chapter XII is an internal management improvement section identifying problems and needs in the progressive improvement of this aquatic preserve management plan.

This plan was written by the Department of Natural Resources (DNR), Division of Recreation and Parks, Bureau of Land and Aquatic Resource Management staff. Funding for the plan was provided by a coastal management grant (CM-130) through the U.S. Department of Commerce's National Oceanic and Atmospheric Administration, Office of Ocean and Coastal Resource Management, and the Florida Department of Environmental Regulation (DER), Office of Coastal Management.

Chapter II

MANAGEMENT AUTHORITY

The primary management authorities available to the staff for implementing policy directives affecting aquatic preserves are found in Chapters 258 and 253, Florida Statutes (F.S.). These authorities clearly establish the proprietary management overview role of the Governor and Cabinet, sitting as the Board of Trustees of the Internal Improvement Trust Fund and are variously referred to as the "Trustees" or the "Board". Furthermore, all management responsibilities assigned to the Trustees by this plan may be fulfilled directly by the Governor and Cabinet or indirectly via staff or agents of the Trustees, pursuant to delegations of authority, management agreements, or other legal mechanisms. All subsequent references to the Board or Trustees should be presumed to potentially include staff and designated agents, in addition to the Governor and Cabinet. The staff of the Bureau of Land and Aquatic Resource Management (acting as "agents" for the Trustees) will review all requests for uses of state-owned sovereignty submerged lands within aquatic preserves. The review and subsequent staff comments are primarily designed to evaluate the environmental consequences of any proposed use of state-owned submerged land. The review is conducted within the confines of the criteria contained in the "maintenance" provisions for aquatic preserves in Chapter 258, F.S.

Formal review comments are provided to the Department of Natural Resources (DNR), Division of State Lands by the Bureau of Land and Aquatic Resource Management for inclusion in the comments and recommendations accompanying

agenda items for Trustees consideration. This mechanism allows the Trustees, sitting as owners of the land, to evaluate public interest and project merits within the context of environmental impact upon the preserve.

BACKGROUND

In many respects, the authorities supporting aquatic preserve planning and management are the cumulative result of the public's awareness of the importance of Florida's environment. The establishment of the present system of aquatic preserves is a direct outgrowth of public concern with dredge and fill activities rampant in the late 1960's.

In 1967, the Florida Legislature passed the Randall Act (Chapter 67-393, Laws of Florida), which set up procedures regulating previously unrestricted dredge and fill activities on state-owned submerged lands. That same year the Legislature also provided statutory authority (Section 253.03, F.S.) for the Trustees to exercise proprietary control over state-owned lands. In 1967, this governmental focus on protecting Florida's productive estuaries from the impacts of development led to the establishment of a moratorium by the Governor and Cabinet on the sale of submerged lands to private interests. In that same year, this action was followed by the creation of an Interagency Advisory Committee on submerged lands management. In late 1968, that Committee issued a report recommending the establishment of a series of aquatic preserves. Twenty-six separate waterbodies were addressed in the original recommendation.

Also in 1968, the Florida Constitution was revised, declaring in Article II, Section 7, the State's policy of conserving and protecting the natural resources and scenic beauty of the state. That constitutional provision also established the authority for the Legislature to enact measures for the abatement of air and water pollution.

It was not until October 21, 1969 that the Governor and Cabinet acted upon the recommendations of the Interagency Advisory Committee and adopted, by resolution, 18 of the waterbodies as aquatic preserves, including the St. Joseph Bay Aquatic Preserve.

Prior to the October 1969 action by the Governor and Cabinet, the Legislature had created the Boca Ciega Aquatic Preserve. Subsequent Legislative action in 1972, 1973, and 1974, created the Pinellas County, Lake Jackson and Biscayne Bay Aquatic Preserves, respectively.

In 1975, the Legislature established a Florida Aquatic Preserve Act (codified in Chapter 258.35-258.46, F.S.), thereby bringing all existing preserves under a standardized set of maintenance criteria. Additional acts were passed subsequent to the 1975 action, such as the addition of the Cockroach Bay Aquatic Preserve in 1976 and the Gasparilla Sound--Charlotte Harbor Aquatic Preserve to the system in 1978.

The Charlotte Harbor Aquatic Preserve Management Plan, approved by the Trustees on May 18, 1983, was the first management plan for an aquatic preserve. The following aquatic preserves also have approved plans: Estero Bay - September 6, 1983; North Fork--St. Lucie - May 22, 1984; Loxahatchee

River--Lake Worth Creek - June 12, 1984; and Indian River Lagoon - January 22, 1985; Banana River - September 17, 1985; Indian River - Malabar to Vero Beach- January 21, 1986; Nassau River, St. Johns River Marshes and Fort Clinch State Park Aquatic Preserves - March 22, 1986.

In June 1985, the Legislature passed S.B. 762 which expanded the boundaries of the Banana River, Malabar to Vero Beach, Loxahatchee River--Lake Worth Creek, Wekiva River, and Rookery Bay Aquatic Preserves; and created Guana River Marsh and Big Bend Seagrasses Aquatic Preserves. Lemon Bay and Rainbow Springs were added as aquatic preserves by the 1986 Legislature.

The State Lands Management Plan, adopted on March 17, 1981, by the Trustees, contains specific policies. The Plan also establishes policies concerning spoil islands, submerged land leases, "Outstanding Native Florida Landscapes", unique natural features, submerged grassbeds, archaeological and historical resources, and endangered species. All of these issues provide management guidance to the aquatic preserve program.

ADMINISTRATIVE RULES

Chapters 18-21 and 18-20, Florida Administrative Code (F.A.C.), are two administrative rules directly applicable to the DNR's/Trustee's actions regarding allowable uses of submerged lands, in general, and aquatic preserves specifically. Chapter 18-21, F.A.C. controls activities conducted on sovereignty submerged lands, and is predicated upon the provisions of Sections 253.03 and 253.12, F.S. The stated intent of this administrative rule is:

- "(1) to aid in fulfilling the trust and fiduciary responsibilities of the Board of Trustees of the Internal Improvement Trust Fund for the Administration, management and disposition of sovereignty lands;
- (2) to insure maximum benefit and use of sovereignty lands for all the citizens of Florida;
- (3) to manage, protect, and enhance sovereignty lands so that the public may continue to enjoy traditional uses including, but not limited to, navigation, fishing, and swimming;
- (4) to manage and provide maximum protection for all sovereignty lands, especially those important to public drinking water supply, shellfish harvesting, public recreation, and fish and wildlife propagation and management;
- (5) to insure that all public and private activities on sovereignty lands which generate revenues or exclude traditional public uses provide just compensation for such privileges; and,
- (6) to aid in the implementation of the State Lands Management Plan."

Chapter 18-20, F.A.C. addresses the aquatic preserves and derives its authority from Sections 258.35, 258.37, and 258.38, F.S. The intent of this rule is contained in Section 18-20.01, F.A.C., which states:

- "(1) All sovereignty lands within a preserve shall be managed primarily for the maintenance of essentially natural conditions, the propagation of fish and wildlife, and public recreation, including hunting and fishing where deemed appropriate by the board of the managing agency.
- (2) The aquatic preserves which are described in Section 258.39, 258.391, 258.392 and 258.393, F.S., Chapter 85-345, Laws of Florida and in Section 18-20.02, F.A.C., were established for the purpose of being preserved in an essentially natural or existing condition so that their aesthetic, biological and scientific values may endure for the enjoyment of future generations.
- (3) The preserves shall be administered and managed in accordance with the following goals:
- (a) Preserve, protect, and enhance these exceptional areas of sovereignty submerged lands by reasonable regulation of human activity within the preserves through the development and implementation of a comprehensive management program;
 - (b) To protect and enhance the waters of the preserves so that the public may continue to enjoy the traditional recreational uses of those waters such as swimming, boating, and fishing;

- (c) To coordinate with federal, state, and local management programs, which are compatible with the intent of the Legislature in creating the preserves;
- (d) To use applicable federal, state, and local management programs, which are compatible with the intent and provisions of the act and these rules, to assist in managing the preserves;
- (e) To encourage the protection, enhancement or restoration of the biological, aesthetic, or scientific values of the preserves, including but not limited to the modification of existing man-made conditions toward their natural condition, and discourage activities which would degrade the aesthetic, biological, or scientific values, or the quality, or utility of a preserve, when reviewing applications, or when developing and implementing management plans for the preserve;
- (f) To preserve, promote, and utilize indigenous life forms and habitats, including but not limited to: sponges, soft coral, hard coral, submerged grasses, mangroves, salt water marshes, fresh water marshes, mud flats, estuarine, aquatic and marine reptiles, game and nongame fish species, estuarine, aquatic and marine invertebrates, estuarine, aquatic and marine mammals, birds, shellfish and mollusks;

(g) To acquire additional title interests in lands wherever such acquisitions would serve to protect or enhance the biological, aesthetic, or scientific values of the preserves.

(h) To maintain those beneficial hydrologic and biologic functions, the benefits of which accrue to the public at large."

OTHER MANAGEMENT AUTHORITIES

Other Department of Natural Resources management authorities applicable to aquatic preserves include: fisheries and marine mammal management and protection; beach and shore preservation programs outlined in Chapters 370 and 161, F.S. respectively; and land acquisition programs conducted under the Conservation and Recreation Lands Program authorized by 253, F.S..

Chapter 403, F.S., is an important adjunct to Chapter's 253 and 258, F.S. This governs, in part, the State's regulatory programs affecting water quality and biological resources. The Department of Environmental Regulation (DER), through a permitting and certification process, administers this program. Section 253.77, F.S., as amended by the Warren S. Henderson Wetlands Protection Act of 1984, requires that any person requesting use of State-owned land shall have approval of the proposed use from the Trustees before commencing the activity. An interagency agreement between DNR and DER provides an avenue for staff comments on potential environmental impacts of projects in aquatic preserves through the DER permitting process. Additionally, the DER has designated, by administrative rule, a series of waterbodies

with stringent use criteria called "Outstanding Florida Waters" (OFW). The inclusion of all aquatic preserve waters within this classification greatly enhances the protective provisions of Chapter 258, F.S. As the designated "306" Coastal Zone Management Agency, the DER also provides a source of funding for data collection and planning in areas such as the St. Joseph Bay area, as well as being the state agency responsible for implementing the "federal consistency" provisions of the Federal Coastal Management Act.

The DER's administrative rules of primary significance to the aquatic preserve management program include Chapters 17-3, 17-4 and 17-12, F.A.C.. These rules are based upon the authorities contained in Chapter 403, F.S.. Chapter 17-3, F.A.C. addresses water quality standards and establishes the category of "Outstanding Florida Waters", while Chapters 17-4 and 17-12, F.A.C. address permit requirements and dredge and fill activities, respectively.

In December, 1982 a Memorandum of Understanding (MOU) between the DER, DNR, and the U.S. Army Corps of Engineers (COE) was executed. This MOU clearly establishes a process whereby the proprietary concerns of the Trustees, stated in Chapter 253, F.S. can be integrated into the DER/COE joint permit processing system.

Other opportunities for environmental review and input into activities potentially affecting aquatic preserves are afforded by the Department of Community Affairs (DCA), and the Department of State, Division of Archives, History, and Records Management (DAHPM). The Executive Office of the Governor also provides a mechanism for public input into federal projects via the State clearinghouse process.

The DCA is statutorily responsible for administering the "Development of Regional Impact" (DRI). The DRI program, authorized by Section 380.06, F.S. was established by the Legislature to provide a review and monitoring procedure for those development projects potentially affecting more than one county.

Chapter 267, F.S. establishes the state policy regarding preservation and management of Florida's archaeological and historical resources. This responsibility is legislatively assigned to the DAHRM, which holds title to those cultural resources located on state-owned lands. This also applies to sovereignty submerged lands, including aquatic preserves.

The Department of Health and Rehabilitative Services, under their public mandate, administers two programs directly affecting the aquatic preserve management program. These programs are (1) septic tank regulation, usually administered by county health departments and (2) arthropod (mosquito) control programs, usually implemented through local mosquito control districts. Each of these programs holds the potential for creating significant impacts upon the aquatic preserves. Establishment of close working relationships between the aquatic preserve staff and the Department of Health and Rehabilitative Services will be a necessary element of the aquatic preserves management program.

Each of the above referenced programs may provide an effective means of protecting aquatic preserves and their ecologically sensitive resources.

Chapter III

MAJOR PROGRAM POLICY DIRECTIVES

This plan contains a number of management policy issues that are discussed either generally or definitively. This section highlights those major policy areas that comprise the basic thrust of this management effort. Adoption of these policies will provide specific staff direction for implementing the day-to-day aquatic preserve management program. Major program policy directives are:

- (A) Manage all submerged lands within the aquatic preserve to ensure the maintenance of essentially natural conditions to ensure the propagation of fish and wildlife, and public recreation opportunities.
- (B) Prohibit the disturbance of archaeological and historical sites within the aquatic preserve, unless prior authorization has been obtained from the Trustees and DAHRM, and such disturbance is part of an approved research design or authorized project.
- (C) Develop a resource inventory and map natural habitat types within the aquatic preserve, with an emphasis on those habitat types utilized by threatened and/or endangered species.
- (D) Protect and, where possible, enhance threatened and endangered species habitat within the aquatic preserve.

(E) Prohibit development activities within the aquatic preserve that adversely impact upon grassbeds and other valuable submerged habitat, unless a prior determination has been made by the Board of overriding public importance with no reasonable alternatives, and adequate mitigation measures are included.

(F) Prohibit the removal of saltmarsh and other natural shoreline vegetation within the aquatic preserve, except when necessitated by the pursuit of legally authorized projects and local protection ordinances.

(G) Provide research and educational opportunities for scientists and other interested researchers within the framework of a planned research program in the aquatic preserve.

(H) Acquire, where feasible, privately owned submerged lands located within the boundaries of the aquatic preserve pursuant to the authorities contained in Section 253.02(4), F.S.

(I) Prohibit the drilling of oil and gas wells, the mining of minerals, and dredging for the primary purpose of obtaining upland fill within the aquatic preserve.

(J) Prohibit non-water dependent uses of submerged lands within the aquatic preserve except in those cases where the Board has determined that the project is overwhelmingly in the public interest and no reasonable alternatives exist. This prohibition shall include floating residential units, as defined in Section 125.0106(2), F.S.

(K) Prohibit storage of toxic, radioactive, or other hazardous materials within the aquatic preserve.

(L) Prohibit those mosquito control practices within the aquatic preserve that would result in habitat modification or manipulation (i.e. diking, ditching) unless there are no reasonable alternatives and failure to conduct such practices would result in a threat to public health.

(M) Limit pesticide and biocide use within the aquatic preserve to those that are approved by the Environmental Protection Agency (EPA) for wetland and aquatic application.

(N) Prohibit the construction of new deep water ports within the aquatic preserve boundaries.

(O) Insure that any artificial reef construction does not adversely impact environmentally fragile areas within the aquatic preserve and that the construction will maintain the essentially natural condition while enhancing the quality and utility of the preserve.

(P) Manage any state-owned spoil islands within the aquatic preserve as bird rookeries and wildlife habitat areas.

(Q) Encourage public utilization of the aquatic preserve, consistent with the continued maintenance of its natural values and functions.

(R) Develop a well coordinated aquatic preserve management mechanism that recognizes and utilizes local government programs and authorities.

(S) Require, through the efforts of DER and the water management districts, the maintenance of the naturally high water quality of the estuary and ensure the natural seasonal flow fluctuations of freshwater into the estuary.

(T) Apply the management criteria contained in the adopted St. Joseph Bay Aquatic Preserve Management Plan to all subsequent legislative additions of land to the aquatic preserve.

(U) Encourage the assistance of federal, state, and local government agencies in implementing the aquatic preserve management plans, especially in the areas of protection of natural and cultural resources and the enforcement of applicable resource laws and ordinances.

(V) Prohibit marinas in Class 1 or 2 Resource Protection Areas.

(W) Identify and document any problems caused by fishing activities and report them to the Marine Fisheries Commission.

Chapter IV

RESOURCE DESCRIPTION

Part 1

The Resource Setting A Profile of the Gulf County Coastal Area

A. Historic Notes

From a geological perspective the St. Joseph Bay area, like much of coastal Florida, is a recent creation. The fluctuating levels of the world's oceans caused by the expansion and contraction of the global polar caps during the ice ages eventually resulted in the emergence from the sea of what we now know as Florida. In Gulf County there are clear reminders of this emergence; sediment studies imply that the Bay was once the mouth of the Apalachicola River, and the linear striations of alternating high and low ground, running parallel to the Bay shore and visible from the air, are suggestive of beach depositions made at a time when the Gulf level was much higher (Stewart 1962). By 10,000 B.C. the Gulf County coast had assumed much of its present form.

The first humans in northwest Florida came prior to 9,000 B.C. Originally nomadic hunters, these Paleo-Indians were able to take advantage of the abundance of seafood to develop a more sedentary culture of hunters and gathers. By 1,000 B.C. a distinctive coastal culture known as Deptford had evolved. The remains of what they gathered may still be found in shell middens throughout the coastal area of northwest Florida, including several middens in the vicinity of St. Joseph Bay.

The Apalachee Indians, were resident in the area when the first Europeans came. The expedition of Panfilo de Narvaez in 1528 was first, followed by Hernando de Soto in 1539. Since neither found gold, there was no further Spanish interest until the early years of the eighteenth century when they erected a garrison on St. Joseph Bay. By 1722 the difficulties of defending such a post against both the English and the French led to abandonment, and for the next 100 years the area was visited only by occasional frontier traders (Milanich & Fairbanks 1980). By 1821 Florida has passed into the hands of the United States and was immediately established as a territory with a capital located in Tallahassee in 1824. During that period a settlement named St. Joseph was established along the coast at St. Joseph Bay. Although basically a small fishing and trading village, with overland links to the Apalachicola River, the Apalachicola valley became increasingly important to the South's cotton trade. St. Joseph was also briefly the center of the state's attention in 1838 as the site of a state constitutional convention. In subsequent years, however, St. Joseph's population was devastated by a yellow fever epidemic, a hurricane, and the inability to arrange the trade it sought (Tebeau 1971). Human settlement in the area remained at a subsistence level until the twentieth century, although the Bay was important during the Civil War as the location of the Confederate salt works (Florida Department of State n.d.).

The slow growth in the area is consistent with the fact that Gulf County was not even created by the Legislature until 1925, one of the last three counties named in Florida (Stewart 1962). Wewahitchka, in the north end of the county, was designated the county seat, a testimony to the relative unimportance of the new coastal town of Port St. Joe.

That profile began to change in the 1930's when Ed Ball of Jacksonville, administrator of the DuPont Trust, arranged for both the excavation of the Gulf County Canal and construction of a major paper mill. This later led to port development. Since then the cluster of industrial facilities along or near the Gulf County Canal has been the mainstay of the County's economy. In the 1960's, consistent with activity in the south, the county seat was moved from Wewahitchka to Port St. Joe (Stewart 1962).

B. Archaeological/Historical Sites

The Division of Archives, History , and Records Management of the Department of State has identified nine archaeological and historic sites in the immediate coastal area of St. Joseph Bay. They include four shell middens, three old house or settlement sites, the Confederate salt works, and the Cape San Blas lighthouse. The salt works is recognized by a historic marker, the Richardson Hammock shell mound is considered a major site, and the lighthouse has been nominated for inclusion in the National Register of Historic Places. The Florida Constitution Museum in Port St. Joe is located in the vicinity of the original settlement of the nineteenth century town of St. Joseph (Florida Department of State, unpub. data).

C. Present Population Characteristics

Typical of the counties of Northwest Florida, Gulf County is, with its 11,073 residents, one of the less populated counties of the state (58th of 67 in 1984). It has a low mean population density of 19.8 persons per square mile (57th among the counties; compared to the state average of 201.8 persons per

square mile). During the 10 year period from 1974 to 1984, it had the second slowest growth rate in the state (5.5 percent, compared with 29.3 percent for the state) (Florida Department of Commerce, 1985a). Predictions for the year 2000, set at 11,943 people, suggest that the overall rural orientation will remain; the small fraction of a percent of the states population living in Gulf County will diminish from 0.11 percent in 1980 to 0.08 percent by the year 2000 due to high increases expected elsewhere (Apalachee Regional Planning Council 1981).

Viewed from a more localized perspective, there are some other demographic points of interest. First, the principal factor contributing to the slow growth profile of the County has been the significant out-migration of residents especially younger, working-age people. Their departure was, prompted by the shortage of local job opportunities, a point underscored by the local unemployment rates from 1977 to 1983 which ranged from 8.7 to 15.2 percent. This is substantially above the state average of 6.6 to 8.6 percent over the same period. A ramification of the exodus of young people is a population of rising average age. By the year 2000 the percentage of residents 65 or older will have increased to 17.4 percent from a 1980 figure of 11.3 percent; this figure is noticeably higher than that of the surrounding counties (Apalachee Regional Planning Council 1981).

Secondly, there has been a shift in local housing and income statistics. The average number of persons per household dropped from 3.36 in 1967 to 2.80 in 1984, a figure consistent with the regional pattern, but larger than the state average. Housing types have also changed. The percentage of mobile homes has increased to 9.7 percent in 1980, although this figure is lower than that of

surrounding counties (Apalachee Regional Planning Council 1981). An important change came in 1984 when the first town house units were constructed in the coastal area; in that year building permits were issued for 110 multifamily units (42.5 percent of all permitted units for that year) compared with none during the previous year (Shoemyen 1985).

The economic profile of Gulf County is a collection of mixed indications. The per capita income for 1983 was \$7,997, a figure substantially higher than all other counties in the region except Bay County; still only 67 percent of the state average of \$11,593, this percentage has shown no improvement since 1973 (Florida Department of Commerce 1985a). Families living below poverty level in 1980 made up 18.3 percent of the total, consistent with the regional pattern. Although an improvement over the 1970 figure of 20.0 percent, the County lags well behind the state average which improved from 12.7 percent in 1970 to 9.9 percent in 1980 (Apalachee Regional Planning Council, unpub. data).

The major source of personal income in Gulf County is manufacturing, with the St. Joseph Paper Company, the County's largest employer. In 1983 manufacturing accounted for 48.8 percent of all earnings in the county, the second highest rate in the state (Florida Department of Commerce 1985a). Net forestry products valued over \$158 million in 1983, eighth in the state (Apalachee Regional Planning Council, unpub. data). The relative importance of industry in the county is also reflected in the highest 1983 ad valorem tax base and one of the lowest tax rates in north Florida (Florida Department of Commerce 1985a). Other significant sources of personal income in the county are transportation, local government, services, and trade. The latter

category includes the marketing of seafood, a topic more thoroughly discussed in the following section.

In summary, an analysis of key demographic and economic features of Gulf County suggests a low density rural county with two main population centers and a slow-growth economy based predominantly on a relatively stable but insufficient base of timbering and manufacturing.

D. Economic Development Issues in Coastal Gulf County

The economic limitations of Gulf County have necessitated a keen local interest in economic development options. Three economic categories, shipping and port use, fishing and shellfishing, and recreational pursuits, have present or prospective implications for the aquatic preserve and are examined in this section.

Commercial shipping in Gulf County is made possible by the St. Joseph Ship Channel and by the Gulf County Canal, which provides a direct connection between St. Joseph Bay just north of Port St. Joe and the Intracoastal Waterway six miles to the northeast. The navigation channel was initially authorized by Congress in 1945 but not actually completed by the Corps of Engineers until 1962. It provides access to the Gulf across the shoals at the mouth of the Bay and connections to the Canal. The main navigation channel is typically 35 feet deep and 300 feet wide for most of its length and has a turning basin in the vicinity of the berthing area (U.S. Army Corps of Engineers 1973).

Since the initial construction, maintenance dredging has occurred in 1973, 1979, 1985. The spoils were disposed on the end of St. Joseph Point in 1973, in relatively deep open water (an area called Shark Hole) just inside the Point in 1979 and along the beach of St. Joseph Point in 1985 (Florida Department of Environmental Regulation 1985). All three options have caused some degree of environmental or technical problems concerning site recovery, water quality, and resiltation. Future maintenance dredging proposals will face dredge spoil location as a major issue requiring resolution.

Within a few years after the navigation channel was opened its use was on the increase. In 1969, 465,602 tons were handled in Gulf County, which increased to 931,762 tons the following year, mostly from freighters serving the St. Joe Paper Company and tankers serving the Hess Oil Company (U.S. Army Corps of Engineers 1973). Since 1970, however, the volume of commerce dropped considerably, due mostly to a large reduction in use of the petroleum storage terminals owned by Amerada Hess. Total tonnage dropped from 534,383 in 1981 to 103,833 in 1982 and 68,780 in 1983. A review of the shipping records for those years indicates that goods of 34 categories were handled, but only five were consistent: residual fuel oil, paper and paperboard, basic chemicals and products, clay, and plastic materials. The irregular pattern of other goods suggests the lack of any established trade outlets (U.S. Army Corps of Engineers 1981-83).

Fish and shellfish have long been suggested as having good potential for trade. In 1979 the Port St. Joe Port Authority offered a major proposal for development of a 106-acre tract along the Gulf County Canal and US-98 as a seafood industrial park. The request for state and federal assistance of

\$8.86 million included funding for excavation of a berthing and unloading area to accommodate 86 vessels of up to 90 feet in length (Port St. Joe Port Authority 1979). The proposal was never funded and the land remains essentially vacant, but the Port Authority remains interested in the concept and may revisit the idea in the future in conjunction with the replacement of the US-98 bridge over the Canal, now scheduled for 1987 (Port St. Joe Port Authority, pers. comm.).

The commercial significance of fishing and shellfishing in Gulf County is not completely dependent upon future developments, however. From 1976 to 1982 the amount of fish and shellfish caught and marketed in Gulf County increased from 5.70 million pounds worth \$1.17 million to 8.22 million pounds worth \$1.97 million, representing over four percent of the state's catch (Florida Department of Natural Resources 1976-80). The local impact on employment is considerable. For example, one major local fishery, headquartered along the Gulf County Canal, has in recent years, hired as many as 500 people during the spring mullet run (Mike Crocker, pers. comm.).

Although much of what is processed locally is actually caught well out in the Gulf, the Bay waters themselves and the Gulf waters just off the peninsula are utilized for much of the catch, including most of the shellfish. In the early 1970's the bay was the site of the nation's only commercial harvest of the sunray venus clam. It eventually folded as a commercial venture primarily due to limitations of processing and marketing (Mahadevan 1984). Commercial harvest of hardshell clams, blue crabs, and shrimp remain locally important in the Bay waters.

The commercial harvesting of bay scallops is also a regular, though controversial, element of the local marine harvest. This controversy is due to the competition it creates with personal recreational harvesting. This issue was articulated locally by a petition in 1982 which resulted in a resolution of the Board of County Commissioners of Gulf County petitioning the Department of Natural Resources to ban mechanical harvesting in the Bay (Board of County Commissioners of Gulf County, FL 1982). A compromise on the issue was reached by the then newly formed Marine Fisheries Commission in 1985; the law banned commercial and mechanical harvesting in water less than 3 feet deep, in the period of July 1 through August 15, and on weekends from August 16 through Labor Day. Recreational harvesters were limited to a five gallon in-the-shell (or one-half gallon meat) bag limit (FAC 46-18). The important residual problem of mechanical harvesting damage is currently the focus of a Florida Sea Grant study (Keough & Young 1984).

The controversy concerning the harvesting of scallops shows the importance of the Bay's resources for recreational use. Although difficult to quantify, the recreational significance of the coastal area is great as people from both the immediate area and region come to the beach and in ever increasing numbers to fish, collect scallops, boat, swim, dive, camp, or to study, observe, and enjoy the distinctive features of the coastal environment.

One indication of the increased interest in recreation is the fact that boat registrations for pleasure craft in Gulf County increased from 1,352 in 1982 to 1,537 in 1985. That increase of 4.6 percent per year over three years is well in excess of the county's population increase of less than one percent per year that same period (Florida Department of Natural Resources, unpub.

data of the Division of Law Enforcement). Similarly, visitation records at the T.H. Stone State Park on the St. Joseph Peninsula increased from 88,876 in 1980-81 to 101,808 in 1984-85, an annual increase of 2.9 percent (Florida Department of Natural Resources 1985). Still another secondary indicator is the increase of citations issued by the Florida Marine Patrol from 23 boating violations (a subcategory of all violations) in 1982 to 61 boating violations in 1984. Further consideration of the citation data also suggests the degree to which the marine waters of Gulf County are used by boaters from outside the local area; seventy percent of all violations issued during those years were to non-Gulf County residents (Florida Department of Natural Resources, unpub. data of the Division of Law Enforcement). A final indicator of increasing recreational use was the local impetus which led to a 1984 county ordinance restricting the right to drive on the beach (Board of County Commissioners of Gulf County 1984).

Increasing recreation and visitation in this area is contributing to developmental pressure in the Peninsula and Cape (a topic covered in the following section). This in turn presents public beach and Bay access problems. Public boat access to the Bay is currently limited to four boat ramps: the Port St. Joe City Pier, Presnell's Fish Camp (three miles south of the City), and two launching areas at Eagle Harbor in the state park. Beach access is available at the lighthouse on Cape San Blas and in the state park. A number of other places are informally used, but they involve private property and present traffic hazards due to the lack of a parking area. As growth occurs the need for additional public access points and associated parking and sanitation facilities will increase (A.L. Harrison, pers. comm.).

E. Coastal Area Land Use and Infrastructure

The northern half of the St. Joseph Peninsula is a state park in which virtually all of the development is clustered toward the southern end, particularly in the vicinity of Eagle Harbor. The northern two-thirds of the park is maintained as a wilderness area, consistent with its coverage by virgin areas of sand and slash pine.

Both the Peninsula and the Cape south of the state park have been erratically subdivided since 1975 when they were still in single ownership. Parcel sizes generally range from one-half acre to five acres in size, and little discernible pattern of subdivision exists throughout the Peninsula and Cape areas. In addition, two undeveloped holdings of approximately 40 acres at Tapper's Landing and Richardson Hammock still exist, as well as a handful of five to ten acre parcels. Billy Joe Rish Park, a Health and Rehabilitative Services' facility for the disabled, is located on the peninsula. Two federally owned facilities are nearby. One is called Pig Island and is part of the St. Vincent National Wildlife Refuge; and the other is a radar tracking facility of several hundred acres (part of Eglin Air Force Base) covering the western part of the Cape including the lighthouse area.

Housing developments in the Peninsula and Cape has also been erratic. A unified townhouse development has been constructed adjacent to the state park; it is the only area on the Peninsula with any sewage treatment. Elsewhere on the peninsula and Cape single family and duplex beach homes are mixed irregularly with townhouses (up to 8 units per acre) and undeveloped lots. Other land use includes a small convenience store and a handful of bayside

docks constructed from Peninsula lots. At the base of the Cape and the mainland the County owns a 40-acre tract with frontage on both the Gulf and the Bay; its only current use is as a solid waste disposal facility.

Continuing north along the mainland bay shore is a three mile stretch of land under one ownership; a single townhouse development is being constructed here. A small scattered cluster of older homes lies in the vicinity of Presnell's Fish Camp. Nearby is the County Country Club and some associated single family units on half-acre lots.

The eastern Bay shore is excluded from the aquatic preserve; part of this has been conveyed into private ownership. A number of small islands occur just outside the aquatic preserve boundary, but one island is within the boundary of the aquatic preserve. It is called Black's Island and has a small facility on it for group camping.

Not far north of the vicinity of Presnell's fish camp the land is owned by a timber company and is undeveloped up to the junction of CR-30A and US-98. At that point the urban area of Port St. Joe begins. The residential area extends to the junction with SR-71 (where the City Pier is located). It is followed by the commercial district and an extensive industrial area which continues across and along the Gulf County Canal. North of the canal lies the residential community of Highland View, which extends to Palm Point. Next, a four mile stretch of undeveloped beach exists before residential development resources begin again at St. Joe Beach, Beacon Hill, and (across the county line) Mexico Beach.

Construction in much of the coastal areas in Florida are subject to regulations which are more stringent than the standard building code of inland areas. Flood-prone areas of the mainland, for example, necessitate elevation standards in order to qualify for flood insurance. On the Cape and Peninsula, however, no flood insurance is available because this area has been declared "undeveloped" under the federal Coastal Barriers Resources Act, and consequently may not receive federal subsidies. While this seems to be an obstacle to further development of the Peninsula and Cape, the actual limits of the flood zones allow construction to occur above the zone without the need for flood insurance (DeWayne Manuel, pers. comm.).

State regulations, however, play a factor in building as well. In 1985 the Department of Natural Resources established a new Coastal Construction Control Line for Gulf County, including all of the Peninsula and Cape. Construction seaward of the Control Line is subject to a state permitting and review process which requires certain locational and structural criteria. These criteria serve to lessen the probability of dune erosion and structural damage (F.S. 161.063). Also, within a 1,500 foot zone extending landward of the Control Line lies an area known as the Coastal Building Zone. Similar regulatory criteria are in effect here, but the local government reviews applications rather than the state (F.S. 161.55). Within the area seaward of the Control Line the state may calculate a 30-year erosion zone, where building is prohibited except for platted or recorded lots completely inside of the zone; in this case a single family residence is allowed. The 30-year erosion zone boundary is not rigid but is calculated on a case by case basis (F.S. 161.053(6)). Parts of the Peninsula, especially Lighthouse Bay, are affected by this erosion zone provision.

Natural forces, such as coastal storms and hurricanes, are another factor to be considered before developing a coastal area. Extensive stretches of coastal highways, including most of CR-30A, the road allowing Peninsula and Cape evacuation, are between three and seven feet in elevation and are subject to flooding well before the actual landfall of the expected storm. Depending upon the severity and direction of the storm, a successful evacuation of Gulf County would need to begin 11½ to 26 hours ahead of landfall. Reliable estimates, however, are generally not available until 12 hours ahead of landfall making evacuation difficult for a storm requiring more than a 12 hour notice. Additional development would exacerbate the already difficult problem (Apalachee Regional Planning Council 1984).

Traditionally, it has been the need for potable water and acceptable waste water treatment which have presented the greatest obstacles to development of the coastal area. Recently, Lighthouse Utilities installed a 16-inch well (with a 6-inch well as back-up) in the southern most part of the mainland. Permitted for 45,000 gallons per day (230,000 gallons peak), it is connected with a community system serving the Cape and Peninsula. Although adequate for the present population, continued growth will require additional services. Well drawdown and consequential contamination by salt water intrusion is a problem in this part of the coast. For this reason present and future needs for potable water will need careful scrutiny (Douglass Barr, pers. comm.).

Septic tanks are used in areas outside of the City of Port St. Joe and the development adjacent to the state park. The septic tanks are built on mounds in the coastal communities because of the high water table and soil types which are rated as having severe limitations for septic tank use (Florida

Department of Administration 1977). Despite these obstacles, densities run as high as 8 units per acre (Doug Kent, pers. comm.). Local officials offer this limitation as the only obstacle toward increased development of the Peninsula and Cape (DeWayne Manuel, pers. comm.).

Storm water management in these highly permeable soils does not present an obstacle to construction as do the concerns over potable water and sewage facilities. Never-the-less, the creation of impermeable surfaces in place of natural contours and vegetation will increase the runoff. This together with the septic tank leachate, could result in significant fresh water runoff and consequent decreased bay water salinity. To date, this issue remains unstudied, but it may be a future concern to the integrity of the aquatic preserve.

In summary, structures now existing or being built in the peninsula and Cape number several hundred. Infrastructural and administrative obstacles toward further development do exist, but they are not insurmountable. The potential for several hundred additional single family or townhouse units exists, and, if any developer proposes to tackle the long range problems of potable water and waste water treatment and if the County continues to assign little value to the need for hurricane clearance time, developments of greater density will likely occur. Along the mainland Bay shore less developmental pressure exists and extensive wetlands and flood prone areas provide obstacles. Anything beyond scattered and low density development here is unlikely without a concerted planning effort and commitment to mitigation of impacts and provisions of infrastructure.

Part 2:

Natural Systems and Their Components

A. The Components of Barrier Structures

Along most of the coastal stretch from Massachusetts to Texas lies a series of narrow and elongated sandy islands and peninsulas collectively known as barrier structures. The complex interaction in near shore areas between wind, water, sea bottom, and land masses are a good example of the constantly fluctuating features of our environment. Barrier structures are as much a process in motion as a product, for the patterns of deposition and erosion creating and altering them present changes which can be seen in a lifetime, or just a few seasons. Moreover, because of their location and malleable condition, they remain vulnerable to the sudden and dramatic changes of coastal storms: erosion, deposition, overwash, and channel breaks (McHarg 1969).

The action of waves on shore brings in a suspension of sand which settles out as the waves lose energy and break. Sand bars form just seaward of land where the immediate wave energy has diminished sufficiently to allow sedimentation. With conducive angle of the ocean floor and direction of the current relative to the mainland, additional coalescence may occur resulting in the formation of an island or peninsula (McHarg 1969). Over longer periods of time barrier islands gradually become land as sea level falls; today, relict dunes, particularly prominent in north Florida, may be found as far inland as northern Liberty County (Bruce Means, pers. comm.).

The Cape San Blas shoals, an irregular shallow water area, predated the formation of Cape San Blas and St. Joseph Peninsula barrier structure and is responsible for its present configuration. After the mouth of the Apalachicola River moved from what is now St. Joseph Bay to its present location, wave action deflected littoral drift northward eventually resulting in the emergency of St. Joseph Peninsula north of Lighthouse Bay. The Cape San Blas portion of the peninsula is the result of a different depositional pattern and is basically a westward extension of the mainland. Because of the Cape San Blas Shoals and their effect on the prevailing currents and waves, the Cape San Blas elbow is the most rapidly changing part of the entire barrier structure (Sewart 1962).

Barrier structures are typically very narrow, and St. Joseph Peninsula is consistent with this pattern. The widest portion, about 4,500 feet across, occurs near the north end.

As a sand bar becomes a barrier island the two sides evolve differently. Pioneering salt-tolerant plants grow in the less turbulent bay side, and sand dunes are created by wind and waves on the Gulf side. This initial dune grows and allows further plant colonization to occur on the leeward side aided by a partial blockage of salt spray. This area, called the backbone, is the most protected and ecologically diverse of the peninsula.

Seaward of this primary dune, the wind action eventually forms a trough, salt-tolerant plants colonize this new area, and a second dune area emerges. This new primary dune (the old primary dune is now called secondary) is now the principal protective structure for the peninsula, the bay waters, and the

mainland. Stabilized by panic grass (Panicum amarulum) and sea oats (Uniola paniculata), it does not tolerate construction or other activities. Breaks in the primary dune wall present problems for structures and habitats located in the interior. Thus, in the T. H. Stone State Park, beach access is by boardwalk to protect this important dune system.

The cross section reveals a number of distinct habitats. The high energy beach area and the immediate offshore waters are the home of various invertebrates which feed on phytoplankton, detritus, and other invertebrates. A number of shore birds are regularly found there. Inland from the beach is the primary dune with its stabilizing vegetation and the dune trough. The characteristic species are tolerant of sun, salt, and dry conditions and include: Florida rosemary (Ceratiola ericoides), prickly pear cactus (Opuntia stricta), yaupon holly (Ilex vomitoria), and stunted growths of sand live oak (Quercus virginianan). The plants, beyond the secondary dune, merge into a sand pine forest with gallberry and palmetto undergrowth, and finally, in the backbone area, into a mature slash pine forest. The rim of the bay is characterized by needlerush (Juncus roemerianus) and cordgrass (Spartina alterniflora). Fresh water ponds exist in only a few portions of the peninsula, at Cape San Blas, Eagle Harbor, and the Spit, providing habitat for a variety of wetland animals, such as alligators, great egrets, and leopard frogs (McHarg 1969).

B. Salt Marshes, Tidal Flats, and Islands

Beaches are only one result of the interface between land and sea. Virtually the entire rim of the protected St. Joseph Bay is bordered by a salt marsh

characterized by needlerush and cordgrass. Although a narrow bank along much of the peninsula, the marsh widens near Pig Bayou and is a prominent feature of the very shallow area of the southern and southeastern portions of the Bay. Extending into the Bay for hundreds of feet at places, this transitional zone also includes tidal mud-flats, exposed at low tide. In a few places along the eastern Bay shore the salt marsh is influenced by tidal creeks which supply some fresh water to the Bay. The wetlands correspondingly extend up into the streams.

The coastal wetlands and tidal flats constitute an extremely productive ecosystem. The primary producers and dominant species in this area are needlerush (generally the taller and more landward species of salt marsh vegetation) and cordgrass (generally shorter, stouter and more waterward). These plants, along with the nonvascular algae and diatoms, can produce up to ten tons of biomass per acre per year. Such production is due to their utilization of six percent of the sun's available radiant energy, one of the highest rates known. Nutrient input for salt marshes comes from water borne minerals and the presence of nitrogen fixing algae.

The ecological importance of this photosynthetic biomass is that it becomes available as a food source for several species of bacteria and invertebrates, which in turn support the food chain for primary and top carnivores including humans. Microorganisms digest cellulose, making the decaying marsh grasses available to deposit feeding worms, insects, crabs, snails, and other animals. In turn they are eaten by predators including spiders, snakes, fish, herons and raccoons. The biomass does not all remain within the marsh, because tidal

transport carries much of the detritus onto the tidal mud-flats. Here the detritus is consumed by benthic molluscs, worms, and crustaceans, which in turn are consumed by various invertebrates and fishes living in St. Joseph Bay (Teal & Teal 1969).

Patterns of deposition in the lower Bay have resulted in the formation of several small islands along the southeastern Bay shore which are vegetated on low islands by emergent marsh vegetation and, on the higher islands by cabbage palms (Sabal palmetto) and slash pines (Pinus elliottii). While not critical to the physiography or ecology of the Bay system, these islands do provide important wildlife habitat.

C. Marine Environment of St. Joseph Bay

St. Joseph Bay is roughly oval in shape. The somewhat flattened southern edge is about three miles wide. The single opening to the Gulf of Mexico lies 14 miles north where it is constricted by St. Joseph Point to two miles across. At its widest point, near Port St. Joe, it is 6.4 miles wide. Despite both the relatively small mouth of St. Joseph Bay and the freshwater input from the Gulf County Canal and tidal creeks, the salinity in the Bay ranges from 28.8 to 34.3 parts per thousand, (ppt) nearly identical to open Gulf readings in the vicinity. Readings near the Canal, however, are only 16.9 ppt. Water temperatures range from 13.5°C in the winter to 29.5°C in the summer, slightly warmer than mean Gulf temperatures.

Currents in St. Joseph Bay are slight and are due to the once daily tidal ebb and flow. A natural tidal channel occurring as a break in the shoal near St.

Joseph Point (now expanded into the authorized navigation channel) allows Gulf water to enter during high tide. This water forms a current which circulates in a counterclockwise fashion in the upper Bay, but it is slow and largely superficial. In most of the extensive shallow reaches of the lower Bay, there is no appreciable current save for the daily tide. Therefore this most productive area of the bay is largely a closed system (Stewart 1962).

A comprehensive study of water quality in St. Joseph Bay has never been conducted, but the Bay is evidently pristine except that part inside a one mile radius of the vicinity of Port St. Joe and the navigation channel (Ross & Jones 1979). During the early 1970's, the city had only minimal sewage treatment and the discharges of the various industrial facilities were essentially unregulated. Significant improvements have been made since then in regard to water quality of authorized discharges. Now an overall improvement in the water quality is apparent due to monitoring by the city's sewage treatment plant (Mel Lehman, pers. comm.). In the lower Bay, an area authorized for shellfish harvesting, the Bureau of Marine Resources Regulation and Development of the Department of Natural Resources monitors water quality for its potential impact on shellfish. Their uncomplete data show that the water quality is consistently high, although recent concern exists about the potential long range impacts on the bay which may result from further development of the peninsula (David Heil, pers. comm.). The preserve area outside of the Bay is unclassified for shellfish harvesting.

The Bay bottom was first scientifically and systematically explored in 1841 by the U.S. Navy and re-examined and mapped by the U.S. Coast and Geodetic Survey in 1875. Comparison of their findings with contemporary explorations have

found very little alteration throughout the area. The exceptions are the man made features of the navigation channel, called the Gulf County Canal, spoil deposits, and the natural change of Cape San Blas, which has eroded considerably since the last century (Stewart 1962).

D. Seagrasses

The deepest spots in the Bay, located in the northwest quadrant, are 36 feet; and roughly two-thirds of the bay is deeper than 20 feet. The remaining one-sixth of the bay is less than five feet deep, and allows seagrass growth, the Bay's principal point of biological interest. Seagrasses are found in scattered narrow bands near shore in the area north of Port St. Joe, except where the Gulf County Canal's freshwater influence is strongest (Phillips et al. 1978). Another exception includes a continuous band from the city pier area running south along the Bay shore until it reaches out from the east side beyond Black's Island, and curves into the western side of the Bay. Along that side the seagrasses are somewhat more constrained by deeper water pockets north of Pig Island and in the vicinity of the Eagle Harbor channel, but otherwise they run all the way up to St. Joseph Point. The seagrasses thin out considerably near the north end where the water levels are deeper and large spoil deposits have constrained their growth. Throughout this range small bare bottom areas exist, some of which may be the result of tidal channel action. Most shallow areas are covered by motorboat propeller scars. From an aerial view the extensive seagrass meadow, augmented by algae, is in the shape of a horseshoe (Savastano et al. 1984).

These seagrass beds are an underwater equivalent of salt marshes in terms of net productivity. The bay waters are shallow, clear, and therefore sunlight availability allows aquatic plants to thrive. There are three kinds of seagrasses found in the Bay. Shoal grass (Halodule wrightii) which can tolerate temporary exposure is found in the shallowest areas. It is an opportunistic species, recolonizing disturbed zones, such as spoil areas. The least common of the seagrasses in the Bay is a narrow leaved plant called manatee grass (Syringodium filiforme); it is found below the shallowest areas colonized by shoal grass and is interspersed with the other seagrass species. By far the most predominant of the seagrasses is the broad leaved turtle grass (Thalassia testudinum). All three kinds of seagrasses have well established root networks which allow them to grow in dense patches extending over several acres with few breaks (U.S. Army corps of Engineers 1973).

In addition to their biomass production, the seagrasses provide other important auxiliary functions. Their solid roots tend to stabilize the bottom sediments, preventing erosion. During coastal storms they function to dampen wave action, a significant benefit to coastal construction.

This calm water environment is the basis for a complex ecology based on seagrasses. In addition to photosynthesizing, the seagrasses allow epiphytes such as algae and phytoplankton to attach. Floating detritus, either from the salt marshes or the seagrass beds, are trapped in the area by the seagrass blades and become a vital source of food for many small marine invertebrates and fishes. In particular, the seagrasses are the principal habitat for the bay scallop, a significant commercial and recreational resource in the area. Similarly, these shallow and sheltered areas provide habitat for shrimp,

mullet, redfish, and other species of commercial significance, as well as other species of no direct commercial importance, yet but still are integral parts of the seagrass ecosystem (Phillips et al. 1960).

Seagrasses do not grow below 15 to 20 feet found at the center of the Bay's horseshoe, but the detrital food base feeds deeper dwelling marine animals including the commercially dredged hardshell clams and shrimp (David Heil, pers. comm.).

The navigation channel, 35 feet deep, is largely devoid of benthic life. It divides the Bay between the deeper waters and the area called Bell's Shoal, at the mouth of the Bay. Bell's Shoal is the site of the Bay's highest concentration of sunray venus clams, once harvested commercially (David Heil, pers. comm.). Beyond Bell's Shoal, and outside of the Bay, the bathymetry quickly assumes a typical pattern for a beach area terrace. Proceeding down the Gulf side of the peninsula, the offshore terrace achieves a depth of up to 39 feet by the edge of the defined aquatic preserve boundary.

E. Wildlife

The terrestrial and marine ecosystems detailed in the preceding three sections all support a full complement of wildlife. The number of species living in coastal areas and estuarine systems is high and diverse. Therefore natural resource should be preserved, as efforts for an unspoiled and unpolluted habitat would provide the best opportunity for the greatest number of species to feed, live and reproduce. Although some species are individually important because they are associated with a specific use (i.e.,

scallop harvesting or fishing), other species are central to other activities (i.e., bird watching, scientific research, and nature photography). The lesser known or less obvious species therefore play their part to enhance the quality of life in Gulf County. (A partial catalogue of terrestrial and aquatic animals in the St. Joe Bay Aquatic Preserve is contained in the Bureau's resource inventory file maintained in the Central Office in Tallahassee.)

Coastal Gulf County is important for its location in relation to one of nature's most striking phenomena: bird migration. Barrier structures in the panhandle area are a final staging area for southbound birds in the fall. Here they make a final pause for food and rest before continuing south to Central and South America and the Caribbean islands. In the spring the reverse is true; the barrier structures are the first land the birds reach in hundreds of miles, and for a few weeks the area is concentrated with thousands of migratory birds including warblers, vireos, tanagers, and grosbeaks.

Hawk migration in the fall is particularly striking, for St. Joseph Peninsula draws hawks from much of the North American land mass. Riding autumnal cold fronts, several species of hawks and falcons follow the land as far south as possible, culminating in a great assembly over the St. Joseph Peninsula. Estimates of 3,000 to 5,000 hawks per year may be seen during the month of October, and bird watchers from around the country gather for a good opportunity to see the endangered peregrine falcon.

F. Species Classifications

A number of species found in coastal Gulf County are of special interest because of their scarcity or declining populations. Separate lists, which are clearly parallel in their intent, are maintained by the U.S. Fish and Wildlife Service and the Florida Game and Fresh Water Fish Commission; these lists designate appropriate animal species as either threatened or endangered, depending upon the degree of their relative scarcity or the threat to their continued existence as a species. The state list also includes an additional early cautionary category called species of special concern.

In coastal Gulf County there are two birds with the federal classification of endangered. The bald eagle is thought to breed in lower Gulf County while the peregrine falcon may be found there during migration, particularly in the fall. The federal classification of threatened is assigned to three birds and two reptiles. The Snowy plover, and Least tern are both nesters of the open beach whose need for unmolested beach is under pressure from coastal development. While the piping plover's situation is similar, they do not nest in Florida, and only visit the Gulf Coast as a winter resident. The American alligator, a threatened reptile, is found in fresh water areas near the coast, including those fresh water areas on the Peninsula (Florida Natural Areas Inventory, unpub. data). Atlantic loggerhead turtles spend most of their lives at sea but come ashore on the Peninsula beaches to lay their eggs. Three birds, the little blue heron, tri-colored heron, and snowy egret, are classified as species of special concern because of recent world-wide population declines. This status is also given to the gopher turtle and brown

pelicans, which appear to be making comebacks from earlier endangered status, are now monitored with a species of special concern label.

Similar classifications are also given to plants, although federal designations are uncommon and the state list is maintained by the Florida department of Agriculture and Consumer Services. One species found in the coastal mainland area of Gulf County is one of only nine species in Florida with a federally endangered classification, the Chapman's rhododendron (Rhododendron chapmanii). One other species, Godfrey's blazing star (Liatris provincialis), is a state-listed endangered species. The state list also includes four threatened species: prickly pear cactus (Opuntia Stricta), pine woods aster (Aster spinulosus), Chapman's crownbeard (Verbesina chapmanii), and southern milkweed (Asclepias viridula) (Florida Game and Freshwater Fish Commission 1985).

G. Summary of Natural Systems

The collection of distinct ecosystems which comprise the coastal Gulf County area in and surrounding St. Joseph Bay are among the most pristine ecosystems of their type in the state, despite many human incursions and alterations. The Peninsula and Cape are a classic example of a barrier structure, providing shelter for the calm, shallow, and pristine waters of St. Joseph Bay. The beach and dune area, sand pine scrub, slash pine forest, and salt marsh ecosystems provide essential habitat for a wide variety of animals, including the thousands of hawks and other migratory birds. The bay waters, though somewhat polluted in the immediate vicinity of Port St. Joe are for the most part, pristine. The shallow waters contain hundreds of acres of seagrass

beds, home to a highly developed network of fishes and invertebrates,
including several of commercial value, such as bay scallops.

Chapter V

RESOURCE MANAGEMENT

A. Introduction

The main objective of the resource management plan in the aquatic preserve is to protect the resources of the aquatic preserve for the benefit of future generations (Section 258.35, F.S.). The management of the St. Joseph Bay Aquatic Preserve will be directed toward the maintenance of the existing or essentially natural conditions. This part of the management plan addresses the policies and procedures which both onsite and administrative personnel will pursue. The onsite management will involve DNR's field personnel assigned to the aquatic preserve. The administrative management will involve Division of Recreation and Parks' personnel (both in the field and in Tallahassee) and Division of State Lands' personnel, cooperating in the review of applications for use of state-owned lands and related activities surrounding the preserve. These personnel will be interacting with various government and non-government entities, interest groups, and individuals.

B. Onsite Management Objectives

The onsite management objectives are reflected in the activities that the field personnel become involved in (i.e., observation, research, public interaction, emergency responses, etc.) to protect and enhance the resources within the aquatic preserve. Other activities, such as the interaction with other government and non-government entities, are covered in more detail in

Chapter VI (Management Implementation Network). The field personnel's duties are, with respect to management of the various uses of the aquatic preserve, addressed in more detail in Chapters VII and XI. The field personnel will generally be involved in all management activities concerning the St. Joseph Bay Aquatic Preserve.

1. Plant Communities

The communities of aquatic and wetland plants within the Preserve perform five major functions vital to the health and productivity of the aquatic system:

- a. they tend to stabilize geologic features in the face of dynamic forces (i.e., currents, tides, winds, and waves), which often act in concert to both erode and deposit;
- b. they create, from recycled nutrients and solar energy, the organic materials that fuel the marine food web which supports the area's fisheries, endangered species, migratory waterfowl, colonial water bird nesting colonies, raptors, marine mammals, and invertebrate life.
- c. they provide protected fisheries habitat for spawning and juvenile development, many of which are of economic importance to the commercial fisheries of the state and the nation;
- d. they provide roosting and nesting habitat for water birds; and,

- e. they filter pollutants from contaminated and channelized runoff from uplands within the adjacent watershed and, buffer the uplands from storm waves and winds.

The management objectives for plant communities will be to maintain and enhance these functions. Because these plant communities are critically important to the well-being of the Preserve, a program to work toward the protection and restoration of those communities affected by human activities should be developed.

Management Policy

- a. Field Familiarization and Documentation. Field personnel will become familiar with the plant species and communities present in the aquatic preserve, and locations of their occurrences.
- b. Literature Familiarization. Field personnel will assemble a working library of existing pertinent literature concerning the species and communities present in the aquatic preserve. Staff will become familiar with the ranges, life histories, ecological requirements, productivity, importance to water quality, contribution to landform stabilization, wildlife habitat provision, fisheries habitat provision, and fisheries food production of the plant communities within the aquatic preserves.
- c. Preparation of Guidelines of Management of Endangered Species. Field personnel, based on their field observations and literature reviews, will develop maps (using 7.5 minute quadrangles) showing the locations of threat-

ened and endangered plant species within the aquatic preserve. A set of management guidelines for each species, outlining the habitat requirements and the methods to sustain and/or restore these habitats will be developed. Field personnel, in the course of documenting the occurrence of threatened and endangered animals, will develop maps showing the locations and types of plant communities used by these animals for nesting, roosting, feeding, resting, spawning, etc. Literature information and personal observations will then be used to develop guidelines for maintaining (or restoring if necessary) the "critical habitat" required by each species.

d. Monitoring of Plant Communities for Natural Changes. Field personnel will become familiar with the use of aerial photography and LANDSAT imagery, for the study and monitoring of plant communities (historically and at the present time) and will use this remote sensing in conjunction with field observations to monitor and document natural changes such as:

1. freeze damage to, and recovery of, salt marsh communities;
2. wind and wave damage to salt marsh and beach communities from storms and hurricanes;
3. accretion-related seaward extension of salt marsh and beach communities;
4. erosion-related landward retraction of salt marsh and beach communities;

5. depositional burying of marine grassbed communities;
6. invasions of exotic plant species and revegetation by native species after exotic plant removal projects;
7. pathogen damage to and recovery of plant communities.

e. Identification of Areas and Communities in Need of Restoration. Field personnel will, as time permits, systematically survey the aquatic preserve to determine the location, nature, and extent of environmental damages from human activities and assess the possibility of restoring each site according to whether the site is publicly or privately owned, and the cost and effort required.

f. Protection of Plant Communities. Field personnel shall protect the plant communities from the various uses of sovereign lands within the aquatic preserve according to the following guidelines.

1. Field personnel in their biological reports shall not recommend for approval any proposed use of sovereignty submerged lands when the plant communities in the proposed use area appear to be jeopardized.

- i. Removal of salt marsh vegetation shall only be permitted for minimum access from the mean high water line to a dock or pier. The destructive clearing of salt marshes in sovereignty lands shall be strictly prohibited.

- ii. Marine grassbed communities shall not be removed or shaded to such an extent as to cause the death of a significant area of the community. They shall not be subjected to unacceptable turbidity, decreased light penetration, propeller or net damage.
2. Field personnel shall be notified of applications for uses of submerged lands within the aquatic preserve by the Bureau of Land and Aquatic Resource Management central office. No applications will be approved within Class 1 and 2 Resource Protection areas (see Section B(6) of this chapter) without a thorough review by the field personnel. The field personnel will inspect the site, assess the potential impacts to the plant communities, and then convey their recommendations to the central office as required.
3. Field personnel will initiate various educational programs and supplement existing educational programs designed to increase public awareness of the damage that recreational, private and commercial uses (i.e., propeller damage) can inflict on marine grassbed communities. Education programs can also be undertaken with other federal, state or local groups (i.e., Florida Sea Grant, school boards, etc.).
4. Field personnel will develop an exotic plant control and removal plan after monitoring the rate and extent of invasion by exotic species.
5. In cooperation with the Department of Community Affairs field personnel will familiarize themselves with the results of a study

under the Coastal Energy Impact Program in assessing the potential impacts of an oil tanker spill or drilling rig accident on the natural resources of the St. Joseph Bay Aquatic Preserve.

g. Restoration of Plant Communities. Field personnel will consult with professionals in the wetlands restoration/revegetation field to determine the advisability of using healthy beds of marine grasses as a stock source to restore damaged grassbeds. They will develop guidelines for restoring marine grassbeds in the aquatic preserve.

Field personnel will identify easily accessible salt marsh communities within the aquatic preserve where a high density of salt marsh seedlings could serve as a nursery stock source for transplanting to restoration sites. Field personnel will consult with professionals in the wetlands restoration/revegetation field concerning proven procedures for transplanting and nurturing salt marsh species and will develop guidelines for restoring these communities in the aquatic preserve.

In the event that plant restoration is required as the result of a permit application with DER, or as a result of any other process, the field personnel will be responsible for monitoring the restoration activity. This might include advising the individuals involved in the actual restoration work on the best techniques under the available restoration guidelines. The field personnel will monitor the success of the restoration project after the work is completed.

h. Identification of Research Needs. Field personnel will identify research needs concerning plant communities within the aquatic preserve with special emphasis given to data needs that would increase the capability of field personnel to manage plant communities under environmental stress, and to determine threshold tolerances for plant community health and diversity in relation to degraded environmental conditions.

i. Coordination With Other Researchers. Field personnel will become familiar with research projects being conducted within the aquatic preserve by state and federal agency biologists and non-government researchers. Water quality research issues, as they affect plant communities, should also be closely followed. This familiarization should lead to a better understanding of both agencies' personnel and a better awareness of the data findings and uses. The research liaison will also be addressed in Chapter X (Scientific Research).

2. ANIMAL LIFE

The richness of the animal life of the St. Joseph Bay area is important to the designation of the aquatic preserve. The fish, shrimp, and crabs within the aquatic preserve are valuable resources on which recreational and commercial fisheries depend. Large areas of undisturbed wetlands are excellent habitat for many types of wildlife. These wildlife include an extensive list of endangered species, migratory waterfowl, colonial waterbirds, invertebrates and vertebrates.

The management objective for animal life within the aquatic preserve will be the protection through preservation of habitats and living conditions in the most natural condition possible.

Management Policy

- a. Field Familiarization and Documentation. Field personnel will become familiar with the major animal species in each habitat in the aquatic preserve. This identification process will include the location, number, season of sighting, weather conditions and any other factors which may be necessary to build a working knowledge of the species, and their interaction and occurrence in the aquatic preserve.
- b. Literature Familiarization. The field personnel will assemble a working library of existing literature concerning the major animal species and communities within the aquatic preserve. The field personnel will become familiar with life histories, ecological requirements, position in the community, habitat and other factors necessary for sound management.
- c. Preparation of Guidelines for the Management of the Endangered Species Within the Aquatic Preserve. The field personnel will become familiar with the guidelines of the Florida Game and Fresh Water Fish Commission, U.S. Fish and Wildlife Service, Department of Natural Resources' Division of Marine Resources, National Marine Fisheries Service, Marine Fisheries Commission, and any other applicable agencies and non-government organizations involved in the management of endangered species. These guidelines will be used in conjunction with the field familiarization, documentation, and mapping to develop

management guidelines for each endangered species within the aquatic preserve. Special guidelines shall be developed and implemented for the management of areas within the aquatic preserve that are identified as critical habitat for endangered species.

d. Monitoring Changes in Animal Populations. Field personnel will study and monitor changes in animal species that are caused by natural phenomena, such as:

- i. freezes;
- ii. storms and hurricanes;
- iii. changes in habitat due to changes in plant types;
- iv. changes in habitat due to water quality changes; and
- v. geologic or hydrologic changes including erosion and any other physical changes.

e. Protection of Animal Life From Human Uses of the Aquatic Preserve. Field personnel, during the process of resource impact analysis in the review of use applications in or affecting the preserve, shall consider the protection of animal species. The review shall also consider the potential effects of the proposed use on the plant communities as they function as habitat for the animal life and uses that may cause a disturbance in the natural activities and functions of the animal life (e.g., air pollution, excessive noise or bright lights affecting a bird rookery). The field personnel should be notified of any proposed activities within the aquatic preserve that might affect the well-being of animal life and should be involved in planning the activity so as to cause the least amount of stress on animal life.

f. Identification of Research Needs. The field personnel in the course of their duties shall identify research needs required to improve the management of animal life in the aquatic preserve. This identification process is more fully described in Chapter XII (Identified Program Needs).

g. Coordination With Other Researchers. Field personnel will become familiar with research projects conducted within the aquatic preserve by state and federal agency biologists and non-government researchers. This familiarization should lead to a better understanding of both agencies' personnel and a better awareness of the data findings and uses. The research liaison will also be addressed in Chapter X (Scientific Research).

3. GEOLOGIC FEATURES

The management of geologic features will require that the field personnel become aware of the natural geologic features and the changes, both human and natural, which affect these features within the aquatic preserve to better enable a review of applications for state-owned land uses that might affect these features. These geologic features will include inlets, islands, shoals, shorelines, embayments, and channels. The overall objective of the management of these features is to allow the naturally dynamic system to operate without man's influence or interference. Active management in this area shall include the review of proposed uses that might affect the geologic features within the aquatic preserve. The majority of these reviews will probably concern bulkheads, bridges and channels as they might affect state owned lands. The objective in the placement of bulkheads on lands upland of the aquatic preserve shall be that the natural contour and drainage be altered to the

least amount practicable. The use of rip rap with salt marsh or other suitable native plantings would be preferable to bulkheads within the preserve. Bulkheads are not allowed within the preserve, except as stated in Sections 258.42(2) and 258.44, F.S. and in accordance with the management objectives of the preserve.

Maintenance dredging of existing channels should also be carefully studied to remove conditions that require perennial maintenance and chronic environmental disturbances. New channels also have the potential to adversely impact the aquatic preserves, with varying influences in each preserve, depending on channel location.

The field personnel shall also be involved in the review of project proposals submitted to other agencies, such as the U.S. Army Corps of Engineers, Department of Environmental Regulation, the Department of Transportation or the Water Management Districts, and shall formally review and comment on any permit application that impacts the aquatic preserve. These projects shall be reviewed jointly with those agencies' personnel whenever possible. The field personnel will review these projects on behalf of the aquatic preserve and its resources.

4. ARCHAEOLOGICAL AND HISTORICAL SITES

Archaeological and historical sites have several characteristics which must be recognized in a resource management program.

- i. They are a finite and non-renewable resource.

- ii. Each site is unique because individually it represents the tangible remains of events which occurred at a specific time and place.

- iii. While these sites uniquely reflect localized events, these events and the origin of particular sites are related to conditions and events in other times and places. They also preserve traces of past biotic communities, climate, and other elements of the environment that may be of interest to other scientific disciplines.

- iv. These sites, particularly archaeological sites, are very fragile because their significance is derived not only from the individual artifacts within them, but especially from the spatial arrangement of those artifacts in both horizontal and vertical planes.

Administering Agency

The management of the archaeological and historical sites is authorized and administered by the Division of Archives, History and Records Management (DAHRM) in the Florida Department of State. The management authority for this area of management is presented in Chapter II (Management Authority).

Management Policy

The management policy presented here is one of conservation, as recommended by the DAHRM and subject to that agency's changes. Their policy is as follows:

1. The field personnel and all other agencies planning activities within the aquatic preserve shall coordinate closely with DAHRM in order to prevent any unauthorized disturbance of archaeological and historical sites that may exist on the affected tract. DAHRM is vested with the title to archaeological and historical resources abandoned on state lands and is responsible for administration and protection of such resources (Section 267.061(1)(b), F.S.). It is illegal to destroy or otherwise alter sites on state lands without a permit from DAHRM (Section 267.13, F.S.). Therefore, agencies planning activities should coordinate their plans with DAHRM at a sufficiently early stage to preclude inadvertent damage or destruction to these resources.

2. The nature of these sites' fragility and vulnerability to looting and other destructive forces required that the location of these sites not be widely known, if the location is known at all. In many instances DAHRM will have knowledge of the known and expected site distribution in an area. Special field surveys for unknown areas may be required by DAHRM to identify potential endangerment of a proposed activity to these archaeological and historical sites. This will be especially necessary in the case of activities contemplating ground disturbance over large areas.

3. In the case of known sites, activities that are expected to alter or damage these sites shall alter their management or development plans

as necessary, or make provisions so as not to disturb or damage such sites prior to professionally acceptable and authorized mitigation.

4. If in the course of a management activity, or as a result of development or the permitting of dredge/fill activities, it is determined that valuable historic or archaeological sites will be damaged or destroyed, DAHRM reserves the right to require salvage measures to mitigate the destructive impact of such activities on such sites (Section 267.061(1)(b), F.S.). Such salvage measures shall be accomplished before DAHRM would grant permission for site destruction.
5. Excavation of archaeological sites in the near future is discouraged. Archaeological sites within the aquatic preserve should be left undisturbed for the present, with particular attention devoted to preventing site looting by "treasure hunters".
6. Field personnel will note suspected sites for future surveys by DAHRM. Cooperation with other agencies in this activity is also encouraged by DAHRM. The DAHRM will help inform the field personnel about the characteristics and appearance of these sites.
7. Any discovery of instances of looting or unauthorized destruction of these sites will be reported to the DAHRM so that appropriate action may be initiated. The Florida Marine Patrol and other enforcement personnel of DNR shall provide enforcement assistance to DAHRM and make arrests or investigate cases of looting or other unauthorized

destruction of archaeological sites. The field personnel will follow the above management policy and become familiar with the personnel involved with this task in DAHRM and their procedures for identifying suspected sites.

5. WATER RESOURCES

Responsible management of water resources for the protection of human health and recreational enjoyment of aquatic preserve waters, as well as for the protection and enhancement of the preserve's plant and animal communities is one of the most critical aspects of aquatic preserve management. Research to understand how human activity can alter or detrimentally affect the dynamic characteristics of the preserve's various habitats can be approached confidently after monitoring data has been used to model the effects of naturally occurring variations on the same habitat. Only a single toxic substance may be necessary to initiate irreparable ecological damage and change in the water resources of the aquatic preserve estuarine ecosystem.

Management Policy

The successful management of the water resources of the aquatic preserve depends heavily on other government agencies (i.e., DER and the Water Management District) charged with regulating water quality and quantity. The objective of the water resources management shall be to maintain the naturally high water quality and to ensure the natural seasonal fluctuations of fresh water into the Bay. Sources of water resources data from non-government agencies, are dependent on or may be found among colleges, universities,

scientific foundations and private consultants working in the St. Joseph Bay area. These various entities have interests at many different levels and areas within the Bay system. The aquatic preserve management program will manage the water resources through coordination with these various entities. The field personnel will not conduct water sampling, but through the review of these data from other entities and from their own field observations, they will be able to identify water resource problems in the aquatic preserve. Efforts will be made to ensure consistency in project design and sampling techniques so that data from various studies can be used for integrated analysis.

a. Familiarization with the Jurisdiction, Personnel, and Monitoring Programs of Government Agencies and Other Entities. Field personnel will become thoroughly familiar with the jurisdiction, personnel and monitoring programs of other agencies, institutions and corporations involved in studying, monitoring, regulating and managing water resources within the aquatic preserve and the drainage basins which provide fresh water to this preserve. Those agencies known to be working or having potential activities affecting the preserve are listed below; others may be added as they are identified.

1. Florida Department of Environmental Regulation
2. Gulf County Health Department
3. Northwest Florida Water Management District
4. U. S. Geological Survey
5. U. S. Fish and Wildlife Service
6. National Oceanic and Atmospheric Administration
7. Florida Department of Transportation

8. Apalachee Regional Planning Council
9. Florida Game and Fresh Water Fish Commission
10. Florida Department of Natural Resources Marine Research Laboratory
11. Florida State University
12. U. S. Army Corps of Engineers
13. Southeastern Fisheries Association, Inc.
14. U. S. Environmental Protection Agency
15. Department of Natural Resources--Shellfish Sanitation Section
16. Florida Division of Forestry
17. Florida Marine Patrol

b. Monitoring of Water Resources by Cooperative Data Collection and Review.

Field personnel will: (1) promote coordination among involved agencies in planning monitoring programs and in evaluating monitoring data, (2) monitor water resources within the preserve by reviewing the data collected and compiled by those agencies as it applies to the aquatic preserve and its resources.

c. Review of Permits and Lease Applications for Aquatic Preserve Uses and Watershed Activities that Would Affect the Preserve Water Resources.

Field personnel will review sovereign land lease applications, development of regional impact reviews, and DER/COE permit applications in cooperation with other agencies as necessary to monitor the potential impacts on the water resources of the aquatic preserve.

d. Familiarization with and Monitoring of Activities and Users Which Regularly Contribute Pollutants to Preserve Waters. Field personnel will

become familiar with the activities and users which regularly or potentially contribute pollutants to the waters of the aquatic preserve. This monitoring will be accomplished directly by field observations and indirectly by review of other entities' water resources data. Field personnel will encourage and coordinate with other agencies involved with water resources monitoring to consider more detailed field monitoring in areas of the preserve where the incidence of polluting activities is found to be high. These monitoring activities will also include the monitoring of freshwater releases into the preserves and their effect on the environment.

These activities will also be applicable to Chapter X (Scientific Research), and the coordination through Chapter VI (Management Implementation Network). The field personnel's onsite presence will be complemented by their reliance on other agencies and entities for data and regulation. The field personnel will have the ability to visually monitor water resource crises and phenomena as they occur and when they affect other resources.

6. CUMULATIVE IMPACT ANALYSIS

Cumulative impacts are the sum total of major and minor changes or effects upon a natural system. Taken singularly these effects may not constitute a notable change in the condition of the natural system, but as these single changes or uses accumulate, their combined impact may result in a substantive environmental disturbance or degradation of the natural system.

The review of proposed uses in the aquatic preserve from the perspective of cumulative impact analysis requires a thorough knowledge of the natural system and the various interactions and dynamics within that system. This aquatic preserve management program will initiate development of a cumulative impact analysis program. The evaluation of cumulative impacts shall include the following criteria from Chapter 18-20, F.A.C.:

- (1) The number and extent of similar actions within the preserve which have previously affected or are likely to affect the preserve, whether considered by the Department under its current authority or which existed prior to or since the enactment of the Act; and,
- (2) The similar activities within the preserve which are currently under consideration by the department; and
- (3) Direct and indirect effects upon the preserve which may reasonably be expected to result from the activity; and
- (4) The extent to which the activity is consistent with management plans for the preserve, when developed; and
- (5) The extent to which the activity is in accordance with comprehensive plans adopted by affected local governments, pursuant to Section 163.3161, F.S., and other applicable plans adopted by local, state and federal governmental agencies.

- (6) The extent to which the loss of beneficial hydrologic and biologic functions would adversely impact the quality or utility of the preserve; and
- (7) The extent to which mitigation measures may partially off-set adverse impacts. Proposed mitigation to compensate for damages to resources in the preserve will only be considered when no other reasonable alternatives exist.

The availability of onsite preserve staff who are familiar with the distinctive characteristics of this system, coupled with their ability to access LANDSAT imagery and mapping, and other data sources, is the key to development of a successful cumulative impact analysis program. As cumulative impacts are identified for specific areas and/or resources, they will become an integral part of the project analysis and decision-making process.

7. MANAGEMENT OF ENCROACHMENTS

The management of encroachments in the preserve will concern the unauthorized placement of structures, unauthorized dredging or filling, or other illegal uses in the aquatic preserve. These encroachments might also include illegal activities associated with an approved use (e.g., extension of a dock, construction of boat houses, extension of an approved channel).

The management policy for the field personnel, after identification of a suspected illegal encroachment, will involve a reporting procedure and the monitoring of the remedial action. After a field identification of suspected encroachments, field personnel will notify the central office to verify the

title of the property and research the possibility of the use being an approved activity. Due to the extensive areas involved in the aquatic preserve, this will be a progressive activity depending on the field personnel's eventual familiarization with the preserve and the approved uses. The potential for unauthorized activities in such an extensive area may possibly require some type of mapping and recording system to assist the field personnel in their monitoring.

The management action for verified illegal encroachment will be developed by the agencies specifically involved (i.e, DNR, DER). The field personnel will assist, as necessary, with field evaluations or other support activities. The final action will be monitored by the field personnel, at the direction of the Trustees to the central office. The procedures followed in these applications will be decided on a case by case basis.

C. RESOURCE MAPPING AND RESOURCE PROTECTION AREAS

The efficient description and location of resources within such a large area requires the use of remote sensing techniques. This work will be done in conjunction with DNR's Marine Research Laboratory's Assessment of Fishery Habitat Loss Study in the St. Joseph Bay area. Marine Research Laboratory personnel have developed resource and habitat identification mapping through the use of LANDSAT (satellite) imagery and aerial photography.

The vegetation and land use mapping done in this study will become the basis for the development of a Resource Protection Area management system in the aquatic preserves. This mapping system will identify and classify various

resources within the aquatic preserves that require protection by the management program. This mapping system will also give acreage totals for each land use and vegetation classification in the preserves. The vegetation portion of the mapping will be augmented over time by wildlife and fisheries information (endangered species, bird rookeries, etc.), archaeological and historical site information and other resource factors deemed crucial to the continued health and viability of the aquatic preserves.

The onsite managers will supplement this mapping with the above information to develop and update a Resource Protection Area (RPA) mapping program. The RPA mapping system is based on three levels of resource classification. The Class 1 level will contain resources of the highest quality. Uses proposed for these areas will receive the most rigorous review. The Class 1 level will include one or more of the following: marine grassbeds; beaches; saltwater marsh; oyster bars; archaeological and historical sites (upland and submerged); endangered species habitat; colonial water bird nesting sites; and other appropriate factors.

The Class 2 areas will be defined as those areas containing the resources of Class 1, but in a transitional condition compared to Class 1. These resources will either be building toward Class 1 status or declining to Class 3 status. Class 2 areas will require careful field review as to the specific area's sensitivity to each proposed use. In some respects, these areas may be as sensitive or more sensitive to disturbances as Class 1 areas. The resources of Class 2 will include: marine grassbeds; salt marsh species colonizing new lands; and other resources of Class 1 type that fit in the Class 2 condition.

Class 3 areas will be characterized by the general absence of the attributes of the above two classes. Class 3 areas may have small localized Class 1 or 2 areas within them. Class 3 will generally have deep water areas or areas with no significant vegetation or wildlife attributes. Nearshore and bottom areas significantly modified by man will be designated Class 3.

These RPA maps will require periodic revisions as the onsite managers learn more about the resource's reaction to man's uses. Scientific research and other data additions may also require modification of this system. Natural changes will also require modification of this classification system. Periodic checking by LANDSAT satellite imagery will become useful for remote sensing monitoring as its use is more fully developed.

The RPA maps will become a planning tool for both onsite and central office staff. More detailed field review will still be required to supplement this information on a case by case basis, as necessary.

The initial development, as well as periodic review, will require support and assistance of the many other resource regulating and managing agencies, as well as local and regional government entities. Support will also be requested from the colleges, universities, foundations and other interest groups and individuals.

D. ADMINISTRATIVE MANAGEMENT OBJECTIVES

This section of the chapter addresses the role of the central office, in the aquatic preserve management planning and implementation process. The central

office's role is generally interpreted within the context of coordinating activities with the field personnel. This coordination linkage is important to many program aspects, including project review and evaluation, local contact initiation, administrative rule development, contractual services and conflict resolution; routine support (payroll, operating expenses, etc.) usually extended by the central office to the onsite managers. All program activities identified within this context are designed to protect and enhance the environmental, educational, scientific, and aesthetic qualities of the natural systems of the aquatic preserve.

1. Objectives

Specifically, the following administrative objectives are an essential part of the aquatic preserve management program.

- a. To ensure a comprehensive, coordinated review and evaluation of proposed activities potentially affecting the environmental integrity of the aquatic preserve.
- b. To serve as the link between aquatic preserve field personnel, and state agencies and programs which originate in Tallahassee.
- c. To serve as the primary staff in the development of administrative rule additions, deletions, and revisions.
- d. To serve as the administrative staff for contractual agreements and services.
- e. To establish and maintain a conflict resolution process.
- f. To review all existing and past activities as to their effect on the environmental integrity of the aquatic preserve.

2. Project Review and Evaluation

A major element in the administration of an aquatic preserve management system is the establishment of a thorough project review process. It is the program's intent that the central office staff review all proposed activities requiring the use of state-owned lands within the preserve.

Sections 258.42 through 258.44, F.S., establish the legal context within which all proposed uses of the aquatic preserve must be evaluated.

Essentially, these sections require that projects be basically water dependent or water-enhanced, not contrary to the lawful and traditional uses of the preserve, and not infringing upon the traditional riparian rights of the upland property owner.

The primary mechanism through which proposed uses are reviewed is accomplished by participation in the state lands management process as established by Chapter 253, F.S., and modified by Chapter 258, F.S. The central office was administratively designated, on October 4, 1982, as an agent of the Trustees, for the purposes of evaluating the environmental consequences of proposed uses of state-owned lands within aquatic preserves.

In conducting the environmental evaluations, the central office staff will rely heavily upon the most current, readily available data such as Department of Transportation (DOT) aerial photography, LANDSAT imagery, DER biological reports, and other data resources. If a proposed activity is legally consistent with the maintenance criteria outlined in Section 258.42, F.S. and

Chapter 18-20, F.A.C., and is generally of negligible environmental concern, then the project review will likely be conducted in its entirety by the central office staff, utilizing the generalized environmental data.

The field personnel will be requested to conduct a more detailed environmental assessment of the project if the central office staff, during the course of the preliminary application review, determines that the requested use of state-owned lands may have a significant effect upon the environmental integrity of the preserve. Copies of all applications received will be provided to the field personnel for project monitoring and assessment of the possible cumulative impacts.

Field personnel will be encouraged to establish direct communication links with the various regulatory and management agencies for purposes of obtaining advance notification of projects potentially affecting the preserve. All environmental review and assessments, however, will be channeled through the central office unless other arrangements have been previously cleared with the central office.

While the State Lands Management Program authorized by Chapters 253 and 258, F.S. and Chapter 18-20 and 18-21, F.A.C. is expected to be the primary management implementation vehicle for the aquatic preserve, it is by no means the only vehicle. Section 253.77, F.S., as amended, and the December 1982 Memorandum of Understanding between the COE, DER and DNR provide direct access to DER's permitting process for DNR. The Development of Regional Impact (DRI) and other regional or state level review processes represent other implementation mechanisms. The basic review approach and the evaluation relationship

between the field personnel and the central office staff will be the same as the case involving the State Lands Management program.

One aspect of the aquatic preserve review and evaluation program is the identification of proposed activities that are either generally or specifically prohibited. Immediately upon review of such project applications, the central office staff will notify the Division of State Lands (or other program managers) that the proposed activity is legally unapprovable for the stated reasons. For those proposals which are subject to denial due to their adverse environmental impacts, even though the activity may be permissible, Section 258.42, F.S., specifically provides that:

- "(1) No further sale, lease, or transfer of sovereignty submerged lands shall be approved or consummated by the trustees except when such sale, lease, or transfer is in the public interest.

- (2) The trustees shall not approve the waterward relocation or setting of bulkhead lines waterward of the line of mean high water within the preserve except when public road and bridge construction projects have no reasonable alternative and it is shown to be not contrary to the public interest.

- (3) (a) No further dredging or filling of submerged lands shall be approved by the trustees except the following activities may be authorized pursuant to a permit:

1. Such minimum dredging and spoiling as may be authorized for a public navigation project.
2. Such minimum dredging and spoiling as may be authorized for creation and maintenance of marinas, piers, and docks and their attendant navigation channels.
3. Such other alteration of physical conditions as may, in the opinion of the trustees, be necessary to enhance the quality or utility of the preserve or the public health generally.
4. Such other maintenance dredging as may be required for existing navigation channels.
5. Such restoration of land as authorized by Section 253.124(8).
6. Such reasonable improvements as may be necessary for public utility installation or expansion.
7. Installation and maintenance of oil and gas transportation facilities, provided such facilities are properly marked with marine aids to navigation as prescribed by federal law.

- (b) There shall, in no case, be any dredging seaward of a bulkhead line for the sole or primary purpose of providing fill for any area landward of a bulkhead line.
- (c) There shall be no drilling of gas or oil wells. However, this will not prohibit the state from leasing the oil and gas rights and permitting drilling from outside the preserve to explore for oil and gas if approved by the board.
- (d) There shall be no excavation of minerals, except the dredging of dead oyster shells as approved by the Department of Natural Resources.
- (e) There shall be no erection of structures within the preserve; except:
1. Private docks for reasonable ingress or egress of riparian owners;
 2. Commercial docking facilities shown to be consistent with the use or management criteria of the preserve; and
 3. Structures for shore protection, approved navigational aids, or public utility crossings authorized under subsection (3)(a).

(f) No wastes or effluents shall be discharged into the preserve which substantially inhibit the accomplishment of the purposes of this act.

(g) No nonpermitted wastes or effluents shall be directly discharged into the preserve which substantially inhibit the accomplishment of the purposes of this act."

Generally, applicants desirous of appealing staff recommendations will have to follow those appellate procedures outlined in the appropriate authorizing statutes. In the case where applications requesting the use of state-owned lands are denied, three appellate procedures are available to the applicant. Depending upon the type of application submitted, an applicant may:

- a. Ask the Governor and Cabinet to overturn an application decision rendered by the Executive Director of Department of Natural Resources (or his designee) under a delegation of authority;
- b. Request an Administrative Hearing under the procedures outlined in Chapter 120, F.S.; or
- c. Appeal the action of the Board of Trustees of the Internal Improvement Trust Fund to the District Court of Appeal.

3. Liaison Between Field Personnel and Other Interested Parties

One of the most important aspects of the field personnel's job is to establish a mutually beneficial communication link with pertinent interest groups. The central office staff will assist in initially identifying and contacting governmental bodies, special interest groups and interested individuals requiring aquatic preserve program coordination.

When requested by the onsite managers, the central office staff will assist in arranging for specialized management expertise not generally available locally. This may include, for example, such things as arranging for DAHRM to conduct a detailed cultural resource assessment for certain areas of the preserve.

Chapter VI

MANAGEMENT IMPLEMENTATION NETWORK

This chapter of the management plan will address the various relationships of aquatic preserve management to the different government agencies and programs, non-government entities, interest groups, and individuals within the aquatic preserve area. The activities of both field personnel and central office staff as they relate to these other organizations will be presented.

A. FEDERAL

Many federal agencies have property interests, land and wildlife management programs, research activities, construction activities, and regulation programs existing or potentially existing within the aquatic preserve. The objective of the aquatic preserve management program will be to complement the various activities wherever possible. The field personnel will assist those federal agencies in areas where they have common goals. The field personnel and central office staff will also review the federal activities as to their effect on the objectives of the aquatic preserve management. The review shall be coordinated through the DER's Office of Coastal Management for the purposes of enforcing the provisions of the Federal Coastal Zone Management Act of 1972, as amended.

1. United State Fish and Wildlife Service. The Aquatic Preserve program will be involved in the review of proposed preserve uses in conjunction with the Fish and Wildlife Service in Panama City. The USFWS reviews dredge and fill

requests and other federal level permitting under the Fish and Wildlife Coordination Act.

Another management program in which the field personnel could possibly interact with the Fish and Wildlife Service is the protection and recovery of endangered species and bird rookeries within the aquatic preserve. Field personnel will become involved in using available recovery techniques for this purpose, as necessary.

2. U.S. Army Corps of Engineers. The U.S. Army Corps of Engineers (COE) is charged with providing technical guidance and planning assistance for the nation's water resources development. The COE also provides supervision and direction to many engineering works such as harbors, waterways and many other types of structures. Their major responsibility, as it applies to the aquatic preserve, is the protection of navigable waters, pollution abatement and maintaining water quality and the enhancement of fish and wildlife.

The COE activities in the St. Joseph Bay area include their involvement with the DER in the dredge and fill permitting process, technical oversight of channel, inlet and canal maintenance, and evaluating requests for new channels, canals and other such public works projects. The field personnel will become familiar with the various programs, policies and procedures as they apply to the aquatic preserve.

The field personnel and central office staff will also review activities proposed by the COE for conformance to the objectives of the aquatic preserve management plan. This involvement should begin in the early stages of project

planning in order to facilitate the best protection of the aquatic preserve possible.

3. U.S. Geological Survey. The U.S. Geological Survey (USGS) under the Department of the Interior has the responsibility to perform surveys, investigations, and research pertaining to topography, geology, and the mineral and water resources of the United States. USGS also publishes and disseminates data relative to those preceding activities. In the past the USGS has conducted many studies on various resources in the region.

The field personnel and central office staff will become familiar with these studies and the data results as they apply to their management activities.

4. U.S. Environmental Protection Agency. The U.S. Environmental Protection Agency (EPA), in cooperation with state and local governments, is the federal agency responsible for the control and abatement of environmental pollution. The six areas of pollution within which the EPA is concerned are air, water, solid waste, noise, radiation and toxic substances. The DER is the state agency responsible for handling most of these programs on a state level in lieu of a federal program. Within the aquatic preserve, the field personnel will assist the EPA in planning field activities and where there are common goals.

5. U.S. Coast Guard. The U.S. Coast Guard is the federal agency involved in boating safety, including search and rescue, and investigation of oil spills. The Coast Guard is also charged with the permitting of structures which affect navigation and boating safety. These structures include bridges, causeways,

aerial utilities and other structures which may be in conflict with navigational uses. The field personnel, in conjunction with the central office staff, will also review projects which the Coast Guard may be evaluating for permits.

6. National Marine Fisheries Service. The National Marine Fisheries Service (NMFS) under the U.S. Department of Commerce is active in the St. Joseph Bay area in recording commercial fish landings. The NMFS also has enforcement officers in the area checking for illegal fishery activities. The field personnel will work with these personnel whenever they have common goals within the aquatic preserve.

B. STATE

Many state agencies have programs which affect the resources or regulate activities within the aquatic preserve. There are other DNR programs that are within or affect the St. Joseph Bay Aquatic Preserve management.

1. Department of Environmental Regulation. The Department of Environmental Regulation (DER) is the state agency in charge of state-wide regulation of water quality. The DER is also the local contact in the aquatic preserves area for the initiation of dredge and fill applications in conjunction with the COE and DNR. With respect to water quality and dredge and fill regulation, the DER is one of the most important agencies to the management of the aquatic preserve. Maintaining water quality in the preserve is critical to the health of the estuarine complex, and dredge and fill activities are one of the most potentially destructive activities affecting water quality within the

preserve. The DER also monitors and regulates other potential forms of pollution, such as air pollution, wastewater discharges, and hazardous waste, all of which can affect the ability to maintain essential natural conditions.

The field personnel will become familiar with the water quality, dredge and fill, and other regulatory programs that are important to the aquatic preserve. The field personnel should develop a close working relationship with DER staff and become familiar with DER field activities and programs that are in common with the objectives of the aquatic preserve management program. The field personnel should open the most efficient line of communication with the local offices to receive advanced copies of the permit applications from DER to improve the response time within the review process.

The DER, Office of Coastal Management is charged with coordinating activities related to coastal management in the state and reviewing federal actions for consistency with the State Coastal Management program, Section 380.20, F.S. The central office staff will maintain a close relationship with the Office of Coastal Management for assistance in the review of federal actions, data and research needs, and other program support.

2. Department of Community Affairs. The Department of Community Affairs (DCA) is responsible for determining Developments of Regional Impact (DRI) and for recommending to the Administration Commission Areas of Critical State Concern (ACSC). DRI's are major developments that have impacts on a scale which is greater than county level and require a regional review from neighboring local governments and state agencies. Both the central office staff and field personnel of the aquatic preserve program will be involved in

reviewing DRI's. The field personnel should receive notice of a DRI through the central office staff and will proceed with the field review. The central office staff will coordinate the field review findings and work with the other state agencies in Tallahassee in the review of the DRI.

The ACSC program is intended to protect the areas of the state where unsuitable land development would endanger resources of regional or statewide significance. When an area is identified as a possible ACSC, a Resource Planning and Management Program (RPMP) is established. The RPMP evaluates the resources, and the local government's land development practices. After this evaluation is complete, the RPMP committee makes recommendations to the local governments on how their land development practices could be improved to ensure an orderly land well-planned growth that would protect the critical resources. When these modifications are not made to the RPMP committee's approval, areas of local government that are not in conformance could be designated an ACSC or the entire area may be designated an ACSC by the Legislature. Gulf County has been designated as an ACSC with the exception of areas east of the intersection of U.S. 319 and 98. This exclusion encompasses the entire St. Joseph Bay Aquatic Preserve.

Under an ACSC designation, the local governments are required to notify DCA of any application for a development permit. The entire land development process will require the state's oversight until that local government modifies its land development practices to conform to the ACSC requirements.

3. Department of Natural Resources. The aquatic preserve management program is associated with several other Department of Natural Resource (DNR) programs in the St. Joseph Bay area.

DNR's Marine Research Laboratory in St. Petersburg, under the Division of Marine Resources, has several programs and projects within this area which will benefit the aquatic preserve program. The Marine Lab is presently studying fishery habitat losses in the St. Joseph Bay area. The Resource Protection Area mapping, which will be used in the management of these aquatic preserves, was created as a product of that fishery habitat loss study. The data from this project, when it is completed, will be incorporated into this management plan. The field will become familiar with this study and will consult the Marine Lab for their data needs whenever possible.

The Division of Marine Resources also handles the permitting for the collection of certain marine species and use of certain chemicals. The field and central office staff will become familiar with this permitting process and request notification of these permits within the aquatic preserve.

The Marine Patrol, under DNR's Division of Law Enforcement, also operates in St. Joseph Bay. The field personnel will become familiar with their programs and operation, and will call on the Marine Patrol for law enforcement support as required.

The Division of State Lands within the DNR is charged with overseeing uses, sales, leases or transfers of state-owned lands. The aquatic preserve staff will interact with State Lands in all transactions concerning submerged lands

within the aquatic preserve. These would include the potential acquisition of privately titled submerged lands or contiguous uplands important to the integrity of the preserve. This relationship is more fully described in Chapter V(C).

The Division of Resource Management, through the Bureau of Geology and Aquatic Plant Research and Development, is responsible for various programs potentially affecting the aquatic preserve. Staff will establish communication links with this Division to ensure that adequate consideration is given to potential impacts upon the preserve that may result from the conduct of their various programs.

The Division of Recreation and Parks, in addition to the work related to aquatic preserves by BLARM and the Florida Park Service, is also involved in the management of State parks and recreation areas nearby. The aquatic preserve program will work closely with these programs as they relate to aquatic preserve management objectives.

4. Marine Fisheries Commission (MFC). The MFC was established as a rule-making authority pursuant to Section 370.027, F.S. The seven members are appointed by the governor and are delegated full rule making authority over marine life (subject to approval by the Governor and Cabinet), with the exception of endangered species. This authority covers the following areas: a) gear specifications, b) prohibited gear, c) protected species, g) closed areas, h) quality control codes, i) seasons, and j) special considerations related to egg bearing females and oyster and clam relaying. The field

personnel and central office staff will become familiar with and enforce the rules of the MFC.

The MFC is also instructed to make annual recommendations to the Governor and Cabinet regarding marine fisheries research priorities. The field and central office staff will use these recommendations to direct research efforts within the aquatic preserve.

5. Florida Game and Fresh Water Fish Commission. (FWFC) The FWFC's Environmental Services office in Tallahassee sends biologists into the preserve to review projects which may have potential impacts on local fish and wildlife habitat as necessary. The central office will use the FWFC's assistance in their review process, when possible, and in developing fish and wildlife management for the aquatic preserve.

The FWFC also has law enforcement officers working in this area. The field personnel will interact with these officers where there are common goals.

The FWFC is also the state coordinator of the Non-Game Wildlife and the Endangered Species Programs in Florida. The Field personnel and central office staff will work with FWFC personnel in developing program needs in this area.

6. Department of Transportation. (DOT) The DOT has its State headquarters office in Tallahassee and District office in Chipley, and the aquatic preserve field personnel and the central office will work with the resident engineer on anticipated projects having possible impacts on the aquatic preserve. The

field personnel and administrative staff will review any major highway or bridge projects that may be proposed in the future.

7. Department of State. The Division of Archives, History and Records Management (DAHRM) in the Department of State will have a close working relationship with the field personnel and central office staff in the protection of archaeological and historical sites. The field personnel will be directed by DAHRM, through the central office, in any activities or management policy needs for these sites.

8. Health and Rehabilitative Services. (HRS) Both the central office staff and field personnel will establish communication and coordination linkages with HRS and their locally conducted programs of septic tank regulation and mosquito control. Although mosquito control serves a useful public function, the effects of pesticides (adulticides and larvacides) in the waters of the preserve are a primary concern. Additionally, the central office staff will become involved in future meetings and management programs developed by the Governor's Working Group on mosquito control. Subsequent policy recommendations coming out of this group will be evaluated for applicability to the ongoing aquatic preserve management program.

C. REGIONAL

The regional level of the management implementation network as it applies to the St. Joseph Bay Aquatic Preserve will include the Northwest Florida Water Management District, The Apalachee Regional Planning Council, and the Florida Inland Navigation District. These organizations have activities that are

broader than the local government, but are on a smaller scale than the state level.

1. Water Management District. The Northwest Florida Water Management District includes Gulf County. The water management district administers permitting programs for consumptive water use, management and storage of surface waters well drilling and operation, regulation of artificial recharge facilities, and works of the district. This includes the withdrawal and use of water from rivers, streams, and wells. The types of water uses they permit in the preserve area include irrigation and public water supply. The field personnel will become familiar with the review and permitting procedures as they might apply to water supply in this basin. The water management district is also involved in various studies on water supply and management, and other related research that may be of use to aquatic preserve management.

2. Regional Planning Councils. The Apalachee Regional Planning Council (ARPC) serves as a regional planning body for the local government of Gulf County. Other northwest Florida counties are served by these regional planning councils, as well. Among its duties, the ARPC:

- a. aids local governments with planning expertise;
- b. is the regional representative for the Development of Regional Impact (DRI) review process;
- c. serves as regional clearinghouse for state and federal projects and programs;

e. conveys information from the local governments to the state and federal levels; and

f. prepares and administers the regional policy plan.

The field personnel will become familiar with the various projects, programs, and data sources that the ARPC has within their administration that may affect or prove useful to the aquatic preserve program.

The DRI review of projects which affect the aquatic preserves will be reviewed by the central office staff, with the field personnel's field review, when necessary. DRI's for large marinas, large subdivisions on the uplands above the preserve, and commercial or industrial developments will require a field review by the field personnel as to their effect on the aquatic preserve.

D. Local Governments and Special Districts

The field personnel serve as local liaison to these local government entities for the aquatic preserve to assist them in modifying their policies and practices to conform to the objectives of the aquatic preserve's management plan, and to exchange information and expertise for mutual benefits.

1. Relationship to local management plans: Local (municipal and county) governments are required by the Local Government Comprehensive Planning Act of 1975 (Section 163.3161, F.S.) [as amended by Chapter 85-55, Laws of Florida, to the Local Government Comprehensive Planning and Land Development Regulation Act] to update their local plans and among other requirements adopt land

development regulations and improve coastal management protection. The coastal management element of the LGCP along with the land use and conservation elements establishes long range plans for orderly, and balanced development, with particular attention to the identification and protection of environmental resources in the planning area. Conformance with the criteria, policies and practices of a local government comprehensive plan is required for all development within the local governmental jurisdiction.

The intent of the aquatic preserve management program and this plan is to guide Gulf County government during its comprehensive planning toward developing local plan criteria and standards to be consistent with the objectives of the aquatic preserve program. Field personnel will become acquainted with local planning efforts and local officials and lend assistance for this purpose.

2. Relation to local development codes. The local zoning and development codes (e.g. building codes) provide the major local regulation that defines what an owner can do on a particular parcel of property. The zoning prescribes the allowable uses and the intensity of those uses. Certain uses along an aquatic preserve can potentially have a profound effect on a preserve.

This section will operate in conjunction with the preceding section on local management plans. The field personnel will become familiar with the local zoning, development codes and their potential effects on the nearby aquatic preserve. The field personnel will assist local planning and zoning officials

in identifying areas where changes in zoning would better conform to the objectives of environmental protection for the aquatic preserve management. The field personnel will also offer to assist local planning and zoning officials in the review of proposed subdivisions upland of the preserve.

3. Special Districts (Drainage, Inlet and Mosquito Control). The special districts are taxing districts established to correct drainage and mosquito control problems. Gulf County has a mosquito control district, but no special drainage or inlet districts. These districts may not have an official comprehensive management plan, but they do have management policies and program statements that are similar to such a plan. The field personnel will become familiar with these policies and the activities of these districts and will monitor their effect on the aquatic preserve. For example, the field personnel might recommend identifying areas that should not receive mosquito spraying or other alternative management because of remoteness to inhabited areas and because of possible damage to the resources of the aquatic preserve; or drainage districts might be asked not to use certain types of herbicides or to use them only at certain times of the year.

E. Other Entities

This section will apply to the numerous entities that have an interest in the aquatic preserve but are non-governmental agencies. This includes the environmental interest groups (i.e. Audubon Society, Sierra Club and Native

Plant Society), the fishing and sports interest groups (i.e., Florida League of Anglers, Organized Fishermen of Florida), the universities that may have research activities in the preserve (i.e., Florida State University), the Marine Fisheries Commission that will delegate rules and regulations concerning fishing and shellfish harvesting in the aquatic preserve, and other interest groups or individuals. The relationship of these entities to aquatic preserve management might include the coordination of activities, such as scientific research, environmental education, management of rookeries or other natural areas, or numerous other possible activities. A worthwhile aquatic preserve management process will depend on the continued support and help of these interest groups in all of the aquatic preserves. The field personnel will be active in communicating the aquatic preserve management process and activities to the various groups and consulting with them for their help in their areas of expertise.

Chapter VII

PUBLIC USES

This chapter addresses the public use of the aquatic preserve. The public in this case shall refer to the general public or those persons without riparian rights. The "Florida Aquatic Preserve Act of 1975" (Section 258.35, F.S.) allows for the lawful and traditional public uses of the aquatic preserve, such as sport fishing, boating and swimming (as adapted from Section 258.43(1), F.S.) These and other traditional uses that do not involve a commercial intent or the use of a riparian right to place a structure in the preserve, and do not degrade or otherwise destroy the preserve will be considered public uses. This section will be further divided into consumptive and non-consumptive uses as applicable to each resource.

A. Consumptive Uses.

Consumptive uses involve the removal of resources from the preserve. These uses include fishing, hunting, shellfishing, and other related activities. They also include the unintentional removal of resources by propeller damage to grassbeds. The management of these uses (see Chapter V, Resource Management, Section B: Onsite Management Objectives) will include the observation and monitoring of the effects of these uses on the resources. The field personnel will periodically assess the impacts through the use of the Marine Research Laboratory's LANDSAT capabilities for habitat losses or disturbances in the St. Joseph Bay area plus any other studies or data sources that might become available. This management will also include the protection of the

resources from unlawful or excess practices of these uses. The legality of these uses will be controlled by existing applicable state laws and local ordinances. Field personnel, for example, will become familiar with and monitor the success of rules adopted by the Marine Fisheries Commission. These will include regulations on fishing gear, bag and size limits, closed areas, seasons, etc.

Consumptive uses will also be monitored for their effect on other resources (e.g., bird rookeries, marine grassbeds, oyster bars, archaeological and historical sites). The field personnel will also be sensitive to additional enforcement needs (i.e., the need for additional enforcement staff during nesting seasons).

B. Non-consumptive Uses.

These uses are those which do not generally remove resources from the preserve. Examples of these uses include swimming, diving, boating, bird-watching and other related activities. The management practices involved with these uses will be the same as those previously described under Section A., except that these uses are not generally controlled by law. The guiding principle in these cases will be whether or not the activity causes a disruption of the preserve's resources (e.g., destroys marine grassbeds, or disturbs rookeries). Only in the event of these disruptions will the field personnel become involved. Some of these uses may possibly be involved in environmental education programs (Chapter XI).

Chapter VIII

PRIVATE NON-COMMERCIAL USES

This section will apply to those private, non-commercial uses which are associated with riparian land ownership. The management of the aquatic preserve recognizes the traditional riparian rights of upland property owners. The right of ingress, egress, boating, swimming, fishing and other incidental uses of sovereignty lands, historically has allowed for the placement of certain structures, such as docks, within the preserve. The right to make any preemptive use of sovereign lands is a qualified one and can only be exercised with the prior consent of the Board after a finding that such uses will not impair public uses, or destroy or damage areas of environmental significance. The review of proposed activities will require the interaction of the Resource Protection Area mapping with administrative and possible field review and later monitoring by field personnel as projected by Chapter V., Section B.

Private non-commercial uses shall be designed to avoid critical Resource Protection Areas (Class 1 and 2) and shall be designed to reduce the uses' impact to the preserve in general. Individual applications for these private non-commercial uses shall be reviewed by the applicable Resource Protection Area Map and criteria. In addition, private dock proposals will be reviewed by the criteria described in Section 18-20.04(5) F.A.C. of the revised Aquatic Preserve Rule.

Bulkheads should be placed, when allowed, in such a way as to be the least destructive and disruptive to the vegetation and other resource factors in

each area. Approved uses which do disrupt or destroy resources on state-owned lands will require mitigation. This mitigation will include restoration by the applicant or other remedy which will compensate for the loss of the affected resource to the aquatic preserve.

Dredging within the aquatic preserve shall be held to a minimum. Dredging proposals shall be reviewed according to the procedures in Chapter V depending on the proposed activities location within the RPA. Proposals within Class 1 areas [Chapter V(B)(6)] will be scrutinized to the maximum extent in order to find the best practicable method of development and location if that use is acceptable in that particular area of the preserve. The mitigation of lost or disturbed resources shall be required. There shall be no dredging allowed in Class 1 or 2 areas or in nearby areas if it will adversely impact these areas.

The location of proposed multiple docking facilities, such as for condominium developments, shall be based on the marina siting criteria described in Section 16Q-20.04(5) F.A.C. of the revised General Aquatic Preserve Rule.

Authorization of such facilities will be conditioned upon receipt of documentation evidencing the subordination of the riparian rights of ingress and egress for the remainder of the applicant's shoreline for the life of the proposed docking facility.

Non-residential docking facilities (commercial) are addressed in Chapter IX. The use of seaplanes and airboats within this preserve is seen as a non-traditional use and this activity is discouraged due to the background noise they create. Applications for seaplanes and airboats use within the preserve

will be reviewed on a case by case basis. Their use will only be recommended where the activity will not affect resource protection areas, or the other natural and aesthetic values of the preserve, or when required in law enforcement efforts.

Chapter IX

COMMERCIAL USES

This section addresses the variety of traditional and non-traditional (i.e., new uses in this area) commercial uses which might occur within the aquatic preserve. Among the traditional uses in the St. Joseph Bay area are utility crossings, marinas and yacht clubs, commercial uses.

A. TRADITIONAL COMMERCIAL USES

1. Utility Crossings. There are at present time both aerial and underwater utility crossings in the aquatic preserve. Future proposals should be designed so the preserve is crossed by the least destructive method in the least vulnerable areas according to the RPA maps (Chapter V[C]). Increased or additional use of any existing utility crossings is preferable, if their condition at the time of the proposal is acceptable. The field personnel should eventually develop a utility crossing plan for all areas with anticipated utility crossing needs to allow for advance planning, for placement of these crossings in the best environmental location possible. The utility crossing plans, when completed, will become a part of this plan. Crossings should be limited to open water areas to minimize disturbance to marine grassbeds, salt marshes or other critical habitat areas and should not interfere with traditional public uses.

2. Commercial Fishing. The management of the aquatic preserve shall not include the direct management of commercial fishing activities. Field

personnel will monitor these activities and assess their affects on the preserve only in conjunction with the Division of Marine Resources, the Florida Marine Patrol and the Marine Fisheries Commission, and as part of a cooperative effort with that division. The field personnel will also notify the requisite authority in the event of illegal activities (Chapter 370, F.S. or by special act). The field personnel, along with other agencies and divisions' programs and studies, will monitor fishing activities within the aquatic preserve. Monitoring will concentrate on boat access into certain areas, prevention of marine grassbed destruction and other needs of the aquatic preserve as they are associated with commercial fishing activities. After problems associated with commercial fishing activities are identified and documented, the findings will be presented to the Marine Fisheries Commission. It is the authority of the Commission and the Florida Legislature to regulate commercial fishing within the aquatic preserve.

3. Marinas. The locating of marinas and their related uses will be a major concern of the St. Joseph Bay Aquatic Preserve management. Marinas represent a use with many potential impacts on the preserve's resources. The siting policy of Section 18-20.04(5) F.A.C. of the revised General Aquatic Preserve Rule shall be used for siting marinas in the aquatic preserves.

4. Other Docking. Any other type of commercial docking, not mentioned in the preceding sections, will follow the marina siting policy as stated in Section 18-20.04(5) F.A.C. of the revised General Aquatic Preserve Rule.

B. Non-traditional Commercial Uses

1. Deep Water Port Facilities. There are no facilities of this type directly within the St. Joseph Bay Aquatic Preserve, although the Port of St. Joe is adjacent. New deep water port facilities within the preserve boundary shall be prohibited.

2. Power Plants. Power plants have the potential for causing major changes in the air quality, water quality, and plant and animal life of the aquatic preserve. For these reasons, they are incompatible with the purposes of this aquatic preserve. The location of proposed power plants upstream of a preserve should also be evaluated as to the effects on the downstream preserve.

3. Aquaculture. The St. Joseph Bay area could potentially have proposals for aquacultural development in the future. These uses may include floating structures or other new techniques now being used in aquaculture. The location type of impacts to the resources will require careful examination. If there is not sufficient data available for valid evaluation, a small scale test of the use might be possible in a selected area.

4. Other Uses. Any other use that qualifies as a commercial use of state-owned submerged lands not mentioned above will require a review for its anticipated impact on the aquatic preserve and the best location for the activity compatible to the resource protection areas within each preserve.

Chapter X

SCIENTIFIC RESEARCH

The field personnel attached to the St. Joseph Bay Aquatic Preserve in the future will serve as the area coordinators of scientific research in the preserves. Scientific research, and any other type of research or testing within the aquatic preserve, should require the clearance of both the field personnel and the central office staff before these activities can proceed. Certain activities could be detrimental to the resources of the preserve and should be carefully reviewed before allowing them to occur. Factors including location, specific procedures, and time of year, should be carefully reviewed for the possible disturbance or effect of the research on the other resources of the aquatic preserve. The field personnel will be aware of the possibility of working with other government agencies, colleges, universities, research foundations and government programs to fill the data needs of the aquatic preserve (see Chapter V and XII). The field personnel will assist in the selection of possible test sites and other research needs within the preserve.

Chapter XI

ENVIRONMENTAL EDUCATION

The aquatic preserve should be used to enhance environmental educational programs at every opportunity. The goal of maintaining the aquatic preserve for the benefit of future generations can begin to be realized through the use of aquatic preserves for environmental education. Through education, the youth of Gulf County can acquire a knowledge of the natural systems and an appreciation for the aquatic preserve program.

The field personnel will, through their normal activities in the aquatic preserve, select good examples of habitats and resources within these aquatic environments for use during educational group tours. This might include the development of environmental educational boat or canoe tours through the preserves. Other educational activities might also include prepared presentations for specific interest or user groups such as sport (boating, diving, fishing, etc.), civic and conservation groups and the development of a brochure outlining the major points of management within the preserve. These brochures could then be circulated to the various user groups. The field personnel will also prepare programs on the value of management activities of the aquatic preserve for presentation to interested groups of all ages. Educating the public about aquatic preserve management is the key to the success and future of the preserve.

The environmental education activities of the St. Joseph Bay Aquatic Preserve may be coordinated with the public information and education program of the

Apalachicola National Estuarine Research Reserve. The educational goals of the preserve and reserve are similiar. A cooperative effort between both programs and a sharing of resources would strengthen the educational impact of each. Educating the public about St. Joesph Bay and related resources is the key to the success and future of the preserve.

Chapter XII

IDENTIFIED PROGRAM NEEDS

This chapter of the management plan will address the various internal program needs that are expected to be identified during management activities. Meeting these needs will correct or generally relieve some stress on the preserve or the personnel involved in the management of the aquatic preserve. These needs may, in some cases, require legislative or administrative rule changes or acquisition of critical areas by the State. The need to identify problem areas and adjust the management plan in a manner that will positively address these problems and management needs is an essential element of any good management program. Both field personnel and central office staff will continually monitor the management plan implementation process and specifically identify observed program needs and problems. The areas to be considered include, but are not limited to:

- A. acquisition of additional property,
- B. boundary problems,
- C. legislative needs,
- D. administrative rule changes,
- E. data needs,
- F. resource protection capabilities, and
- G. funding and staffing needs.

Staff will annually develop an implementation status report that will contain a summary of identified management needs and suggested measures to be taken in meeting these needs.

A. Acquisition of Additional Property

There are areas both within and upland of the aquatic preserve that are in public ownership under the jurisdiction of various local, state and federal agencies. Many of these lands contain important resources, such as bird rookeries, archaeological or historical sites, endangered species habitat, and freshwater source wetlands as well as other wetlands. The protection of these areas is necessary to the wilderness preserve designation areas. Formal management agreements, memoranda of understanding, etc. that will ensure the compatible management of these areas will be developed. Other areas within or adjacent to the preserve that are in private ownership should be closely examined to determine the advisability of bringing them into public ownership. The acquisition of these lands might act as a buffer to critical resources, prevent development of sensitive areas, allow the restoration of areas adversely affected by previous development or allow removal of disrupting uses within a preserve. The field personnel, during normal management activities, should be aware of significant upland areas and sovereign land conveyances which, if developed, would compromise the integrity of the aquatic preserve. The field personnel will keep a running record of these areas and will prioritize these areas for possible public acquisition.

B. Boundary Problems and Systems Insufficiencies

The boundaries of the aquatic preserve are often political lines or artificial delineations of the natural systems within and surrounding the preserves. The field personnel, in their normal management activities, will be sensitive to the possible need for boundary modifications in areas where resources would be better protected. Potential boundary changes might include areas adjacent to the present boundary or previously conveyed sovereign lands. Any boundary change will require legislative approval.

C. Legislative Needs

Management needs could involve changes in the legislation pertaining to aquatic preserves or changes in the other statutes upon which aquatic preserve management is based. These changes may include boundary realignments or the strengthening of certain management authorities.

D. Administrative Rule Changes

Administrative rule statements addressing the organization, procedures and practices used in the implementation of aquatic preserve management plans and policies. This process includes identifying problems within the Department of Natural Resources, as well as other agencies, that affect the management of the preserve.

E. Data (Information) Needs

The field personnel and central office staff will note data needs and promote research or other means to fulfill them. Data needs in the near future could possibly be supplied by such ongoing projects as the U.S. Geological Survey's, and Northwest Florida Water Management District studies, Department of Environmental Regulation water quality monitoring or by the research of other agencies. The field personnel will be aware of data needs as they interact with the various levels of government and with other entities. These data needs might include additional mapping, ownership information, water quality data or any other data. The major suppliers of data will probably be other public agencies that are conducting programs in and around the preserve. Other potential sources of data are the colleges and universities that have, in the past, conducted research projects in the area.

F. Resource Protection and Enforcement Capabilities

The protection of the preserve's resources depends on the Florida Marine Patrol, in addition to field personnel. These protection needs might also require additional enforcement support from local government or other state agencies. The need for additional manpower, authority, equipment or vehicles for this task will be identified.

The field personnel will become familiar with the staff capabilities of both the Department of Natural Resources and the other agencies with enforcement responsibilities in the preserve. Annually, staff should fully assess the

effectiveness of the protective and enforcement capabilities of these combined agencies.

G. Funding and Staffing Needs

The present aquatic preserve management program has been minimally implemented with funds from a variety of sources and programs. The writing of this management plan was funded through a grant from the U. S. Office of Coastal Zone Management, National Oceanic and Atmospheric Administration, and through the "Coastal Zone Management Act of 1972", as amended.

In order for the management program proposed in this plan to function and succeed, the program must have sufficient funding and staffing. The workload required by this program is too much for an interim staff from other programs to handle in addition to their primary obligations. Funding and staffing needs are critically important to the success of the aquatic preserve program.

PARTIALLY ANNOTATED BIBLIOGRAPHY
AND IDENTIFICATION OF OTHER KEY RESOURCES

This guide to published and unpublished material used during the research of this management plan is divided into three main sections. The first section, covering books, journal articles, and unpublished data, is essentially a standard bibliographic approach with the additional feature that selected resources considered to be of particularly pertinent usefulness with regard to St. Joseph Bay have been annotated. The second section is a short listing of maps. The third section is a separate listing (in alphabetic order) of individuals who were helpful in discussing one or more aspects of the Bay; their assistance is appreciated.

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and Records Management, Department of State

Rosalie Vaught, National Marine Fisheries Service, Panama City, Florida

CONTENTS OF APPENDICES

- A. Florida Aquatic Preserve Act of 1975 (§ 258.35-258.46, F.S.)
- B. Administrative Rules for Florida's Aquatic Preserve (§ 18-20, F.A.C.)
- C. Administrative Rules for Florida Sovereignty Submerged Lands Management (§ 18-21, F.A.C.)
- D. Legal Description of St. Joseph Bay Aquatic Preserve (Resolution of the Board of Trustees of the Internal Improvement Fund, #70-17, dated November 2, 1970)

use of such areas.

History.—s. 12, ch. 70-355; s. 1, ch. 70-439; s. 8, ch. 77-126; s. 1, ch. 82-46; s. 2, ch. 83-265.

Note.—Repealed effective October 1, 1989, by s. 1, ch. 82-46, as amended by s. 2, ch. 83-265, and scheduled for review pursuant to s. 11 611 in advance of that date.

258.29 Atlas of areas.—The Department of Natural Resources shall maintain an atlas of wilderness areas, on maps of suitable scale.

History.—s. 13, ch. 70-355; s. 1, ch. 70-439; s. 9, ch. 77-126.

258.30 Rules and regulations.—The Department of Natural Resources shall adopt rules and regulations prescribing a uniform set of general management criteria covering all wilderness areas.

(1) No alteration of physical conditions within a wilderness area shall be permitted except to provide:

(a) Minimal use facilities, such as hiking trails, pit toilets, manually operated water pumps, and primitive camp sites; and

(b) Minimum management facilities, which may include boundary fences and unimproved vehicle trails for control purposes and emergency access.

(2) The following are specifically prohibited activities or uses:

(a) Dredging and dredge spoil dumping;

(b) Artificial drainage or impoundments;

(c) Farming;

(d) Clearing of land;

(e) Dumping of wastes;

(f) Mining;

(g) Pesticide spraying, except emergency measures required to protect public health and spraying for forestry disease control;

(h) The use of motorized vehicles on land or water, except for emergencies or valid management purposes; and

(i) Removal of timber, except to restore original plant communities.

(3) All human activity within each wilderness area shall be subject to special rules and regulations for implementing the intent and purpose of ss. 258.17-258.32 for the particular area involved.

(4) Other uses of a wilderness area, or human activity within the area, although not originally contemplated, may be permitted by the department, but only after a formal finding of compatibility made by the department, and subject to regulation.

History.—s. 14, ch. 70-355; s. 1, ch. 70-439; s. 10, ch. 77-126; s. 115, ch. 79-400.

258.31 Signs and markers.—Wilderness areas shall be identified by appropriate signs and boundary markers.

History.—s. 15, ch. 70-355.

258.32 Withdrawal of lands from system.—Except pursuant to s. 258.23(2)(b), no part of any wilderness area may be withdrawn from the state wilderness system except by resolution of the Department of Natural Resources and only after notice of such proposed withdrawal is published in each county in which the area affected is located, in the manner prescribed by law and after a public meeting is held, if requested.

History.—s. 16, ch. 70-355; s. 2, ch. 72-309; s. 11, ch. 77-126.

258.331 Penalty for violation of ss. 258.17-258.32.

—Any violation by any person, natural or corporate, of the provisions of this act or any rule or regulation issued hereunder shall be punishable by a fine not to exceed \$500 per violation.

History.—s. 12, ch. 77-126.

258.332 Construction of ch. 77-126, Laws of Florida.

—Nothing in this act shall be construed so as to prevent the lawful management of water resources by any water management district created pursuant to chapter 373, or so as to divest any lawful rights acquired prior to the effective date of this act.

History.—s. 13, ch. 77-126.

PART III

AQUATIC PRESERVES

258.35 Short title; ss. 258.35-258.394 and 258.40-258.46.

258.36 Legislative intent.

258.37 Definitions.

258.38 Types of aquatic preserves.

258.39 Boundaries of preserves.

258.391 Cockroach Bay Aquatic Preserve.

258.392 Gasparilla Sound-Charlotte Harbor Aquatic Preserve.

258.393 Terra Ceia Aquatic Preserve wastewater or effluent discharge activities.

258.394 Guana River Marsh Aquatic Preserve.

258.395 Big Bend Seagrasses Aquatic Preserve.

258.396 Boca Ciega Bay Aquatic Preserve.

258.397 Biscayne Bay Aquatic Preserve.

258.40 Scope of preserves.

258.41 Establishment of aquatic preserves.

258.42 Maintenance of preserves.

258.43 Rules and regulations.

258.44 Effect of preserves.

258.45 Provisions not superseded.

258.46 Enforcement; violations; penalty.

258.35 Short title; ss. 258.35-258.394 and 258.40-258.46.—Sections 258.35-258.394 and 258.40-258.46 shall be known and may be cited as the "Florida Aquatic Preserve Act of 1975."

History.—s. 1, ch. 75-172.

258.36 Legislative intent.—It is the intent of the Legislature that the state-owned submerged lands in areas which have exceptional biological, aesthetic, and scientific value, as hereinafter described, be set aside forever as aquatic preserves or sanctuaries for the benefit of future generations.

History.—s. 1, ch. 75-172.

258.37 Definitions.—As used in ss. 258.35 through 258.46:

(1) "Aquatic preserve" means an exceptional area of submerged lands and its associated waters set aside for being maintained essentially in its natural or existing condition.

(2) "Biological type" means an area set aside to promote certain forms of animal or plant life or their supporting habitat.

(3) "Aesthetic type" means an area set aside to maintain certain scenic qualities or amenities.

(4) "Scientific type" means an area set aside to maintain certain qualities or features which have scientific value or significance.

(5) "Board" means the Board of Trustees of the Internal Improvement Trust Fund.

History.—s. 1, ch. 75-172.

258.38 Types of aquatic preserves.—Each aquatic preserve shall be characterized as being one or more of the following principal types:

- (1) Biological.
- (2) Aesthetic.
- (3) Scientific.

History.—s. 1, ch. 75-172.

258.39 Boundaries of preserves.—The submerged lands included within the boundaries of Nassau, Duval, St. Johns, Flagler, Volusia, Brevard, Indian River, St. Lucie, Charlotte, Pinellas, Martin, Palm Beach, Dade, Monroe, Collier, Lee, Citrus, Franklin, Gulf, Bay, Okaloosa, Santa Rosa, Hernando, and Escambia Counties, as hereinafter described, with the exception of privately held submerged lands lying landward of established bulkheads and of privately held submerged lands within Monroe County where the establishment of bulkhead lines is not required, are hereby declared to be aquatic preserves. Such aquatic preserve areas include:

(1) The Fort Clinch State Park Aquatic Preserve, as described in the Official Records of Nassau County in Book 108, pages 343-346, and in Book 111, page 409.

(2) Nassau River-St. Johns River Marshes Aquatic Preserve, as described in the Official Records of Duval County in Volume 3183, pages 547-552, and in the Official Records of Nassau County in Book 108, pages 232-237.

(3) Pellicer Creek Aquatic Preserve, as described in the Official Records of St. Johns County in Book 181, pages 363-366, and in the Official Records of Flagler County in Book 33, pages 131-134.

(4) Tomoka Marsh Aquatic Preserve, as described in the Official Records of Flagler County in Book 33, pages 135-138, and in the Official Records of Volusia County in Book 1244, pages 615-618.

(5) Mosquito Lagoon Aquatic Preserve, as described in the Official Records of Volusia County in Book 1244, pages 619-623, and in the Official Records of Brevard County in Book 1143, pages 190-194.

(6) Banana River Aquatic Preserve, as described in the Official Records of Brevard County in Book 1143, pages 195-198, and the sovereignty submerged lands lying within the following described boundaries: BEGIN at the intersection of the westerly ordinary high water line of Newfound Harbor with the North line of Section 12, Township 25 South, Range 36 East, Brevard County; thence proceed northeasterly crossing Newfound Harbor to the intersection of the South line of Section 31, Township 24 South, Range 37 East, with the easterly ordinary high water line of said Newfound Harbor; thence proceed northerly along the easterly ordinary high water line of Newfound Harbor to its intersection with the easterly ordinary high water line of Sykes Creek; thence proceed northerly along the easterly ordinary high water

line of said creek to its intersection with the southerly right-of-way of Hall Road; thence proceed westerly along said right-of-way to the westerly ordinary high water line of Sykes Creek; thence southerly along said ordinary high water line to its intersection with the ordinary high water line of Newfound Harbor; thence proceed southerly along the westerly ordinary high water line of Newfound Harbor to the POINT OF BEGINNING.

(7)(a) Indian River-Malabar to Vero Beach Aquatic Preserve, as described in the Official Records of Brevard County in Book 1143, pages 199-202, and in the Official Records of Indian River County in Book 368, pages 5-8 and the sovereignty submerged lands lying within the following described boundaries, excluding those lands contained within the corporate boundary of the City of Vero Beach as of the effective date of this act: Commence at the intersection of the north line of Section 31, Township 28 South, Range 38 East, and the westerly mean high water line of Indian River for a point of beginning; thence from the said point of beginning proceed northerly, westerly, and easterly along the mean high water line of Indian River and its navigable tributaries to an intersection with the north line of Section 24, Township 28 South, Range 37 East; thence proceed easterly, to a point on the easterly mean high water line of Indian River at its intersection with the north line of Section 20, Township 28 South, Range 38 East; thence proceed southerly, along the easterly mean high water line of Indian River to the most westerly tip of Blue Fish Point in said Section 20, thence proceed southwesterly to the intersection of the westerly mean high water line of Indian River with the north line of Section 31, Township 28 South, Range 38 East and the point of beginning; And also commence at the intersection of the northern Vero Beach city limits line in Section 25, Township 32 South, Range 39 East, and the westerly mean high water line of Indian River for the point of beginning; Thence from the said point of beginning proceed northerly, along the westerly mean high water line of Indian River and its navigable tributaries to an intersection with the south line of Section 14, Township 30 South, Range 38 East; thence proceed easterly, along the easterly projection of the south line of said Section 14, to an intersection with the easterly right-of-way line of the Intracoastal Waterway; thence proceed southerly, along the easterly right-of-way line of the Intracoastal Waterway, to an intersection with the northerly line of the Pelican Island National Wildlife Refuge; thence proceed easterly, along the northerly line of the Pelican Island National Wildlife Refuge, to an intersection with the easterly mean high water line of Indian River; thence proceed southerly along the easterly mean high water line of Indian River and its tributaries, to an intersection with the northern Vero Beach city limits line in Section 30, Township 32 South, Range 40 East; thence proceed westerly and southerly, along the northern Vero Beach city limits line to an intersection with the easterly mean high water line of Indian River and the point of beginning.

(b) For purposes of the Indian River-Malabar to Vero Beach Aquatic Preserve, a lease of sovereign submerged lands for a noncommercial dock may be deemed to be in the public interest when the noncommercial dock constitutes a reasonable exercise of ripari-

an rights and is consistent with the preservation of the exceptional biological, aesthetic, or scientific values which the aquatic preserve was created to protect.

(8) Indian River-Vero Beach to Fort Pierce Aquatic Preserve, as described in the Official Records of Indian River County in Book 368, pages 9-12, and in the Official Records of St. Lucie County in Book 187, pages 1083-1086.

(9) Jensen Beach to Jupiter Inlet Aquatic Preserve, as described in the Official Records of St. Lucie County in Book 218, pages 2865-2869.

(10) Loxahatchee River-Lake Worth Creek Aquatic Preserve, as described in the Official Records of Martin County in Book 320, pages 193-196, and in the Official Records of Palm Beach County in Volume 1860, pages 806-809, and the sovereignty submerged lands lying within the following described boundaries: Begin at the intersection of the easterly mean high water line of the North Fork of the Loxahatchee River with the northerly mean high water line of the Loxahatchee River, being in Section 36, Township 40 South, Range 43 East, Palm Beach County; thence proceed easterly along the northerly mean high water line of the Loxahatchee River to the westerly right-of-way of U.S. Highway 1; thence proceed southerly along said right-of-way to the southerly mean high water line of said river; thence proceed easterly along the southerly mean high water line of said river to its intersection with the easterly mean high water line of the Lake Worth Creek; thence proceed northwesterly crossing the Loxahatchee River to the point of beginning; And also: Commence at the southwest corner of Section 16, Township 40 South, Range 42 East Martin County; thence proceed north along the west line of Section 16 to the mean high water line of the Loxahatchee River being the point of beginning; Thence proceed southerly along the easterly mean high water line of said river and its tributaries to a point of nonnavigability; thence proceed westerly to the westerly mean high water line of said river; thence proceed northerly along the westerly mean high water line of said river and its tributaries to its intersection with the westerly line of Section 16, Township 40 South, Range 42 East; thence proceed southerly along the said westerly section line to the point of beginning; And also begin where the southerly mean high water line of the Southwest Fork of the Loxahatchee River intersects the westerly line of Section 35, Township 40 South, Range 42 East; Thence proceed southwestwardly along the southerly mean high water line of the Southwest Fork to the northeasterly face of structure #46; thence proceed northwesterly along the face of said structure to the northerly mean high water line of the Southwest Fork; thence proceed northeasterly along said mean high water line to its intersection with the westerly line of Section 35, Township 40 South, Range 42 East; thence proceed southerly along westerly line of said section to the point of beginning.

(11) Biscayne Bay-Cape Florida to Monroe County Line Aquatic Preserve, as described in the Official Records of Dade County in Book 7055, pages 852-856, less, however, those lands and waters as described in s. 258.165.

(12) North Fork, St. Lucie Aquatic Preserve, as described in the Official Records of Martin County in Book

337, pages 2159-2162, and in the Official Records of St. Lucie County in Book 201, pages 1676-1679.

(13) Yellow River Marsh Aquatic Preserve, as described in the Official Records of Santa Rosa County in Book 206, pages 568-571.

(14) Fort Pickens State Park Aquatic Preserve, as described in the Official Records of Santa Rosa County in Book 220, pages 60-63, and in the Official Records of Escambia County in Book 518, pages 659-662.

(15) Rocky Bayou State Park Aquatic Preserve, as described in the Official Records of Okaloosa County in Book 593, pages 742-745.

(16) St. Andrews State Park Aquatic Preserve, as described in the Official Records of Bay County in Book 379, pages 547-550.

(17) St. Joseph Bay Aquatic Preserve, as described in the Official Records of Gulf County in Book 46, pages 73-76.

(18) Apalachicola Bay Aquatic Preserve, as described in the Official Records of Gulf County in Book 46, pages 77-81, and in the Official Records of Franklin County in Volume 98, pages 102-106.

(19) Alligator Harbor Aquatic Preserve, as described in the Official Records of Franklin County in Volume 98, pages 82-85.

(20) St. Martins Marsh Aquatic Preserve, as described in the Official Records of Citrus County in Book 276, pages 238-241.

(21) Matlacha Pass Aquatic Preserve, as described in the Official Records of Lee County in Book 800, pages 725-728.

(22) Pine Island Sound Aquatic Preserve, as described in the Official Records of Lee County in Book 648, pages 732-736.

(23) Cape Romano-Ten Thousand Islands Aquatic Preserve, as described in the Official Records of Collier County in Book 381, pages 298-301.

(24) Lignumvitae Key Aquatic Preserve, as described in the Official Records of Monroe County in Book 502, pages 139-142.

(25) Coupon Bight Aquatic Preserve, as described in the Official Records of Monroe County in Book 502, pages 143-146.

(26) Lake Jackson Aquatic Preserve, as established by chapter 73-534, Laws of Florida, and defined as authorized by 's. 253.151 or as otherwise authorized by law.

(27) Pinellas County Aquatic Preserve, as established by chapter 72-663, Laws of Florida; Boca Ciega Aquatic Preserve, as established by s. 258.16; and the Biscayne Bay Aquatic Preserve, as established by s. 258.165. If any provision of this act is in conflict with an aquatic preserve established by s. 258.396, chapter 72-663, Laws of Florida, or s. 258.397, the stronger provision for the maintenance of the aquatic preserve shall prevail.

(28) Estero Bay Aquatic Preserve, the boundaries of which are generally: All of those sovereignty submerged lands located bayward of the mean high-water line being in Sections 13, 14, 15, 16, 17, 18, 21, 22, 23, 24, 25, 26, 27, 35, and 36, Township 46 South, Range 24 East; and in Sections 19, 20, 28, 29, and 34, Township 46 South, Range 24 East, lying north and east of Matanzas Pass

Channel; and in Sections 19, 30, and 31, Township 46 South, Range 25 East; and in Sections 6, 7, 17, 18, 19, 20, 29, 30, 31, and 32, Township 47 South, Range 25 East; and in Sections 1, 2, 3, 11, 12, 13, 14, 24, and 25, Township 47 South, Range 24 East, in Lee County, Florida. Any and all submerged lands conveyed by the Trustees of the Internal Improvement Trust Fund prior to October 12, 1966, and any and all uplands now in private ownership are specifically exempted from this preserve.

(29) Cape Haze Aquatic Preserve, the boundaries of which are generally: That part of Gasparilla Sound, Catfish Creek, Whiddon Creek, "The Cutoff," Turtle Bay, and Charlotte Harbor lying within the following described limits: Northerly limits: Commence at the northwest corner of Section 18, Township 42 South, Range 21 East, thence south along the west line of said Section 18 to its intersection with the Government Meander Line of 1843-1844, and the point of beginning, thence southeasterly along said meander line to the northwesterly shoreline of Catfish Creek, thence northeasterly along said shoreline to the north line of said Section 18, thence east along said north line to the easterly shoreline of Catfish Creek, thence southeasterly along said shoreline to the east line of said Section 18, thence south along said east line, crossing an arm of said Catfish Creek to the southerly shoreline of said creek, thence westerly along said southerly shoreline and southerly along the easterly shoreline of Catfish Creek to said Government Meander Line, thence easterly and southeasterly along said meander line to the northerly shoreline of Gasparilla Sound in Section 21, Township 42 South, Range 21 East, thence easterly along said northerly shoreline and northeasterly along the westerly shoreline of Whiddon Creek to the east west quarter line in Section 16, Township 42 South, Range 21 East, thence east along said quarter line and the quarter Section line of Section 15, Township 42 South, Range 21 East to the easterly shoreline of Whiddon Creek, thence southerly along said shoreline to the northerly shoreline of "The Cutoff," thence easterly along said shoreline to the westerly shoreline of Turtle Bay, thence northeasterly along said shoreline to its intersection with said Government Meander Line in Section 23, Township 42 South, Range 21 East, thence northeasterly along said meander line to the east line of Section 12, Township 42 South, Range 21 East, thence north along the east line of said Section 12, and the east line of Section 1, Township 42 South, Range 21 East to the northwest corner of Section 6, Township 42 South, Range 22 East, thence east along the north line and extension thereof of said Section 6 to a point 2,640 feet east of the westerly shoreline of Charlotte Harbor and the end of the northerly limits. Easterly limits: Commence at the northwest corner of Section 6, Township 42 South, Range 22 East, thence east along the north line of said Section 6 and extension thereof to a point 2,640 feet east of the westerly shoreline of Charlotte Harbor and the point of beginning, thence southerly along a line 2,640 feet easterly of and parallel with the westerly shoreline of Charlotte Harbor and along a southerly extension of said line to the line dividing Charlotte and Lee Counties and the end of the easterly limits. Southerly limits: Begin at the point of ending of the easterly limits, above described, said point being in the line

dividing Charlotte and Lee Counties, thence southwesterly along a straight line to the most southerly point of Devil Fish Key, thence continue along said line to the easterly right-of-way of the Intracoastal Waterway and the end of the southerly limits. Westerly limits: Begin at the point of ending of the southerly limits as described above, thence northerly along the easterly right-of-way line of the Intracoastal Waterway to its intersection with a southerly extension of the west line of Section 18, Township 42 South, Range 21 East, thence north along said line to point of beginning.

(30) Wekiva River Aquatic Preserve, the boundaries of which are generally: All the state-owned sovereignty lands lying waterward of the ordinary high-water mark of the Wekiva River and the Little Wekiva River and their tributaries lying and being in Lake, Seminole, and Orange counties and more particularly described as follows:

(a) In Sections 15, 16, 17, 20, 21, 22, 27, 28, 29, and 30, Township 20 South, Range 29 East. These sections are also depicted on the Forest City Quadrangle (U.S.G.S. 7.5 minute series-topographic) 1959 (70PR); and

(b) In Sections 3, 4, 8, 9, and 10, Township 20 South, Range 29 East and in Sections 21, 28, and 33, Township 19 South, Range 29 East lying north of the right-of-way for the Atlantic Coast Line Railroad and that part of Section 33, Township 19 South, Range 29 East lying between the Lake and Orange County lines and the right-of-way of the Atlantic Coast Line Railroad. These sections are also depicted on the Sanford SW Quadrangle (U.S.G.S. 7.5 minute series-topographic) 1965 (70-1); and

(c) All state-owned sovereignty lands, public lands, and lands whether public or private below the ordinary high-water mark of the Wekiva River and the Little Wekiva and their tributaries within the Peter Miranda Grant in Lake County lying below the 10 foot m.s.l. contour line nearest the meander line of the Wekiva River and all state-owned sovereignty lands, public lands, and lands whether public or private below the ordinary high-water mark of the Wekiva River and the Little Wekiva and their tributaries within the Moses E. Levy Grant in Lake County below the 10 foot m.s.l. contour line nearest the meander lines of the Wekiva River and Black Water Creek as depicted on the PINE LAKES 1962 (70-1), ORANGE CITY 1964 (70PR), SANFORD 1965 (70-1), and SANFORD S.W. 1965 (70-1) QUADRANGLES (U.S.G.S. 7.5 minute topographic); and

(d) All state-owned sovereignty lands, public lands, and lands whether public or private below the ordinary high-water mark of the Wekiva River and the Little Wekiva River and their tributaries lying below the 10 foot m.s.l. contour line nearest the meander line of the Wekiva and St. John's Rivers as shown on the ORANGE CITY 1964 (70PR), SANFORD 1965 (70-1), and SANFORD S.W. 1965 (70-1) QUADRANGLES (U.S.G.S. 7.5 minute topographic) within the following described property: Beginning at a point on the south boundary of the Moses E. Levy Grant, Township 19 South, Range 29 East, at its intersection with the meander line of the Wekiva River, thence south 60½ degrees east along said boundary line 4,915.68 feet; thence north 29½ de-

grees east 15,516.5 feet to the meander line of the St. John's River; thence northerly along the meander line of the St. John's River to the mouth of the Wekiva River; thence southerly along the meander line of the Wekiva River to the beginning; and

(e) All state-owned sovereignty lands, public lands, and lands whether public or private below the ordinary high-water mark of the Wekiva River and the Little Wekiva River and their tributaries within the Peter Miranda Grant lying east of the Wekiva River, less the following:

1. State Road 46 and all land lying south of said State Road No. 46.

2. Beginning 15.56 chains West of the Southeast corner of the SW $\frac{1}{4}$ of the NE $\frac{1}{4}$ of Section 21, Township 19 South, Range 29 East, run east 600 feet; thence north 960 feet; thence west 340 feet to the Wekiva River; thence southwest along said Wekiva River to point of beginning.

3. That part of the east $\frac{1}{4}$ of the SW $\frac{1}{4}$ of Section 22, Township 19 South, Range 29 East, lying within the Peter Miranda Grant east of the Wekiva River.

(f) All the sovereignty submerged lands lying within the following described boundaries: Begin at the intersection of State Road 44 and the westerly ordinary high water line of the St. Johns River, Section 22, Township 17 South, Range 29 East, Lake County; Thence proceed southerly along the westerly ordinary high water line of said river and its tributaries to the intersection of the northerly right-of-way of State Road 400; thence proceed northeasterly along said right-of-way to the easterly ordinary high water line of the St. Johns River; thence proceed northerly along said ordinary high water line of the St. Johns River and its tributaries to its intersection with the easterly ordinary high water line of Lake Beresford; thence proceed northerly along the ordinary high water line of said lake to its intersection with the westerly line of Section 24, Township 17 South, Range 29 East; thence proceed northerly to the southerly right-of-way of West New York Avenue; thence proceed westerly along the southerly right-of-way of said avenue to its intersection with the southerly right-of-way line of State Road 44; thence proceed southwest along said right-of-way to the point of beginning.

(31) Rookery Bay Aquatic Preserve, the boundaries of which are generally: All of the state-owned sovereignty lands lying waterward of the mean high-water line in Rookery Bay and in Henderson Creek and the tributaries thereto in Collier County, Florida. Said lands are more particularly described as lying and being in Sections 27, 34, 35, and 36, Township 50 South, Range 25 East; in Section 31, Township 50 South, Range 26 East; in Sections 1, 2, 3, 10, 11, 12, 13, 14, 23, 24, and 25, Township 51 South, Range 25 East; and in Sections 5, 6, 7, 8, 9, 10, 15, 16, 17, 18, 19, 20, 30, and 31, Township 51 South, Range 26 East, Collier County, Florida, and all the sovereignty submerged lands lying within the following described boundaries: Begin at the southwest corner of Section 30, Township 52 South, Range 27 East, Collier County; Thence proceed easterly along the southerly line of said Section 30 to the southwest corner of Section 29, Township 52 South, Range 27 East; proceed thence northerly along the westerly lines of Sections 29, 20 and

17 to the northwest corner of said Section 17; thence proceed westerly along the northerly line of Section 18 to the southeast corner of Section 12, Township 52 South, Range 26 East; thence proceed northerly along the easterly lines of Sections 12, 1, 36 and 25 to the northeast corner of said Section 25, Township 51 South, Range 26 East; thence proceed westerly along the northerly lines of Sections 25 and 26 to the northwest corner of said Section 26; thence proceed northerly to northeast corner of said Section 22; thence proceed westerly along the northerly lines of Sections 22 and 21 to the northwest corner of said Section 21; thence proceed southerly to the southwest corner of said Section 21; thence proceed westerly along the northerly line of Section 29 to the northwest corner thereof; thence proceed southerly along the westerly lines of Sections 29 and 32 to the southwest corner of said Section 32; thence proceed westerly to the northwest corner of Section 6, Township 52 South, Range 26 East; thence proceed southerly along a projection of Range line 25 East to its intersection with a line which runs westerly from the southwest corner of Cape Romano - Ten Thousand Islands Aquatic Preserve; thence proceed easterly to the southwest corner of Cape Romano - Ten Thousand Islands Aquatic Preserve; thence proceed northerly to the point of beginning. Less and except: Begin at the southeast corner of Section 21, Township 52 South, Range 25 East; thence proceed northerly along the easterly lines of Sections 21 and 16 to the northeast corner of said Section 16, thence proceed northerly to the thread of John Stevens Creek; thence proceed northwesterly along the thread of said creek to its intersection with the thread of Marco River; thence proceed northwesterly and westerly along the thread of said river to its intersection with the thread of Big Marco Pass; thence proceed southwest along the thread of Big Marco Pass to its intersection with Range line 25 East; thence proceed southerly along Range line 25 East to a point which is west from the point of beginning; Thence proceed easterly to the point of beginning.

Any and all submerged lands theretofore conveyed by the Trustees of the Internal Improvement Trust Fund and any and all uplands now in private ownership are specifically exempted from this dedication.

History.—s. 1, ch. 75-172; s. 1, ch. 76-109; s. 1, ch. 76-211; s. 84, ch. 77-104; s. 1, ch. 83-62; s. 2, ch. 84-312; s. 1, ch. 85-345.

Note.—See former s. 253.151, F.S. '81.

258.391 Cockroach Bay Aquatic Preserve.—The designation by the Board of Trustees of the Internal Improvement Trust Fund on May 18, 1976, of the following described area in Hillsborough County for inclusion in the aquatic preserve system under the Florida Aquatic Preserve Act of 1975 is hereby confirmed. Such area, to be known as the Cockroach Bay Aquatic Preserve, shall be included in the aquatic preserve system for the period of a 40-year lease of such area by the board from the Tampa Port Authority and shall include the following described real property: Begin at the northeast corner of Section 1, Township 33 South, Range 17 East, Manatee County, thence west along the north line of said Section 1 to its intersection with the mean high-water line of Tampa Bay, said point being the point of beginning;

from said point of beginning continue west 500 feet into the waters of Tampa Bay, thence northeasterly along a line 500 feet westerly of the mean high-water line of Tampa Bay, said line also being 500 feet westerly of the mean high-water line on Beacon Key, Snake Key, Camp Key, Big Pass Key, Little Cockroach Island, and Sand Key, to a point due west from Bird Key, thence east to the most southwesterly point of Bird Key, thence easterly along a channel along the northerly side of Tropical Island and of Goat Island to the most easterly point of said Goat Island, thence south to the intersection of the mean high-water line of the southerly shore of the Little Manatee River, thence in a northwesterly, westerly, and southwesterly direction along the mean high-water line of Tampa Bay and Cockroach Bay to the point of beginning. Less any islands, submerged lands, or uplands not owned by the Tampa Port Authority.

History.—s. 1, ch. 76-197.

258.392 Gasparilla Sound-Charlotte Harbor Aquatic Preserve.—The following described area in Lee and Charlotte Counties is designated by the Legislature for inclusion in the aquatic preserve system under the Florida Aquatic Preserve Act of 1975. Such area, to be known as the Gasparilla Sound-Charlotte Harbor Aquatic Preserve, shall be included in the aquatic preserve system and shall include the following described real property: Commence at the northwest corner of Section 18, Township 42 South, Range 21 East; thence northerly along the line of mean high water to the intersection of State Road 776 with said mean high-water line; thence south-southwesterly along said road to the intersection of said road with the mean high-water line of Gasparilla Island; thence southerly along said mean high-water line to the most southerly point of Gasparilla Island; thence southeasterly to the northernmost point at the mean high-water line on Lacosta Island; thence southeasterly along said mean high-water line to the northwest corner of Section 6, Township 44 South, Range 21 East; thence east to a northerly extension of the east line of Section 25, Township 44 South, Range 21 East; thence southeasterly along the mean high-water line of Pine Island to the intersection of the east line of Section 28, Township 43 South, Range 22 East, with said mean high-water line; thence northeasterly to the intersection of the north line of Section 23, Township 43 South, Range 22 East with the mean high-water line; thence northerly along said mean high-water line to the intersection of State Road 45 (U.S. Highway 41) with said mean high-water line; thence northwesterly along said road to the intersection of said road with the mean high-water line at Live Oak Point; thence westerly along the mean high-water line to the intersection of State Road 771 with said mean high-water line; thence south-southwesterly along said road to the intersection of said road with the mean high-water line, on the southern shore of the Myakka River; thence southerly along the mean high-water line of the westerly shore of Charlotte Harbor to the northwest corner of Section 6, Township 42 South, Range 22 East; thence east along the north line and extension thereof of said Section 6 to a point 2,640 feet east of the westerly shoreline of Charlotte Harbor; thence southerly along a line 2,640 feet easterly of and parallel with the westerly

shoreline of Charlotte Harbor and along a southerly extension of said line to the line dividing Charlotte and Lee Counties; thence southwesterly along a straight line to the most southerly point of Devil Fish Key; thence along said line to the easterly right-of-way of the Intracoastal Waterway; thence northerly along the easterly right-of-way of the Intracoastal Waterway to its intersection with a southerly extension of the west line of Section 18, Township 42 South, Range 21 East; thence north along said line to the point of beginning. Said boundary extends across the mouths of all artificial waterways, but includes all tidally connected natural waterways.

History.—s. 1, ch. 79-115.

258.393 Terra Ceia Aquatic Preserve wastewater or effluent discharge activities.—

(1) The following described area in Manatee County is hereby designated by the Legislature for inclusion in the aquatic preserve system under the Florida Aquatic Preserve Act of 1975. Such area, to be known as the Terra Ceia Aquatic Preserve, shall be included in the aquatic preserve system and shall include the following described real property: Begin at a point 165 feet north of the southwest corner of the northwest quarter of Section 12, Township 33 South, Range 17 East, Manatee County, thence run west to the mean high-water line of Tampa Bay, said point being the point of beginning. From said point of beginning, run northwesterly into the waters of Tampa Bay and parallel to the Port Manatee ship channel to the Manatee-Hillsborough county line; thence run southwest along the Manatee-Hillsborough county line to its intersection with the Intracoastal Waterway; thence run south-southwesterly along the Intracoastal Waterway to a point on a line connecting the westernmost tip of Sneed Island (Manatee County) to the southernmost tip of Mullet Key (Pinellas County); thence run southeasterly along said line to the westernmost tip of Sneed Island (also known as Emerson Point); thence run in a northeasterly direction along the mean high-water line of Tampa Bay, Terra Ceia Bay, where the mean high water line intersects the north line of U.S. Government Lot 4, Section 16, Township 34 South, Range 17 East; thence east along the said north line of U.S. Government Lot 4 and the easterly extension thereof a distance of 1,111 feet more or less to the mean high water line at a seawall; thence meander in a northwesterly, westerly, northerly direction along the seawall of a canal; thence in a northeasterly direction along the mean high water line of Miguel Bay, Joe Bay, and Bishop Harbor to the point of beginning, including tidal waters of all tributaries; less all privately titled submerged lands and uplands.

(2) Wastewater or effluent discharge activities from an existing stationary facility or existing stationary installation which has been approved pursuant to state law or federal law or for which facility or installation an application has been filed before June 24, 1984, are exempt from the requirements of this chapter.

History.—s. 1, ch. 84-312; s. 4, ch. 85-345.

258.394 Guana River Marsh Aquatic Preserve.—The following described area in St. Johns County is hereby designated by the Legislature for inclusion in the aquatic preserve system under the Florida Aquatic Pre-

serve Act of 1975. Such area, to be known as the Guana River Marsh Aquatic Preserve, shall be included in the aquatic preserve system and shall include all the sovereignty submerged lands and other state-owned lands lying within the following described boundaries: Begin at the intersection of the westerly projection of the south line of Section 18, Township 6 South, Range 30 East, with the westerly mean high water line of Tolomato River; Thence proceed easterly along the south line of Section 18 to the mean high water line of the Atlantic Ocean; thence proceed east three geographic miles into said ocean; thence proceed northerly running parallel with said mean high water line to a point east of the intersection of the southerly right-of-way of Micklers Road and the westerly right-of-way of U.S. A1A; thence proceed west to said intersection; thence proceed southwesterly along the southerly right-of-way of Micklers Road to its intersection with the westerly mean high water line of the Tolomato River; thence proceed southerly along the westerly mean high water line of said river and its tributaries to the point of beginning.

History.—s. 2, ch. 85-345.

258.395 Big Bend Seagrasses Aquatic Preserve.—

The following described area in Wakulla, Jefferson, Taylor, Dixie, and Levy Counties is hereby designated by the Legislature for inclusion in the aquatic preserve system under the Florida Aquatic Preserve Act of 1975. Such area, to be known as the Big Bend Seagrasses Aquatic Preserve, shall be included in the aquatic preserve system and shall include all the sovereignty submerged lands lying within the following described boundaries: Begin where the northerly mean high water line of Withlacoochee River meets the mean high water line of the Gulf of Mexico, Township 17 South, Range 15 East, Levy County; Thence from the said point of beginning proceed northwesterly along the mean high water line of the coast and its navigable tributaries to the intersection of the westerly mean high water line of St. Marks River with the mean high water line of the Gulf of Mexico, in Township 4 South, Range 1 East, Wakulla County; thence proceed south three marine leagues into the Gulf of Mexico; thence proceed southeasterly along a line three marine leagues from and parallel to the line of mean high water previously described to an intersection with a line projected west from the point of beginning; thence proceed east to the point of beginning. Less and except all those sovereignty submerged lands within 500 feet of any incorporated or unincorporated municipality within the above described lands. Less and except: Begin at the intersection of the southerly projection of the east line of Range line 4 East with the mean high water line of the Gulf of Mexico; thence proceed southwest to a point on the three marine league line; thence proceed southeasterly three marine leagues from and parallel to the mean high water line to a point which is southwest of the intersection of the southerly line of Section 22, Township 6 South, Range 6 East, Taylor County, with the mean high water line of the Gulf of Mexico; thence proceed Northeast to the foresaid point of intersection; thence proceed northwesterly along the mean high water line of the Gulf of Mexico and its tributaries to the point of beginning. Less and except all

those local access channels adjacent to Keaton Beach and a proposed navigational channel more particularly described as follows: Begin at State Plane Coordinate, X=2,288,032; Y=298,365; Thence proceed West 11,608 feet; thence proceed south 1,440 feet; thence proceed east 11,608 feet; thence proceed north 1,440 feet to the point of beginning; less and except all those sovereignty submerged lands lying northerly and easterly of U.S. Highway 19.

History.—s. 3, ch. 85-345.

258.396 Boca Ciega Bay Aquatic Preserve.—

(1) Boca Ciega Bay, in Pinellas County, as hereinafter described, is designated and established as an aquatic preserve under the provisions of this section. It is the intent of the Legislature that Boca Ciega Bay be preserved, insofar as possible, in an essentially natural condition so that its biological and aesthetic values may endure for the enjoyment of future generations.

(2)(a) For the purposes of this section, Boca Ciega Bay, sometimes referred to in this section as "the preserve," shall be comprised of that body of water in Pinellas County which lies south of the State Road 688 bridge at, or near, Indian Rocks Beach and within the area enclosed by a line as follows: Beginning at a point where the east end of said bridge crosses the western shoreline of mainland Pinellas County and extending in a generally southerly direction along the western shoreline of mainland Pinellas County to the west end of the Seminole Bridge following the bridge easterly to exclude Long Bayou and Cross Bayou, thence in a southerly direction including the western shoreline of the Sunshine Skyway Causeway and extending to the southern boundary of Pinellas County, thence westerly along the Pinellas County line and around Mullet Key along a line 100 yards seaward of the shoreline of Mullet Key and northerly along a line passing 100 yards to the west of the shorelines of Summer Resort Key, Cabbage Key and Shell Key to the southernmost point of Long Key, thence in a generally northerly direction along the inner shoreline of Long Key, Treasure Island and Sand Key to a point where the west end of the State Road 688 bridge crosses the inner shoreline of Sand Key, thence easterly along the south side of said bridge to the point of beginning. The boundary of the preserve designated as the shoreline shall mean the line of mean high water along such shoreline.

(b) The preserve established by this section shall include the submerged bottom lands, the water column upon such lands, and the islands owned by the state within the boundaries of the preserve. Any privately held land or submerged land within the established bulkhead lines or privately held islands within the preserve shall be deemed to be excluded therefrom. The Board of Trustees of the Internal Improvement Trust Fund may negotiate an arrangement with any such private owner whereby such lands or water bottoms may be included within the preserve.

(3) The Board of Trustees of the Internal Improvement Trust Fund are hereby directed to maintain Boca Ciega Bay as an aquatic preserve subject to the following provisions:

(a) No further sale, transfer, or lease of sovereignty submerged lands within the preserve shall be approved or consummated by the board of trustees except upon a showing of extreme hardship on the part of the applicant or when the overwhelming public interest so demands.

(b) No further dredging or filling of submerged lands within the preserve shall be approved or tolerated by the board of trustees except:

1. Such minimum dredging and spoiling as may be authorized for public navigation projects;
2. Such other alteration of physical conditions as may be necessary to enhance the quality or utility of the preserve as determined by the Pinellas County Water and Navigation Control Authority in a public hearing; and
3. Such dredging as is necessary for the purpose of eliminating conditions hazardous to the public health or for the purpose of eliminating stagnant waters, unsightly mud flats, islands, and spoil banks the dredging of which would enhance the aesthetic quality and utility of the preserve and is clearly in the public interest as determined by the Pinellas County Water and Navigation Control Authority in a public hearing.

There shall be no dredging beyond the bulkhead line for the sole purpose of providing fill for upland or submerged land within the bulkhead line. In addition there shall be no drilling of wells, excavation for shell or minerals, and no erection of structures (other than docks) within the preserve, unless such activity is associated with activity authorized by this section.

(c) The board of trustees shall not approve any seaward relocation of bulkhead lines or further establishment of bulkhead lines except when a proposed bulkhead line is located at the line of mean high water along the shoreline.

(4)(a) The board of trustees shall adopt and enforce reasonable rules and regulations to carry out the provisions of this section and specifically to provide:

1. Additional preserve management criteria as may be necessary to accommodate special circumstances; and
2. Regulation of human activity within the preserve in such a manner as not to interfere unreasonably with such lawful and traditional public uses of the preserve as fishing (both sport and commercial), boating, and swimming.

(b) Other uses of the preserve, or human activity within the preserve, although not originally contemplated, may be permitted by the board of trustees, but only subsequent to a formal finding of compatibility with the purposes of this section.

(5) Neither the establishment nor the management of the Boca Ciega Bay Aquatic Preserve shall operate to infringe upon the riparian rights of upland property owners adjacent to or within the preserve. Reasonable improvement for ingress and egress, mosquito control, shore protection, bridges, causeways, and similar purposes may be permitted by the board of trustees, subject to the provisions of any other applicable laws under the jurisdiction of other agencies.

(6) Nothing herein shall be construed to deprive the Pinellas County Water and Navigation Control Authority

of its jurisdiction, powers, and duties.

History.—ss 1, 2, 3, 4, 5, 6, ch 69-342, ss 27, 35, ch 69-106

Note.—See s. 26, ch 75-22, which repealed s. 253.122 relating to the power to fix bulkhead lines, and s. 7(3), ch 75-22 (s. 253.1221) which reestablished all previously established bulkhead lines at the line of mean high water or ordinary high water.

Note.—Former s. 258.16.

258.397 Biscayne Bay Aquatic Preserve.—

(1) **DESIGNATION.**—Biscayne Bay in Dade and Monroe Counties, as hereinafter described to include Card Sound, is designated and established as an aquatic preserve under the provisions of this section. It is the intent of the Legislature that Biscayne Bay be preserved in an essentially natural condition so that its biological and aesthetic values may endure for the enjoyment of future generations.

(2) BOUNDARIES.—

(a) For the purposes of this section, Biscayne Bay, sometimes referred to in this section as "the preserve," shall be comprised of the body of water in Dade and Monroe Counties known as Biscayne Bay whose boundaries are generally defined as follows:

Begin at the southwest intersection of the right-of-way of State Road 826 and the mean high-water line of Biscayne Bay (Township 52 South, Range 42 East, Dade County); thence southerly along the westerly mean high-water line of Biscayne Bay to its intersection with the right-of-way of State Road 905A (Township 59 South, Range 40 East, Monroe County); thence easterly along such right-of-way to the easterly mean high-water line of Biscayne Bay; thence northerly along the easterly mean high-water line of Biscayne Bay following the westerly shores of the most easterly islands and Keys with connecting lines drawn between the closest points of adjacent islands to the southeasterly intersection of the right-of-way of State Road 826 and the mean high-water line of Biscayne Bay; thence westerly to the point of beginning. Said boundary extends across the mouths of all artificial waterways, but includes all natural waterways tidally connected to Biscayne Bay. Excluded from the preserve are those submerged lands conveyed to the United States for the establishment of the Biscayne National Monument as defined by Pub. L. No. 90-606 of the United States.

(b) The preserve established by this section shall include the submerged bottom lands and the water column upon such lands, as well as all publicly owned islands, within the boundaries of the preserve. Any privately held upland within the boundaries of the preserve shall be deemed to be excluded therefrom. However, the Board of Trustees of the Internal Improvement Trust Fund may negotiate an arrangement with any such private upland owner by which such land may be included in the preserve.

(c) The board of trustees may transfer to the United States any interest in lands, title to which is vested in the board of trustees, which are presently within the boundaries of the preserve for inclusion in the Biscayne National Monument or its successor should the area be designated a national park. Transfers of interest under this paragraph shall be subject to the following conditions:

1. All interests in oil, gas, or other mineral rights held by the board of trustees shall be retained and not transferred to the United States.

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2. All rights to fish on the waters shall be retained and not transferred to the United States.

3. All rights to impose and collect state excise taxes on the sales of alcohol or tobacco shall be retained and not transferred to the United States.

4. Transfers of interest shall be subject to outstanding easements, reservations, or other interests appearing of record.

(3) **AUTHORITY OF TRUSTEES.**—The Board of Trustees of the Internal Improvement Trust Fund is authorized and directed to maintain the aquatic preserve hereby created pursuant and subject to the following provisions:

(a) No further sale, transfer, or lease of sovereignty submerged lands in the preserve shall be approved or consummated by the board of trustees, except upon a showing of extreme hardship on the part of the applicant and a determination by the board of trustees that such sale, transfer, or lease is in the public interest.

(b) No further dredging or filling of submerged lands of the preserve shall be approved or tolerated by the board of trustees except:

1. Such minimum dredging and spoiling as may be authorized for public navigation projects or for such minimum dredging and spoiling as may be constituted as a public necessity or for preservation of the bay according to the expressed intent of this section.

2. Such other alteration of physical conditions as may be necessary to enhance the quality or utility of the preserve.

3. Such minimum dredging and filling as may be authorized for the creation and maintenance of marinas, piers, and docks and their attendant navigation channels and access roads. Such projects may only be authorized upon a specific finding by the board of trustees that there is assurance that the project will be constructed and operated in a manner that will not adversely affect the water quality of the preserve. This subparagraph shall not approve the connection of upland canals to the waters of the preserve.

4. Such dredging as is necessary for the purpose of eliminating conditions hazardous to the public health or for the purpose of eliminating stagnant waters, unsightly mud flats, islands, and spoil banks, the dredging of which would enhance the aesthetic quality and utility of the preserve and be clearly in the public interest as determined by the board of trustees.

Any dredging or filling under this subsection or improvements under subsection (5) shall be approved only after public notice and hearings in the area affected, pursuant to chapter 120.

(c) There shall be no drilling of wells, excavation for shell or minerals, or erection of structures other than docks within the preserve unless such activity is associated with activity authorized by this section.

(d) The board of trustees shall not approve any seaward relocation of bulkhead lines or further establishment of bulkhead lines except when a proposed bulkhead line is located at the line of mean high water along the shoreline. Construction, replacement, or relocation of seawalls shall be prohibited without the approval of

the board of trustees, which approval may be granted only if riprap construction is used in the seawall.

(e) Notwithstanding other provisions of this section, the board of trustees may, respecting lands lying within Biscayne Bay:

1. Enter into agreements for and establish lines delineating sovereignty and privately owned lands.

2. Enter into agreements for the exchange of, and exchange, sovereignty lands for privately owned lands.

3. Accept gifts of land within or contiguous to the preserve.

4. Negotiate for, and enter into agreements with owners of lands contiguous to sovereignty lands for, any public and private use of any of such lands.

5. Take any and all actions convenient for, or necessary to, the accomplishment of any and all of the acts and matters authorized by this paragraph.

(4) **RULES.**—

(a) The board of trustees shall adopt and enforce reasonable rules and regulations to carry out the provisions of this section and specifically to provide:

1. Additional preserve management criteria as may be necessary to accommodate special circumstances.

2. Regulation of human activity within the preserve in such a manner as not to interfere unreasonably with lawful and traditional public uses of the preserve, such as fishing (both sport and commercial), boating, and swimming.

(b) Other uses of the preserve, or human activity within the preserve, although not originally contemplated, may be permitted by the board of trustees, but only subsequent to a formal finding of compatibility with the purposes of this section.

(c) Fishing involving the use of seines or nets is prohibited in the preserve, except when the fishing is for shrimp or mullet and such fishing is otherwise permitted by state law or rules promulgated by the Department of Natural Resources.

(5) **RIPARIAN RIGHTS.**—Neither the establishment nor the management of the Biscayne Bay Aquatic Preserve shall operate to infringe upon the riparian rights of upland property owners adjacent to or within the preserve. Reasonable improvement for ingress and egress, mosquito control, shore protection, public utility expansion, and similar purposes may be permitted by the board of trustees or Department of Environmental Regulation, subject to the provisions of any other applicable laws under the jurisdiction of other agencies.

(6) **DISCHARGE OF WASTES PROHIBITED.**—No wastes or effluents which substantially inhibit the accomplishment of the purposes of this section shall be discharged into the preserve.

(7) **ENFORCEMENT.**—The provisions of this section may be enforced in accordance with the provisions of s. 403.412. In addition, the Department of Legal Affairs is authorized to bring an action for civil penalties of \$5,000 per day against any person, natural or corporate, who violates the provisions of this section or any rule or regulation issued hereunder.

(8) **SECTIONS 403.501-403.515 APPLICABLE.**—The provisions of this section shall be subject to the provisions of ss. 403.501-403.515.

History.—ss. 1, 2, 3, 4, 5, 6, 7, 8, ch. 74-171; s. 2, ch. 76-109; s. 1, ch. 77-174; s.

1, ch. 78-628; s. 12, ch. 79-65; s. 1, ch. 80-204

Note.—Section 26, ch. 75-22, repealed s. 253.122, relating to the power to fix bulkhead lines

Note.—Former s. 258.165.

258.40 Scope of preserves.—

(1) The aquatic preserves established under this act shall include only lands or water bottoms owned by the state as set forth in s. 253.03 and such lands or water bottoms owned by other governmental agencies as may be specifically authorized for inclusion by appropriate instrument in writing from such agency. Any privately owned lands or water bottoms shall be deemed to be excluded therefrom; however, the board may negotiate an arrangement with any such private owner by which such land may be included in the preserves.

(2) Any publicly owned and maintained navigation channel or other public works project authorized by the United States Congress designed to improve or maintain commerce and navigation shall be deemed excluded from the aquatic preserves established under this act.

(3) All lands lost by avulsion or by artificially induced erosion shall be deemed excluded from the provision: s of this act.

History.—s. 1, ch. 75-172.

258.41 Establishment of aquatic preserves.—

(1) The board may establish additional areas to be included in the aquatic preserve system, subject to confirmation by the Legislature.

(2) The board may, after public notice and public hearing in the county or counties in which the proposed preserve is to be located, adopt a resolution formally setting aside such areas to be included in the aquatic preserve system.

(3) The resolution setting aside an aquatic preserve area shall include:

(a) A legal description of the area to be included.

(b) The designation of the type of aquatic preserve being set aside.

(c) A general statement of what is sought to be preserved.

(d) A clear statement of the management responsibilities for the area.

(4) Lands and water bottoms owned by other governmental agencies may be included in an aquatic preserve upon specific authorization for inclusion by an appropriate instrument in writing from the governmental agency.

(5) Lands and water bottoms in private ownership may be included in an aquatic preserve upon specific authorization for inclusion by an appropriate instrument in writing from the owner. The appropriate instrument shall be either a dedication in perpetuity or a lease. Such lease shall contain the following conditions:

(a) Term of the lease shall be for a minimum period of 10 years.

(b) The board shall have the power and duty to enforce the provisions of each lease agreement and shall additionally have the power to terminate any lease if the termination is in the best interest of the aquatic preserve system.

(c) The board shall pay no more than \$1 per year for any such lease.

(6) Except as provided in subsection (5) no aquatic preserve or any part thereof shall be withdrawn from the state aquatic preserve system except by an act of the Legislature. Notice of such proposed legislation shall be published in each county in which the affected area is located, in the manner prescribed by law relating to local legislation.

(7) Within 30 days of the designation and establishment of an aquatic preserve, the Board of Trustees of the Internal Improvement Trust Fund shall record in the public records of the county or counties in which the aquatic preserve is located a legal description of the aquatic preserve.

History.—s. 1, ch. 75-172.

258.42 Maintenance of preserves.—The Board of Trustees of the Internal Improvement Trust Fund shall maintain such aquatic preserves subject to the following provisions:

(1) No further sale, lease, or transfer of sovereignty submerged lands shall be approved or consummated by the trustees except when such sale, lease, or transfer is in the public interest.

(2) The trustees shall not approve the waterward relocation or setting of bulkhead lines waterward of the line of mean high water within the preserve except when public road and bridge construction projects have no reasonable alternative and it is shown to be not contrary to the public interest.

(3)(a) No further dredging or filling of submerged lands shall be approved by the trustees except the following activities may be authorized pursuant to a permit:

1. Such minimum dredging and spoiling as may be authorized for public navigation projects.

2. Such minimum dredging and spoiling as may be authorized for the creation and maintenance of marinas, piers, and docks and their attendant navigation channels.

3. Such other alteration of physical conditions as may, in the opinion of the trustees, be necessary to enhance the quality or utility of the preserve or the public health generally.

4. Such other maintenance dredging as may be required for existing navigation channels.

5. Such restoration of land as authorized by s. 253.124(8).

6. Such reasonable improvements as may be necessary for public utility installation or expansion.

7. Installation and maintenance of oil and gas transportation facilities, provided such facilities are properly marked with marine aids to navigation as prescribed by federal law.

(b) There shall, in no case, be any dredging seaward of a bulkhead line for the sole or primary purpose of providing fill for any area landward of a bulkhead line.

(c) There shall be no drilling of gas or oil wells. However, this will not prohibit the state from leasing the oil and gas rights and permitting drilling from outside the preserve to explore for oil and gas if approved by the board.

(d) There shall be no excavation of minerals, except the dredging of dead oyster shells as approved by the Department of Natural Resources.

(e) There shall be no erection of structures within the preserve, except:

1. Private docks for reasonable ingress or egress of riparian owners;
2. Commercial docking facilities shown to be consistent with the use or management criteria of the preserve; and
3. Structures for shore protection, approved navigational aids, or public utility crossings authorized under subsection (3)(a).

(f) No wastes or effluents shall be discharged into the preserve which substantially inhibit the accomplishment of the purposes of this act.

(g) No nonpermitted wastes or effluents shall be directly discharged into the preserve which substantially inhibit the accomplishment of the purposes of this act.

History.—ss. 1, 2, 4, ch. 75-172; s. 1, ch. 77-174.

Note.—See s. 26, ch. 75-22, which repealed s. 253.122, relating to the power to fix bulkhead lines, and s. 7(3), ch. 75-22 (s. 253.1221), which reestablished all previously established bulkhead lines at the line of mean high water or ordinary high water.

258.43 Rules and regulations.—

(1) The Board of Trustees of the Internal Improvement Trust Fund shall adopt and enforce reasonable rules and regulations to carry out the provisions of this act and specifically to provide regulation of human activity within the preserve in such a manner as not to unreasonably interfere with lawful and traditional public uses of the preserve, such as sport and commercial fishing, boating, and swimming.

(2) Other uses of the preserve, or human activity within the preserve, although not originally contemplated, may be permitted by the trustees, but only subsequent to a formal finding of compatibility with the purposes of this act.

History.—s. 1, ch. 75-172.

258.44 Effect of preserves.—Neither the establishment nor the management of the aquatic preserves under the provisions of this act shall operate to infringe upon the traditional riparian rights of upland property owners adjacent to or within the preserves. Reasonable improvement for ingress and egress, mosquito control, shore protection, public utility expansion, surface water drainage, installation and maintenance of oil and gas transportation facilities, and similar purposes may be permitted by the trustees subject to the provisions of any other applicable laws under the jurisdiction of other agencies.

History.—s. 1, ch. 75-172.

258.45 Provisions not superseded.—The provisions of this act shall not supersede, but shall be subject to, the provisions of ss. 403.501 through 403.515.

History.—ss. 3, 6, ch. 75-172.

258.46 Enforcement; violations; penalty.—The provisions of this act may be enforced by the Board of Trustees of the Internal Improvement Trust Fund or in accordance with the provisions of s. 403.412. However, any violation by any person, natural or corporate, of the provisions of this act or any rule or regulation issued

hereunder shall be further punishable by a civil penalty of not less than \$500 per day or more than \$5,000 per day of such violation.

History.—s. 5, ch. 75-172.

PART IV

WILD AND SCENIC RIVERS

258.501 Myakka River; wild and scenic segment.

1258.501 Myakka River; wild and scenic segment.—

(1) **SHORT TITLE.**—This act may be cited as the "Myakka River Wild and Scenic Designation and Preservation Act."

(2) **LEGISLATIVE DECLARATION.**—The Legislature finds and declares that a certain segment of the Myakka River in Manatee, Sarasota, and Charlotte Counties possesses outstandingly remarkable ecological, fish and wildlife, and recreational values which are unique in the State of Florida. These values give significance to the river as one which should be permanently preserved and enhanced for the citizens of the State of Florida, both present and future. The permanent management and administration of the river involves a complex interaction of state, regional, and local interests which require balancing and coordination of purpose. It is the intention of the Legislature to provide for the permanent preservation of the designated segment of the Myakka River by way of development of a plan for permanent administration by agencies of state and local government which will ensure the protection necessary but retain that degree of flexibility, responsiveness, and expertise which will accommodate all of the diverse interests involved in a manner best calculated to be in the public interest.

(3) **DEFINITIONS.**—As used in this act:

(a) "Activity" means the doing of any act or the failing to do any act, whether by a natural person or a corporation.

(b) "Coordinating council" means the council created by subsection (6).

(c) "Department" means the Department of Natural Resources.

(d) "Division" means the Division of Recreation and Parks of the Department of Natural Resources.

(e) "Executive board" means the Governor and Cabinet sitting as the head of the Department of Natural Resources.

(f) "Resource value" means any one or more of the specific economic, scenic, recreational, geologic, fish and wildlife, historic, cultural, or ecological features associated with the river area as determined by the coordinating council.

(g) "River area" means that corridor of land beneath and surrounding the Myakka River from river mile 7.5 to river mile 41.5, together with a corridor extending from the center of the river to the maximum upland extent of wetlands vegetation.

(4) **DESIGNATION OF WILD AND SCENIC RIVER.**—The corridor of land surrounding and beneath the Myakka River between river mile 7.5 and river mile 41.5 is hereby designated as a Florida wild and scenic river for the purposes of this act and is subject to all of the provi-

Additional language see attached

RULES
OF THE
DEPARTMENT OF NATURAL
RESOURCES

DIVISION OF STATE LANDS

18-20

CHAPTER ~~18-20~~

FLORIDA AQUATIC PRESERVES

- 18-20.001 ~~18-20.01~~ Intent.
- 18-20.002 ~~18-20.02~~ Boundaries and Scope of the Preserves.
- 18-20.003 ~~18-20.03~~ Definitions. *MANAGEMENT POLICIES, STANDARDS*
- 18-20.004 ~~18-20.04~~ General Management Criteria. *Criteria.*
- ~~18-20.005~~ *Use, Sale, Lease, or Transfer of Interest in Land, or Maintenance, Title by the Board.*
- 18-20.006 ~~18-20.06~~ Cumulative Impacts. *Protection of Riparian Rights.*
- 18-20.008 ~~18-20.08~~ Inclusion of Lands, Title to Which Is Not Vested in the Board, in a Preserve.
- 18-20.009 ~~18-20.09~~ Establishment or Expansion of Aquatic Preserves.
- 18-20.010 ~~18-20.10~~ Exchange of Lands.
- 18-20.011 ~~18-20.11~~ Gifts of Lands.
- 18-20.012 ~~18-20.12~~ Protection of Indigenous Life Forms.
- 18-20.013 ~~18-20.13~~ Development of Resource Inventories and Management Plans for the Preserves.
- 18-20.014 ~~18-20.14~~ Enforcement. *Application Form.*
- 18-20.016 ~~18-20.16~~ Coordination with Other Governmental Agencies.
- 18-20.017 LAKE JACKSON AQUATIC PRESERVE
- 18-20.001 ~~18-20.01~~ Intent.

(1) All sovereignty lands within a preserve shall be managed primarily for the maintenance of essentially natural conditions, the propagation of fish and wildlife, and public recreation, including hunting and fishing where deemed appropriate by the board, and the managing agency.

(2) The aquatic preserves which are described in 73-534, Laws of Florida, Sections 258.39, 258.391, 258.392 and 258.395, Florida Statutes, future aquatic preserves established pursuant to general or special acts of the legislature, and in Rule 18-20.002 Florida Administrative Code, were established for the purpose of being preserved in an essentially natural or existing condition so that their aesthetic, biological and scientific values may endure for the enjoyment of future generations.

Specific Authority: 120.53, 258.43(1) FS. Law Implemented: 258.35, 258.36, 258.37, 258.39, 258.393 FS. Chapter 60-280 Laws of Florida. History—New 1-23-61. Amended 6-7-63.

(3) The preserves shall be administered and managed in accordance with the following goals:

(a) To preserve, protect, and enhance these exceptional areas of sovereignty submerged lands by reasonable regulation of human

activity within the preserves through the development and implementation of a comprehensive management program;

(b) To protect and enhance the waters of the preserves so that the public may continue to enjoy the traditional recreational uses of those waters such as swimming, boating, and fishing;

(c) To coordinate with federal, state, and local agencies to aid in carrying out the intent of the Legislature in creating the preserves;

(d) To use applicable federal, state, and local management programs, which are compatible with the intent and provisions of the act and these rules, and to assist in managing the preserves;

(e) To encourage the protection, enhancement or restoration of the biological, aesthetic, or scientific values of the preserves, including but not limited to the modification of existing manmade conditions toward their natural condition, and discourage activities which would degrade the aesthetic, biological, or scientific values, or the quality, or utility of a preserve, when reviewing applications, or when developing and implementing management plans for the preserves;

(f) To preserve, promote, and utilize indigenous life forms and habitats, including but not limited to: sponges, soft coral, hard corals, submerged grasses, mangroves, salt water marshes, fresh water marshes, mud flats, estuarine, aquatic, and marine reptiles, game and non-game fish species, estuarine, aquatic and marine invertebrates, estuarine, aquatic and marine mammals, birds, shellfish and mollusks;

(g) To acquire additional title interests in lands wherever such acquisitions would serve to protect or enhance the biological, aesthetic, or scientific values of the preserves;

(h) To maintain those beneficial hydrologic and biologic functions, the benefits of which accrue to the public at large.

(4) Nothing in these rules shall serve to eliminate or alter the requirements or authority of other governmental agencies, including counties and municipalities, to protect or enhance the preserves provided that such requirements or authority are not inconsistent with the act and this chapter.

Specific Authority: 20.53, 258.43(1) Law implemented 258.35, 258.36, 258.37, 258.38, Ch. 86-280, Laws of Florida. History—New 2-23-81.

~~19-20.06~~ **Boundaries and Scope of the Preserves.**

(1) These rules shall only apply to those sovereignty lands within a preserve, title to which is vested in the board, and those other lands for which the board has an appropriate instrument in writing, executed by the owner, authorizing the inclusion of specific lands in an aquatic preserve pursuant to Section 2(2) of Chapter 73-534, Laws of Florida, Sections 258.40(1) and 258.41(5), Florida Statutes, future aquatic preserves established through general or special acts of the legislature, and pursuant to Rule ~~19-20.06~~ 20.069, Florida Administrative Code. Any publicly owned and maintained navigation channel authorized by the United States Congress, or other public works project authorized by the United States Congress, designed to improve or maintain commerce and navigation shall be deemed to be excluded from the provisions of this chapter, pursuant to Subsection 258.40(2), Florida Statutes. Furthermore, all lands lost by avulsion or by artificially induced erosion shall be deemed excluded from the provisions of this chapter pursuant to Subsection 258.40(3), Florida Statutes.

(2) These rules do not apply to Boca Ciega Bay, Pinellas County or Biscayne Bay Aquatic Preserves.

(3) These rules are promulgated to clarify the responsibilities of the board in carrying out its land management functions as those functions apply within the preserves. Implementation and responsibility for environmental permitting of activities and water quality protection within the preserves are vested in the Department of Environmental Regulation. Since these rules are considered cumulative with other rules, a person planning an activity within the preserves should also consult the other applicable department rules (Chapter ~~20.06~~ 21, Florida Administrative Code, for example) as well as the rules of the Department of Environmental Regulation.

(4) These rules shall not affect previous actions of the board concerning the issuance of any easement or lease; or any disclaimer concerning sovereignty lands.

(5) The intent and specific provisions expressed in ~~19-20.06~~ (e) and (f) apply generally to all existing or future aquatic preserves within the scope of this chapter. Upon completion of a resource inventory and approval of a management plan for a

~~19-20.06~~ preserve, pursuant to ~~19-20.06~~, the type designation and the resource sought to be preserved may be readdressed by the Board.

(6) For the purpose of clarification and interpretation, the legal description set forth as follows do not include any land which is expressly recognized as privately owned upland in a pre-existing recorded mean high water line settlement agreement between the board and a private owner or owners. Provided, however, in those instances wherein a settlement agreement was executed subsequent to the passage of the Florida Coastal Mapping Act, the determination of the mean high water line shall be in accordance with the provisions of such act.

(7) Persons interested in obtaining details of particular preserves should contact the Bureau of State Lands Management, Department of Natural Resources, 3900 Commonwealth Blvd., Tallahassee, FL 32303 (telephone 904-486-2297).

(a) The preserves are described as follows:

1. Fort Clinch State Park Aquatic Preserve, as described in the Official Records of Nassau County in Book 108, pages 343-346, and in Book 111, page 409.

2. Nassau River — St. Johns River Marshes Aquatic Preserve, as described in the Official Records of Duval County in Volume 3183, pages 347-352, and in the Official Records of Nassau County in Book 108, pages 232-237.

3. Fellicer Creek Aquatic Preserve, as described in the Official Records of St. Johns County in Book 181, pages 363-366, and in the Official Records of Flagler County in Book 33, pages 131-134.

4. Tomoka Marsh Aquatic Preserve, as described in the Official Records of Flagler County in Book 33, pages 135-138, and in the Official Records of Volusia County in Book 1244, pages 613-618.

FLORIDA AQUATIC PRESERVES

18-20
CH. ~~18-20~~

GENERAL LOCATION
OF
FLORIDA AQUATIC PRESERVES

1. Fort Clinch State Park
2. Passaic River—St. Johns River watershed
3. Panther Creek
4. Tenmile marsh
5. Wekiva River
6. Mosquito Lagoon
7. Banana River
8. Indian River—Malabar to Sebastian
9. Indian River—Vero Beach to Ft. Pierce
10. Jensen Beach to Jupiter Inlet
11. North Fork, St. Lucie
12. Loxahatchee River—Lake Worth Canal
13. Bienville Bay—Cape Florida to
Merritt County Line
14. Lippincott Bay
15. Gordon Bight
16. Cady Ranch—Ten Thousand Islands
17. Rookery Bay
18. Estero Bay
19. Pine Island Sound
20. Maitland Park
21. Galveston Bay—Charlotte Harbor
22. Cady Park
23. Cockroach Bay
24. St. Martin's Marsh
25. Anclote Marsh
26. Adamoichon Bay
27. St. Joseph Bay
28. St. Andrew State Park
29. Rocky Bayou State Park
30. Yellow River Marsh
31. Fort Pickens State Park

FIGURE 1)

5. Wekiva River Aquatic Preserve, as described in Section 25E.39(30), F.S.

6. Mosquito Lagoon Aquatic Preserve, as described in the Official Records of Volusia County in Book 1244, pages 619-623, and in the Official Records of Brevard County in Book 1143, pages 190-194.

7. Banana River Aquatic Preserve, as described in the Official Records of Brevard County in Book 1143, pages 195-198, less those lands dedicated to the U. S. A. prior to the enactment of the act, until such time as the U. S. A. no longer wishes to maintain such lands for the purpose for which they were dedicated, at which time such lands would revert to the board, and be managed as part of the preserve.

8. Indian River — Malabar to Sebastian Aquatic Preserve, as described in the Official Records of Brevard County in Book 1143, pages 199-202, and in the Official Records of Indian River County in Book 368, pages 5-8.

9. Indian River — Vero Beach to Fort Pierce Aquatic Preserve, as described in the Official Records of Indian River County in Book 368, pages 9-12, and in the Official Records of St. Lucie County in Book 187, pages 1083-1086.

10. Jensen Beach to Jupiter Inlet Aquatic Preserve, as described in the Official Records of St. Lucie County in Book 218, pages 2865-2869.

11. North Fork, St. Lucie Aquatic

Preserve, as described in the Official Records of Marion County in Book 357, pages 2159-2162, and in the Official Records of St. Lucie County in Book 201, pages 1676-1679.

12. Loxahatchee River — Lake Worth Creek Aquatic Preserve, as described in the Official Records of Marion County in Book 320, pages 193-196, and in the Official Records of Palm Beach County in Volume 1860, pages 806-809.

13. Biscayne Bay — Cape Florida to Monroe County Line Aquatic Preserve, as described in the Official Records of Dade County in Book 7055, pages 852-856, less, however, those lands and waters as described in Section 258.165, F. S., (Biscayne Bay Aquatic Preserve Act of 1974), and those lands and waters within the Biscayne National Park.

14. Lignumvitae Key Aquatic Preserve, as described in the Official Records of Monroe County in Book 502, pages 139-142.

15. Coupon Eight Aquatic Preserve, as described in the Official Records of Monroe County in Book 502, pages 143-146.

16. Cape Romano — Ten Thousand Islands Aquatic Preserve, as described in the Official Records of Collier County in Book 381, pages 298-301.

17. Rookery Bay Aquatic Preserve, as described in Section 258.39(31), F.S.

18. Estero Bay Aquatic Preserve as described in Section 258.39(28), Florida Statutes.

19. Pine Island Sound Aquatic Preserve, as described in the Official Records of Lee County in Book 648, pages 732-736.

20. Manatee Pass Aquatic Preserve, as described in the Official Records of Lee County in Book 800, pages 725-728.

21. Gasparilla Sound — Charlotte Harbor Aquatic Preserve, as described in Section 258.392, F.S.

22. Cape Haze Aquatic Preserve, as described in Section 258.39(29), F.S.

23. Cockroach Bay Aquatic Preserve, as described in Section 258.391, F.S.

24. St. Martins Marsh Aquatic Preserve, as described in the Official Records of Citrus County in Book 276, pages 238-241.

25. Alligator Harbor Aquatic Preserve, as described in the Official Records of Franklin County in Volume 98, pages 82-85.

26. Apalachicola Bay Aquatic Preserve, as described in the Official Records of Gulf County in Book 46, pages 77-81, and in the Official Records of Franklin County in Volume 98, pages 102-106.

27. St. Joseph Bay Aquatic Preserve, as described in the Official Records of Gulf County in Book 46, pages 73-76.

28. St. Andrews State Park Aquatic Preserve, as described in the Official Records of Bay County in Book 379, pages 547-550.

29. Rocky Bayou State Park Aquatic Preserve, as described in the Official Records of Okaloosa County in Book 593, pages 742-745.

30. Yellow River Marsh Aquatic Preserve, as described in the Official Records of Santa Rosa County in Book 206, pages 566-571.

31. Fort Pickens State Park Aquatic Preserve, as described in the Official Records of Santa Rosa County in Book 220, pages 60-63, in the Official Records of Escambia County in Book 318, pages 659-662, less the lands dedicated to the U. S. A. for the establishment of the Gulf Islands National Seashore prior to the enactment of the act, until such time as the U. S. A. no longer wishes to maintain such lands for the purpose for which they were dedicated, at which time such lands would revert to the board and be managed as part of the preserve.

Specific Authority: 120.53, 258.43(1) F.S. Law Implemented: 258.39, 258.40, 258.41, 258.42, 258.43, 258.44, 258.45 F.S. History—New 2-23-81.

32. For the purpose of this section the boundaries of the Lake Jackson Aquatic Preserve, shall be the body of water in Leon County known as Lake Jackson in Sections 1, 2, 3, 5, 10, 11 and 14, Township 1 North, Range 1 West and Sections 11, 12, 13, 14, 15, 21, 22, 23, 26, 27, 28, 29, 32, 33, 34, and 35, Township 2 North, Range 1 West lying below the ordinary high water line. Such lands shall include the submerged bottom lands and the water column upon such lands, as well as all publicly owned islands, within the boundaries of the preserve. Any privately held upland within the boundaries of the preserve shall be deemed to be excluded therefrom; provided that the Board may negotiate an arrangement with any such private upland owner by which such land may be included in the preserve.

33. Terra Ceia Aquatic Preserve, as described in Section 258.393, Florida Statutes.

34. Future aquatic preserves established pursuant to general or special acts of the legislature. *Specific Authority: 120.53, 258.43(1) F.S. Law Implemented: 258.39, 258.391, 258.392, 258.393, 258.40, 258.41, 258.42, 258.43, 258.44, 258.45 F.S. History—New 2-23-81, Amended 6-7-85.*

~~160-20-05~~ **Definitions.** When used in these rules, the following words shall have the indicated meaning unless the context clearly indicates otherwise:

(1) "Act" means the provisions of Section 258.35 through 258.46, F.S., the Florida Aquatic Preserve Act.

(2) "Activity" means any project and such other human action within the preserve requiring board approval for the use, sale, lease or transfer of interest in sovereignty lands or materials, or which may require a license from the Department of Environmental Regulation.

(3) "Aesthetic values" means scenic characteristics or amenities of the preserve in its essentially natural state or condition, and the maintenance thereof.

(4) "Applicant" means any person making application for a permit, license, conveyance of an interest in state owned lands or any other necessary form of governmental approval in order to perform an activity within the preserve.

(5) "Beneficial biological functions" means interactions between flora, fauna and physical or chemical attributes of the environment, which provide benefits that accrue to the public at large, including, but not limited to: nutrient, pesticide and heavy metal uptake; sediment retention; nutrient conversion to biomass; nutrient recycling and oxygenation.

(6) "Beneficial hydrological functions" means interactions between flora, fauna and physical geological or geographical attributes of the environment, which provide benefits that accrue to the public at large, including, but not limited to: retardation of storm water flow; storm water retention; and water storage, and periodical release;

(7) "Biological values" means the preservation and promotion of indigenous life forms and habitats including, but not limited to: sponges, soft corals, hard corals, submerged grasses, mangroves, saltwater marshes, fresh water marshes, mud flats, marine, estuarine, and aquatic reptiles, games and non-games fish species, marine, estuarine, and aquatic mammals, marine, estuarine, and aquatic invertebrates, birds and shellfish.

(8) "Board" means the Governor and Cabinet sitting as the Board of Trustees of the Internal Improvement Trust Fund.

(9) "Channel" means a trench, the bottom of which is normally covered entirely by water, with the upper edges of its sides normally below water.

(10) "Commercial, industrial and other revenue generating/income related docks" means docking facilities for an activity which produces income, through rental or any other means, or which serves as an accessory facility to other rental, commercial or industrial operations. It shall include, but not be limited to docking for marinas, restaurants, hotels, motels, commercial fishing, shipping, boat or ship construction, repair, and sales.

(11) "Department" means the State of Florida Department of Natural Resources, as administrator for the board.

(12) "Division" means the Division of State Lands, which performs all staff duties and functions related to the administration of lands title to which is, or will be, vested in the board, pursuant to section 253.002, F.S.

(13) "Dock" means a fixed or floating structure, including moorings, used for the purpose of berthing buoyant vessels either temporarily or indefinitely.

(14) "Essentially natural condition" means those functions which support the continued existence or encourage the restoration of the diverse population of indigenous life forms and habitats to the extent they existed prior to the significant development adjacent to and within the preserve.

(15) "Extreme hardship" means a significant burden, unique to the applicant and not shared by property owners in the area. Self-imposed circumstances caused to any degree by actions of any person subsequent to the enactment of the Act shall not be construed as an extreme hardship. Extreme hardship under this act shall not be construed to include any hardship which arises in whole or in part from the effect of other federal, state or local laws, ordinances, rules or regulations. The term may be inherent in public projects which are shown to be a public necessity.

(16) "Fill" means materials from any source, deposited by any means onto sovereignty lands, either for the purpose of creating new uplands or for any other purpose, including spoiling of dredged materials. For the purpose of this rule, the placement of fillings or riprap shall not be considered to be filling.

(17) ~~(17)~~ "Lease" means a conveyance of interest in lands, title to which is vested in the board, granted in accordance with specific terms set forth in writing.

(18) ~~(18)~~ "Marina" means a small craft harbor complex used primarily for recreation.

(19) ~~(19)~~ "Oil and gas transportation facilities" means those structures necessary for the movement of oil and gas from the production site to the consumer.

(20) ~~(20)~~ "Person" means individuals, minors, partnerships, corporations, joint ventures, estates, trusts, syndicates, fiduciaries, firms, and all other associations and combinations, whether public or private, including governmental entities.

(21) ~~(21)~~ "Pier" means a structure in, on, or over sovereignty lands, which is used by the public primarily for fishing, swimming, or viewing the preserve. A pier shall not include a dock.

(22) "Preserve" means any and all of those areas which are exceptional areas of sovereignty lands and the associated water body so designated in Section 258.39, 258.391, and 258.392, F.S., including all sovereignty lands, title to which is vested in the board, and such other lands as the board may acquire or approve for inclusion, and the water column over such lands, which have been set aside to be maintained in an essentially natural or existing condition of indigenous flora and fauna and their supporting habitat and the natural scenic qualities and amenities thereof.

(23) "Private residential single dock" means a dock which is used for private, recreational or leisure purposes for a single family residence, cottage or other such single dwelling unit and which is designed to moor no more than two boats.

(24) "Private residential multi-slip dock" means a docking facility which is used for private recreational or leisure purposes for multi-unit residential dwellings which shall include but is not limited to condominiums, townhouses, subdivisions and other such dwellings or residential areas and which is designed to moor three or more boats. Yacht clubs associated with residential developments, whose memberships or utilization of the docking facility requires some real property interest in the residential area, shall also be included.

(25) "Public interest" means demonstrable environmental, social, and economic benefits which would accrue to the public at large as a result of a proposed action, and which would clearly exceed all demonstrable environmental, social, and economic costs of the proposed action. In determining the public interest in a request for use, sale, lease, or transfer of interest in sovereignty lands or severance of materials from sovereignty lands, the board shall consider the ultimate project and purpose to be served by said use, sale, lease, or transfer of lands or materials.

(26) "Public navigation project" means a project primarily for the purpose of navigation which is authorized and funded by the United States Congress or by port authorities as defined by Section 315.02(2), F.S.

(27) "Public necessity" means the works or improvements required for the protection of the health and safety of the public, consistent with the Act and these rules, for which no other reasonable alternative exists.

(28) "Public utilities" means those services, provided by persons regulated by the Public Service Commission, or which are provided by rural cooperatives, municipalities, or other governmental agencies, including electricity, telephone, public water and wastewater services, and structures necessary for the provision of these services.

(29) "Quality of the preserve" means the degree of the biological, aesthetic and scientific values of the preserve necessary for present and future enjoyment of it in an essentially natural condition.

(30) "Resource management agreement" means a contractual agreement between the board and one or more parties which does not create an interest in real property but merely authorizes conduct of certain management activities on lands held by the board.

(31) "Resource Protection Area (RPA) 1" — Areas within the aquatic preserves which have resources of the highest quality and condition for that area. These resources may include, but are not limited to corals, marine grassbeds, mangrove swamps, salt-water marsh, oyster bars, archaeological and historical sites, endangered or threatened species habitat, and colonial water bird nesting sites.

(32) "Resource Protection Area 2" — Areas within the aquatic preserves which are in transition with either declining resource protection area 1 resources or new pioneering resources within resource protection area 3.

(33) "Resource Protection Area 3" — Areas within the aquatic preserve that are characterized by the absence of any significant natural resource attributes.

(34) "Riparian rights" means those rights incident to lands bordering upon navigable waters, as recognized by the courts of this state and common law.

(35) "Sale" means a conveyance of interest in lands, by the board, for consideration.

(36) "Scientific values" means the preservation and promotion of certain qualities or features which have scientific significance.

(37) "Shore protection structure" means a type of coastal construction designed to minimize the rate of erosion. Coastal construction includes any work or activity which is likely to have a material physical effect on existing coastal conditions or natural shore processes.

(38) "Sovereignty lands" means those lands including, but not limited to: tidal lands, islands, sandbars, shallow banks, and lands waterward of the ordinary or mean high water line, to which the State of Florida acquired title on March 3, 1845, by virtue of statehood, and of which it has not since divested its title interest. For the purposes of this rule sovereignty lands shall include all submerged lands within the boundaries of the preserve, title to which is held by the board.

(39) "Spoil" means materials dredged from sovereignty lands which are redeposited or discarded by any means, onto either sovereignty lands or uplands.

(40)(25) "Transfer" means the act of the board by which any interest in lands, including easements, other than sale or lease, is conveyed.

(41)(26) "Utility of the preserve" means fitness of the preserve for the present and future enjoyment of its biological, aesthetic and

scientific values, in an essentially natural condition.

Specific Authority 256.43(1) FS. Law Implemented 256.37, 256.43(1) FS. History—New 2-25-81.

(42) "Water dependent activity" means an activity which can only be conducted on, in, over, or adjacent to, water areas because the activity requires direct access to the water body or sovereignty lands for transportation, recreation, energy production or transmission, or source of water and where the use of the water or sovereignty lands is an integral part of the activity.

Specific Authority 256.43(1) FS. Law Implemented 256.37, 256.43(1) FS. History—New 2-25-81, Amended 6-7-83. FORMERLY 166-26

150-000 (8-26-04) Policies, Standards and Criteria. The following management policies, standards and criteria are supplemental to Chapter 256, Florida Administrative Code (Sovereignty Submerged Lands Management) and shall be utilized in determining whether to approve, approve with conditions or modifications or deny all requests for activities on sovereignty lands in aquatic preserves.

(1) GENERAL PROPRIETARY

(a) In determining whether to approve or deny any request the board will evaluate each on a case-by-case basis and weigh any factors relevant under Chapter 256 and/or 258, Florida Statutes. The board, acting as Trustees for all state-owned lands, reserves the right to approve, modify or reject any proposal.

(b) There shall be no further sale, lease or transfer of sovereignty lands except when such sale, lease or transfer is in the public interest (see Section 256.37, Florida Statutes, Public Interest Assessment Criteria).

(c) There shall be no construction of seawalls, bulkheads, dikes, levees, or ordinary high water line, or filling waterward of the mean or ordinary high water line except in the case of public road and bridge projects where no reasonable alternative exists.

(d) There shall, in no case, be any dredging waterward of the mean or ordinary high water line for the sole or primary purpose of providing fill for any area landward of the mean or ordinary high water line.

(e) A lease, easement or consent of use may be authorized only for the following activities:

1. a public navigation project;
2. maintenance of an existing navigational channel;
3. installation or maintenance of approved navigational aids;
4. creation or maintenance of a commercial/industrial dock, pier or a marina;
5. creation or maintenance of private docks for reasonable ingress and egress of riparian owners;
6. minimum dredging for navigation channels adjacent to docking facilities;
7. creation or maintenance of a shore protection structure;

8. installation or maintenance of oil and gas transportation facilities.

9. creation, maintenance, replacement or expansion of facilities required for the provision of public utilities; and.

10. other activities which are a public necessity or which are necessary to enhance the quality or utility of the preserve and which are consistent with the act and this chapter.

(f) For activities listed in paragraphs 18 ~~256-20~~ (1)(c) 1-10, above, the activity shall be designed so that the structure or structures to be built in, on or over sovereignty lands are limited to structures necessary to conduct water dependent activities.

(g) For activities listed in paragraphs 18 ~~256-20~~ (1)(c) 7, 8, 9, and 10, above, it must be demonstrated that no other reasonable alternative exists which would allow the proposed activity to be constructed or undertaken outside the preserve.

(h) The use of state-owned lands for the purpose of providing private or public road access to islands where such access did not previously exist shall be prohibited. The use of state-owned lands for the purpose of providing private or public water supply to islands where such water supply did not previously exist shall be prohibited.

(i) Except for public navigation projects and maintenance dredging for existing channels and basins, any areas created to improve or create navigational access shall be incorporated into the preempted area of any required lease or be subject to the payment of a negotiated private easement fee.

(j) Private Residential multi-slip docking facilities shall require a lease.

(k) Aquaculture and beach renourishment activities which comply with the standards of this rule chapter and Chapter 256, Florida Administrative Code, may be approved by the board, but only subsequent to a formal finding of compatibility with the purposes of Chapter 256, Florida Statutes, and this rule chapter.

(l) Other uses of the preserve, or human activity within the preserve, although not originally contemplated, may be approved by the board, but

only subsequent to a formal finding of compatibility with the purposes of Chapter 256, Florida Statutes, and this rule chapter.

(2) PUBLIC INTEREST ASSESSMENT CRITERIA

In evaluating requests for the sale, lease or transfer of interests, a balancing test will be utilized to determine whether the social, economic and/or environmental benefits clearly exceed the costs.

(a) GENERAL BENEFIT/COST CRITERIA:

1. Any benefits that are balanced against the costs of a particular project shall be related to the affected aquatic preserve;

2. In evaluating the benefits and costs of each request, specific consideration and weight shall be given to the quality and nature of the specific aquatic preserve. Projects in the less developed, more pristine aquatic preserves such as Apalachicola Bay shall be subject to a higher standard than the more developed urban aquatic preserves such as Boca Grande Bay; and.

3. For projects in aquatic preserves with adopted management plans, consistency with the management plan will be weighed heavily when determining whether the project is in the public interest.

(h) **BENEFIT CATEGORIES:**

1. Public access (public boat ramps, boatslips, etc.);
2. providing boating and marina services (repair, pumpout, etc.);
3. improve and enhance public health, safety, welfare, and law enforcement;
4. improved public land management;
5. improve and enhance public navigation;
6. improve and enhance water quality;
7. enhancement/restoration of natural habitat and functions; and,
8. improve/protect endangered/threatened/unique species.

(i) **COSTS:**

1. Reduced/degraded water quality;
2. reduced/degraded natural habitat and function;
3. destruction, harm or harassment of endangered or threatened species and habitat;
4. preemption of public use;
5. increasing navigational hazards and congestion;
6. reduced/degraded aesthetics; and,
7. adverse cumulative impacts.

(j) **EXAMPLES OF SPECIFIC BENEFITS:**

1. Donation of land, conservation easements, restrictive covenants or other title interests in or contiguous to the aquatic preserve which will protect or enhance the aquatic preserve;
2. providing access or facilities for public land management activities;
3. providing public access easements and/or facilities, such as beach access, boat ramps, etc.;
4. restoration/enhancement of altered habitat or natural functions, such as conversion of vertical bulkheads to riprap and/or vegetation for shoreline stabilization or re-establishment of shoreline or submerged vegetation;
5. improve fishery habitat through the establishment of artificial reefs or other such projects, where appropriate;
6. providing sewage pumpout facilities where normally not required, in particular, facilities open to the general public;
7. improvements to water quality such as removal of toxic sediments, increased flushing and circulation, etc.;
8. providing upland dry storage as an alternative to weirs; and,
9. marking navigation channels to avoid disruption of shallow water habitats.

(k) **RESOURCE MANAGEMENT**

(a) All proposed activities in aquatic preserves having management plans adopted by the board must demonstrate that such activities are consistent with the management plan.

(b) No drilling of oil, gas or other such wells shall be allowed.

(c) Utility cables, pipes and other such structures shall be constructed and located in a manner that will cause minimal disturbance to submerged land resources such as oyster bars and submerged grass beds and do not interfere with traditional public uses.

(d) Spoil disposal within the preserve shall be strongly discouraged and may be approved only where the applicant has demonstrated that there is no other reasonable alternative and that activity may be beneficial to, or at a minimum, not harmful to the quality and utility of the preserve.

(l) **RIPARIAN RIGHTS**

(a) None of the provisions of this rule shall be implemented in a manner that would unreasonably infringe upon the traditional, common law and statutory riparian rights of upland riparian property owners adjacent to sovereignty lands.

(b) The evaluation and determination of the reasonable riparian rights of ingress and egress for private, residential multi-slip docks shall be based upon the number of linear feet of riparian shoreline.

(c) For the purposes of this rule, a private, residential, single docking facility which meets all the requirements of Rule ~~20.001~~ (5) shall be deemed to meet the public interest requirements of Rule ~~20.001~~ (1)(b), Florida Administrative Code. However, the applicant for such docking facilities must apply for such consent and must meet all of the requirements and standards of this rule enabling:

(m) **STANDARDS AND CRITERIA FOR DOCKING FACILITIES**

(a) All docking facilities, whether for a single or multi-slip residential or commercial, shall be subject to the following standards and criteria:

1. No dock shall extend waterward of the mean or ordinary high water line more than 500 feet or 20 percent of the width of the waterbody at that particular location whichever is less;

2. certain docks may fall within areas of special or unique importance. These areas may be of significant biological, scientific, historic and/or aesthetic value and require special management considerations. Modifications may be more restrictive than the normally accepted criteria. Such modifications shall be determined on a case-by-case analysis, and may include, but shall not be limited to changes in location, configuration, length, width and height;

3. the number, lengths, drafts and types of vessels allowed to utilize the proposed facility may also be stipulated; and,

4. where local governments have more stringent standards and criteria for docking facilities, the more stringent standards for the protection and enhancement of the aquatic preserve shall prevail.

(b) Private residential single docks shall conform to the following specific design standards and criteria:

1. Any main access dock shall be limited to a maximum width of four (4) feet;

2. the dock decking design and construction will insure maximum light penetration, with full consideration of safety and practicality;

3. the dock will extend out from the shoreline no further than to a maximum depth of minus four (-4) feet (mean low water);

4. when the water depth is minus four (-4) feet (mean low water) at an existing bulkhead the maximum dock length from the bulkhead shall be 25 feet, subject to modifications accommodating shoreline vegetation overhang;

5. wave break devices, when necessary, shall be designed to allow for maximum water circulation and shall be built in such a manner as to be part of the dock structure;

6. terminal platform size shall be no more than 160 square feet; and,

7. dredging to obtain navigable water depths in conjunction with private residential, single dock applications is strongly discouraged.

(c) Private residential multi-slip docks shall conform to the following specific design standards and criteria:

1. The area of sovereignty, submerged land preempted by the docking facility shall not exceed the square footage amounting to ten times the riparian waterfront footage of the affected waterbody of the applicant, or the square footage attendant to providing a single dock in accordance with the criteria for private residential single docks, whichever is greater. A conservation easement or other such use restriction acceptable to the Board must be placed on the riparian shoreline, used for the calculation of the 10:1 threshold, to conserve and protect shoreline resources and subordinate/waive any further riparian rights of ingress and egress for additional docking facilities.

2. Docking facilities and access channels shall be prohibited in Resource Protection Area 1 or 2, except as allowed pursuant to Section 256.42(3)(c)1., Florida Statutes, while dredging in Resource Protection Area 3 shall be strongly discouraged;

3. Docking facilities shall only be approved in locations having adequate existing water depths in the boat mooring, turning basin, access channels, and other such areas which will accommodate the proposed boat use in order to insure that a minimum of one foot clearance is provided between the deepest draft of a vessel and the bottom at mean low water;

4. Main access docks and connecting or cross walks shall not exceed six (6) feet in width;

5. Terminal platforms shall not exceed eight (8) feet in width;

6. Finger piers shall not exceed three (3) feet in width, and 25 feet in length;

7. Pilings may be utilized as required to provide adequate mooring capabilities; and,

18 ~~18~~ the following provisions of Rule ~~18~~ ~~20.05~~(5)(d) shall also apply to private residential multi-slip docks.

(d) Commercial, industrial and other revenue generating/income related docking facilities shall conform to the following specific design standards and criteria:

1. Docking facilities shall only be located in or near areas with good circulation, flushing and adequate water depths;

2. Docking facilities and access channels shall be prohibited in Resource Protection Area 1 or 2, except as allowed pursuant to Sections 256.42(3)(c)1., Florida Statutes; while dredging in Resource Protection Area 3 shall be strongly discouraged;

3. The docking facilities shall not be located in Resource Protection Area 1 or 2; however, main access docks may be allowed to pass through Resource Protection Area 1 or 2, that are located along the shoreline, to reach an acceptable Resource Protection Area 3, provided that such crossing will generate minimal environmental impact;

4. Beginning July 1, 1986 new docking facilities may obtain a lease only where the local governments have an adopted marina plan and/or policies dealing with the siting of commercial/industrial and private, residential, multi-slip docking facilities in their local government comprehensive plan;

5. The siting of the docking facilities shall also take into account the access of the boat traffic to avoid marine grassbeds or other aquatic resources in the surrounding areas;

6. The siting of new facilities within the preserve shall be secondary to the expansions of existing facilities within the preserve when such expansion is consistent with the other standards;

7. The location of new facilities and expansion of existing facilities shall consider the use of upland dry storage as an alternative to multiple wet-slip docking;

8. Marina siting will be coordinated with local governments to insure consistency with all local plans and ordinances;

9. Marinas shall not be sited within state designated marine sanctuaries; and,

10. In any areas with known manatee concentrations, manatee warning/notice and/or speed limit signs shall be erected at the marina and/or ingress and egress channels, according to Florida Marine Patrol specifications.

(e) Exceptions to the standards and criteria listed in Rule ~~18~~ ~~20.05~~(5), Florida Administrative Code, may be considered, but only upon demonstration by the applicant that such exceptions are necessary to insure reasonable riparian ingress and egress.

(6) MANAGEMENT AGREEMENTS

The board may enter into management agreements with local agencies for the administration and enforcement of standards and criteria for private residential single docks.

Specific Authority: 253.03, 256.43(1) FS. Law Implemented: 253.03, 256.41, 256.42, 256.43(1), 256.44 FS. History: New 2-23-81, Amended 6-7-85.

Editorial Note: The 6-7-85 amendment entirely supersedes the former rule.

~~18-20.05~~ ~~18-20.05~~ Use, Sale, Lease, or Transfer of Interest in Lands, or Materials, Held by the Board.

Specific Authority: 256.43(1) FS. Law Implemented: 253.03, 253.12, 256.42 FS. History: New 2-23-81, Repealed 6-7-85.

~~18-20.06~~ ~~18-20.06~~ Cumulative Impacts in

evaluating applications for activities within the preserves or which may impact the preserves, the department recognizes that, while a particular alteration of the preserve may constitute a minor change, the cumulative effect of numerous such changes often results in major impairments to the resources of the preserve. Therefore, the department shall evaluate a particular site for which the activity is proposed with the recognition that the activity may, in conjunction with other activities adversely affect the preserve which is part of a complete and interrelated system. The impact of a proposed activity shall be considered in light of its cumulative impact on the preserve's natural system. The department shall include as a part of its evaluation of an activity:

(1) The number and extent of similar human actions within the preserve which have previously affected or are likely to affect the preserve, whether considered by the

department under its current authority or which existed prior to or since the enactment of the Act; and

(2) The similar activities within the preserve which are currently under consideration by the department; and

(3) Direct and indirect effects upon the preserve and adjacent preserves, if applicable, which may reasonably be expected to result from the activity; and

(4) The extent to which the activity is consistent with management plans for the preserve, when developed; and

(5) The extent to which the activity is permissible within the preserve in accordance with comprehensive plans adopted by affected local governments, pursuant to section 163.3161, F.S., and other applicable plans adopted by local, state, and federal governmental agencies;

(6) The extent to which the loss of beneficial hydrologic and biologic functions would adversely impact the quality or utility of the preserve; and

(7) The extent to which mitigation measures may compensate for adverse impacts. *Specific Authority 258.43(1) FS. Law Implemented 258.36, 258.43, 258.44 FS. History—New 2-25-81.*

~~18-20-009~~ ¹⁸⁻²⁰⁻⁰⁰⁹ ~~16Q-2000~~ ^{16Q-2000} Protection of Riparian Rights. *Specific Authority 258.43(1) FS. Law Implemented 258.123, 258.124(B), 258.44 FS. History—New 2-25-81, Repealed 8-7-85.*

~~18-20-008~~ ¹⁸⁻²⁰⁻⁰⁰⁸ ~~16Q-2000~~ ^{16Q-2000} Inclusion of Lands, Title to Which is Not Vested in the Board, in a Preserve.

(1) Lands and water bottoms which are within designated aquatic preserve boundaries, or adjacent thereto and which are owned by other governmental agencies, may be included in an aquatic preserve upon specific authorization for inclusion by an appropriate instrument in writing executed by the agency.

(2) Lands and water bottoms which are within designated aquatic preserve boundaries or adjacent thereto, and which are in private ownership, may be included in an aquatic preserve upon specific authorization for inclusion by an appropriate instrument in writing executed by the owner.

(3) The appropriate instrument shall be either a dedication in perpetuity, or a lease. Such lease shall contain the following conditions:

(a) The term of the lease shall be for a minimum period of ten years.

(b) The board shall have the power and duty to enforce the provisions of each lease agreement, and shall additionally have the power to terminate any lease if the termination is in the best interest of the aquatic preserve system, and shall have the power to include such lands in any agreement for management of such lands.

(c) The board shall pay no more than \$1 per year for any such lease. *Specific Authority 258.43(1) FS. Law Implemented 258.40, 258.41 FS. History—New 2-25-81.*

18-20-009
~~16Q-2000~~ ^{16Q-2000} Establishment or Expansion of Aquatic Preserves.

(1) The board may expand existing preserves or establish additional areas to be included in the aquatic preserve system, subject to confirmation by the legislature.

(2) The board may, after public notice and public hearing in the county or counties in which the proposed expanded or new preserve is to be located, adopt a resolution formally setting aside such areas to be included in the system.

(3) The resolution setting aside an aquatic preserve area shall include:

(a) A legal description of the area to be included. A map depicting the legal description shall also be attached.

(b) The designation of the type of aquatic preserve.

(c) A general statement of what is sought to be preserved.

(d) A statement that the area established as a preserve shall be subject to the management criteria and directives of this chapter.

(e) A directive to develop a natural resource inventory and a management plan for the area being established as an aquatic preserve.

(4) Within 30 days of the designation and establishment of an aquatic preserve, the board shall record in the public records of the county or counties in which the preserve is located a legal description of the preserve.

Specific Authority 258.43(1) FS. Law Implemented 258.41 FS. History—New 2-25-81.

~~18-20-010~~ ¹⁸⁻²⁰⁻⁰¹⁰ ~~16Q-2000~~ ^{16Q-2000} Exchange of Lands. The board in its discretion may exchange lands for the benefit of the preserve, provided that:

(1) In no case shall an exchange result in any land or water area being withdrawn from the preserve; and

(2) Exchanges shall be in the public interest and shall maintain or enhance the quality or utility of the preserve.

Specific Authority 258.43(1) FS. Law Implemented 258.41(5), 258.42(1) FS. History—New 2-25-81.

~~18-20-011~~ ¹⁸⁻²⁰⁻⁰¹¹ ~~16Q-2000~~ ^{16Q-2000} Gifts of Lands. The board in its discretion may accept any gifts of lands or interests in lands within or contiguous to the preserve to maintain or enhance the quality and utility of the preserve.

Specific Authority 258.43(1) FS. Law Implemented 258.42(5) FS. History—New 2-25-81.

18-20.012

~~16C-20.12~~ Protection of Indigenous Life Forms. The taking of indigenous life forms for sale or commercial use is prohibited, except that this prohibition shall not extend to the commercial taking of fin fish, crustacea or mollusks, except as prohibited under applicable laws, rules or regulations. Members of the public may exercise their rights to fish, so long as not contrary to other statutory and regulatory provisions controlling such activities.

Specific Authority 258.43(1) FS. Law Implemented 258.43(1) FS. History—New 2-25-81.

~~16C-20.13~~ Development of Resource Inventories and Management Plans for Preserves.

(1) The board authorizes and directs the division to develop a resource inventory and management plan for each preserve.

(2) The division may perform the work to develop the inventories and plans, or may enter into agreements with other persons to perform the work. In either case, all work performed shall be subject to board approval.

Specific Authority 258.43(1) FS. Law Implemented 258.03(7), 258.03(8) FS. History—New 2-25-81. Amended 6-7-85.

Editorial Note: The 6-7-85 amendment entirely superseded the former rule.

~~16C-20.14~~ Enforcement. The rules shall be enforced as provided in Section 258.46.

Specific Authority 258.43(1) FS. Law Implemented 258.46 FS. History—New 2-25-81.

~~16C-20.15~~ Application Form.

Specific Authority 258.43(1) FS. Law Implemented 258.43 FS. History—New 2-25-81, Repealed 6-7-85.

~~16C-20.16~~ Coordination with Other Governmental Agencies. Where a Department of Environmental Regulation permit is required for activities on sovereignty lands the department will coordinate with the Department of Environmental Regulation to obtain a copy of the joint Department of Army/Florida Department of Environmental Regulation permit application and the biological survey. The information contained in the joint permit application and biological assessment shall be considered by the department in preparing its staff recommendations to the board. The board may also consider the reports of other governmental agencies that have related management or permitting responsibilities regarding the proposed activity.

Specific Authority 258.43(1) FS. Law Implemented 258.43 FS. History—New 2-25-81.

18-20.017

~~16C-20.17~~ Lake Jackson Aquatic Preserve. In addition to the provisions of Rules ~~18-20.02~~ through ~~18-20.16~~, the following requirements shall also apply to all proposed activities within the Lake Jackson Aquatic Preserve. If any provisions of this Rule are in conflict with any provisions of Rules ~~18-20.17~~ through ~~18-20.19~~ or Chapter 73-534, Laws of Florida, the stronger provision for the protection or enhancement of the aquatic preserve shall prevail.

(1) No further sale, transfer or lease of sovereignty lands in the preserve shall be approved or consummated by the board, except upon a showing of extreme hardship on the part of the applicant or when the board shall determine such sale, transfer or lease to be in the public interest.

(2) No further dredging or filling of sovereignty lands of the preserve shall be approved or initiated by the Board of Trustees except:

(a) Such minimum dredging and spoiling as may be authorized for public navigation projects or for preservation of the lake according to the expressed intent of Chapter 73-534, Laws of Florida; and,

(b) Such other alteration of physical conditions as may be necessary to enhance the quality or utility of the preserve.

(3) There shall be no drilling of wells, excavation for sand or minerals, and no erection of structures (other than docks), within the preserve, unless such activity is associated with activity authorized by Chapter 73-534, Laws of Florida.

(4) The board shall not approve the relocations of bulkhead lines within the preserve.

(5) Notwithstanding other provisions of this act, the board may, respecting lands lying within the Lake Jackson basin:

(a) Enter into agreements for and establish lines delineating sovereignty and privately owned lands;

(b) Enter into agreements for the exchange and exchange sovereignty lands for privately owned lands;

(c) Accept gifts of land within or contiguous to the preserve.

Specific Authority 258.39(26) FS. Law Implemented 258.39(26), 258.43 FS. History—New 6-7-85.

Appendix C.

Dept. of Natural Resources
Personnel Office

NOV 12 1985

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BUREAU OF ENVIRONMENTAL
LAND MANAGEMENT

RECEIVED

16Q-21.01	Intent.
16Q-21.02	Scope and Effective Date.
16Q-21.03	Definitions.
16Q-21.04	Management Policies, Standards, and Criteria.
16Q-21.05	Procedures.
16Q-21.06	Applications — General Information.
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16Q-21.12	Spoil Islands.
16Q-21.13	Applications to Purchase Lands Riparian to Uplands.
16Q-21.14	Disclaimers to Confirm Title to Filled Formerly Sovereignty Lands.
16Q-21.15	Quitclaims to Clear Title to Filled Formerly Sovereignty Lands.
16Q-21.16	Applications to Reclaim Lands Lost Due to Avulsion or Artificial Erosion.

Library References: Lakes: Distinguishing Them from Wet Prairies. James R. Brindell, 57 Fla. Bar J. 724 (December, 1983).

16Q-21.01 Intent. The intent and purpose of this rule is:

- (1) To aid in fulfilling the trust and fiduciary responsibilities of the Board of Trustees of the Internal Improvement Trust Fund for the administration, management and disposition of sovereignty lands;
- (2) To insure maximum benefit and use of sovereignty lands for all the citizens of Florida;
- (3) To manage, protect, and enhance sovereignty lands so that the public may continue to enjoy traditional uses including, but not limited to, navigation, fishing and swimming;
- (4) To manage and provide maximum protection for all sovereignty lands, especially those

harvesting, public recreation, and fish and wildlife propagation and management;

(5) To insure that all public and private activities on sovereignty lands which generate revenues or exclude traditional public uses provide just compensation for such privileges; and,

(6) To aid in the implementation of the State Lands Management Plan.

Specific Authority 253.03(7) FS, Art. X, Sec. 11, Fla. Const. Law Implemented 253.03, 253.12 FS. History—New 3-27-82.

16Q-21.02 Scope and Effective Date.

(1) These rules are to implement the administrative and management responsibilities of the board and department regarding sovereignty lands. Responsibility for environmental permitting of activities and water quality protection on sovereignty and other lands is vested with the Department of Environmental Regulation. These rules are considered cumulative; therefore, a person planning an activity should consult other applicable department rules (Chapter 16Q-20, Florida Administrative Code and others) as well as the rules of the Department of Environmental Regulation.

(2) These rules are prospective in their application and shall not apply to activities for which applications have been submitted to the department or the Department of Environmental Regulation prior to the adoption date of these rules and shall not affect previous actions of the board concerning private docks or the issuance of any easement, lease, or any disclaimer concerning sovereignty lands. Fee arrangements in existing leases are not subject to the fees of this rule until expiration of said leases unless otherwise specified in the lease instrument.

(3) Docks, piers, and other such structures on sovereignty lands in existence prior to March 10, 1970 shall be subject to the provisions of this rule commencing on January 1, 1998. Any expansions to such structures shall be subject to the provisions of this rule, if any expansion thereto requires the use of any Additional sovereignty lands.

(4) Docks, piers, and other such structures on sovereignty lands in existence prior to March 10, 1970 and which would require a lease pursuant to Section 16Q-21.05(1)(b), Florida Administrative Code, shall be required to register the structures with the department before June 30, 1984.

(5) Any expansion of an existing activity shall be subject to the provisions of this rule.

Specific Authority 253.03(7) FS. Law Implemented 253.03, 253.12, 253.77 FS. History—New 3-27-82, Amended 8-1-83.

16Q-21.03 Definitions. When used in these rules, the following shall have the indicated meaning unless the context clearly indicates otherwise:

(1) "Accretion" means the process of gradual and imperceptible additions of sand, sediment, or other material to riparian lands made by the natural action of water which results in dry lands formerly covered by water.

(2) "Activity" means any use of sovereignty lands which requires board approval for consent of use, lease, easement, sale, or transfer of interest in such sovereignty lands or materials. Activity includes, but is not limited to, the construction of docks, piers, boat ramps, board walks, mooring

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pilings, dredging of channels, filling, removal of logs, sand, silt, clay, gravel or shell, and the removal or planting of vegetation on sovereignty lands.

(3) "Applicant" means any person making application for a lease, sale, or other form of conveyance of an interest in sovereignty lands or any other necessary form of governmental approval for an activity on sovereignty lands.

(4) "Artificial accretion" means the addition of sand, sediment, or other material to riparian lands caused by man-made projects and operations which results in dry lands formerly covered by water.

(5) "Artificial erosion" means the loss or washing away of sand, sediment, or other material from riparian property caused by man-made projects and operations which result in submerged lands formerly not covered by water.

(6) "Avulsion" means the addition to or loss of riparian property caused by the sudden and perceptible natural action of water.

(7) "Aquaculture" means the cultivation of animal or plant life in an aquatic environment.

(8) "Board" means the Governor and Cabinet sitting as the Board of Trustees of the Internal Improvement Trust Fund.

(9) "Channel" means a trench, the bottom of which is normally covered entirely by water, with the upper edges of its sides normally below water.

(10) "Coastal barrier islands" means a depositional geologic feature consisting of unconsolidated sedimentary materials in an island configuration which is subject to direct attack by wave, tidal, and wind energies originating from the Atlantic Ocean or Gulf of Mexico, and which serves to protect landward aquatic habitats, such as bays and estuaries, and the interior uplands of the mainland from oceanic wave, tidal, and wind forces.

(11) "Consent of use" means a nonpossessory interest in sovereignty lands created by an approval which allows the applicant the right to erect specific structures or conduct specific activities on said lands.

(12) "Department" means the State of Florida Department of Natural Resources, as administrator for the board.

(13) "Division" means the Division of State Lands which performs all staff duties and functions related to the administration of lands, title to which is or will be vested in the board pursuant to Section 253.002, Florida Statutes.

(14) "Dock" means a fixed or floating structure, including moorings, used for the purpose of berthing buoyant vessels.

(15) "Easement" means a non-possessory interest in sovereignty lands created by a grant or agreement which confers upon the applicant the limited right, liberty, and privilege to use said lands for a specific purpose and for a specific time.

(16) "Energy production" means the exploration for, and extraction of, hydrocarbons, including necessary transmission through pipelines, or the water-oriented activities related to the generation of electricity.

(17) "Fill" means materials from any source, deposited by any means onto sovereignty lands, either for the purpose of creating new uplands or for any other purpose, including spoiling of dredged materials.

(18) "First come, first served" means any water dependent facility operated on the sovereign lands of the state the services of which are open to

the general public on a first come, first served basis. This is intended to cover services offered to various types, classes or groups of public users and such services need not be comprehensive. The service offered may be a specialty service such as boat repair, seafood purchasing, marine slip rentals or shipping terminals as long as all services offered are open to the general class of users without any qualifying requirements such as club membership or stock ownership.

(19) "Lease" means an interest in sovereignty lands designated by a contract creating a landlord-tenant relationship between the board as landlord and the applicant as tenant whereby the board grants and transfers to the applicant the exclusive use, possession, and control of certain specified sovereignty lands for a determinate number of years, with conditions attached, at a definite fixed rental.

(20) "Management agreement" means a contractual agreement between the board and one or more parties which does not create an interest in real property but merely authorizes conduct of certain management activities on lands held by the board.

(21) "Marginal dock" means a fixed or floating structure placed immediately contiguous and parallel to an established seawall, bulkhead or revetment.

(22) "Mean high water" means the average height of the high tides over a 19-year period. For shorter periods of observation, "mean high water" means the average height of the high waters after corrections are applied to eliminate known variations and to reduce the result to the equivalent of a mean 19-year value.

(23) "Mean high water line" means the intersection of the local elevation of mean high water with the shore. Mean high water line along the shore of land immediately bordering on navigable waters is recognized and declared to be the boundary between the foreshore owned by the State of Florida in its sovereign capacity and the uplands subject to private ownership. However, no provision of this rule shall be deemed to impair the title to privately owned submerged lands validly alienated by the State of Florida or its legal predecessors.

(24) "Nomination" means a proposal for an oil and gas lease.

(25) "Person" means individuals, minors, partnerships, corporations, joint ventures, estates, trusts, syndicates, fiduciaries, firms, and all other associations and combinations, whether public or private, including governmental entities.

(26) "Preempted area" means the area of sovereignty lands from which the traditional public uses have been or would be excluded to any extent by an activity. The area may include, but is not limited to, the sovereignty lands occupied by the docks and other structures, the area between the docks and out to any mooring pilings, and the area between the docks and the shoreline. If the activity is required to be moved waterward to avoid dredging or disturbance of nearshore habitat, a reasonable portion of the nearshore area that is not impacted by dredging or structures shall not be included in the preempted area.

(27) "Public interest" means demonstrable environmental, social, and economic benefits which would accrue to the public at large as a result of a proposed action, and which would clearly exceed all

costs of the proposed action. In determining the public interest in a request for use, sale, lease, or transfer of interest in sovereignty lands or severance of materials from sovereignty lands, the board shall consider the ultimate project and purpose to be served by said use, sale, lease, or transfer of lands or materials.

(28) "Public navigation project" means an activity primarily for the purpose of navigation which is authorized and funded by the United States Congress or by port authorities as defined by Section 315.02(2), Florida Statutes.

(29) "Public utilities" means those services, provided by persons regulated by the Public Service Commission, or which are provided by rural cooperatives, municipalities, or other governmental agencies, including electricity, public water and wastewater services, and structures necessary for the provision of these services and transmission lines for public communication systems such as telephone, radio and television.

(30) "Public water management project" means an activity primarily for the purpose of flood control, conservation, recreation, water storage and supply, and allied purposes, which is authorized and funded by the United States Congress, the State of Florida, or a water management district as defined by Section 373.069, Florida Statutes.

(31) "Revenue generating/income related activity" means an activity on sovereignty lands which produces income, through rental or any other means, or which serves as an accessory facility to other rental, commercial, or industrial operations. It shall include, but not be limited to, docking for marinas, restaurants, hotels, motels, commercial fishing, shipping, and boat or ship construction, repair and sales.

(32) "Reclamation of lands" means restoring the upland shoreline to a condition that existed prior to avulsion or artificial erosion.

(33) "Riparian rights" means those rights incident to lands bordering upon navigable waters, as recognized by the courts and common law.

(34) "Sale" means a conveyance or transfer of title of sovereignty lands in fee simple by the board, for consideration.

(35) "Satisfactory evidence of title" means a current title insurance policy issued by a title insurance company authorized to do business in the State of Florida, or an opinion of title prepared by a member of the Florida Bar, covering title to lands involved and indicating, at least, such minimum interest in the applicant which may entitle the applicant to the relief sought, or such affidavits as may be required by the department to establish the currency of title status of an applicant.

(36) "Sovereignty lands" means those lands including but not limited to, tidal lands, islands, sand bars, shallow banks, and lands waterward of the ordinary or mean high water line, under navigable fresh and salt waters, to which the State of Florida acquired title on March 3, 1845, by virtue of statehood, and which have not been heretofore conveyed or alienated.

(37) "Spoil island" means any artificially created island having an elevation above water upon formerly submerged sovereignty lands, title to which is vested in the board.

(38) "Water dependent activity" means an activity which can only be conducted on, in, over, or

direct access to the water body or sovereignty lands for transportation, recreation, energy production or transmission, or source of water, and where the use of the water or sovereignty lands is an integral part of the activity.

Specific Authority 253.03(7) FS. Law Implemented 253.03 FS. History—New 9-26-77, Formerly 16C-12.01, 16Q-17.01, Amended 3-27-82, 8-1-83.

16Q-21.04 Management Policies, Standards, and Criteria. The following management policies, standards, and criteria shall be utilized in determining whether to approve, approve with conditions or modifications, or deny all requests for activities on sovereignty lands.

(1) General Proprietary

(a) For approval, all activities on sovereignty lands must be not contrary to the public interest, except for sales which must be in the public interest.

(b) All leases, easements, deeds or other forms of approval for sovereignty land activities shall contain such terms, conditions, or restrictions as deemed necessary to protect and manage sovereignty lands.

(c) Equitable compensation shall be required for leases and easements which generate revenues, monies or profits for the user or that limit or preempt general public use. Public utilities and state or other governmental agencies exempted by law shall be excepted from this requirement.

(d) Activities on sovereignty lands shall be limited to water dependent activities only unless the board determines that it is in the public interest to allow an exception as determined by a case by case evaluation. Public projects which are primarily intended to provide access to and use of the waterfront may be permitted to contain minor uses which are not water dependent if:

1. located in areas along seawalls or other nonnatural shorelines;

2. located outside of aquatic preserves or class II waters; and,

3. the nonwater dependent uses are incidental to the basic purpose of the project, and constitute only minor nearshore encroachments on sovereign lands.

(e) Silt house, boathouses with living quarters, or other such residential structures shall be prohibited on sovereignty lands.

(f) The State Lands Management Plan shall be considered and utilized in developing recommendations for all activities on sovereignty lands.

(g) The use of sovereignty lands for the purpose of providing road access to islands, where such access did not previously exist, shall be prohibited. The board may grant an exception to this prohibition if the board makes a finding that:

1. Construction and use of road access is the least damaging alternative and more protective of natural resources and sovereignty lands than other access activities; and,

2. In the case of coastal barrier islands, such use of sovereignty lands and any upland development facilitated thereby is in the public interest, or in the case of other islands, not contrary to the public interest.

(h) When one or more expansions to existing grandfathered lease facilities equal 50 percent or more of the grandfathered facility then the grandfathered facility will be required to come under lease.

(i) All existing licenses shall be converted to

license.

(2) Resource Management

(a) All sovereignty lands shall be considered single use lands and shall be managed primarily for the maintenance of essentially natural conditions, propagation of fish and wildlife, and traditional recreational uses such as fishing, boating, and swimming. Compatible secondary purposes and uses which will not detract from or interfere with the primary purpose may be allowed.

(b) Activities which would result in significant adverse impacts to sovereignty lands and associated resources shall not be approved unless there is no reasonable alternative and adequate mitigation is proposed.

(c) The Department of Environmental Regulation biological assessments and reports by other agencies with related statutory, management, or regulatory authority may be considered in evaluating specific requests to use sovereignty lands. Any such reports sent to the department in a timely manner shall be considered.

(d) Activities shall be designed to minimize or eliminate any cutting, removal, or destruction of wetland vegetation (as listed in Rule 17-4.02(17), Florida Administrative Code) on sovereignty lands.

(e) Reclamation activities on sovereignty lands shall be approved only if avulsion or artificial erosion is affirmatively demonstrated. Other activities involving the placement of fill material below the ordinary high water line or mean high water line shall not be approved unless it is necessary to provide shoreline stabilization, access to navigable water, or for public water management projects.

(f) To the maximum extent possible, shoreline stabilization should be accomplished by the establishment of appropriate native wetland vegetation. Rip-rap materials, pervious interlocking brick systems, filter mats, and other similar stabilization methods should be utilized in lieu of vertical seawalls wherever feasible.

(g) Severance of materials from sovereignty lands shall be approved only if the proposed dredging is the minimum amount necessary to accomplish the stated purpose and is designed to minimize the need for maintenance dredging.

(h) Severance of materials for the primary purpose of providing upland fill shall not be approved unless no other reasonable source of materials is available or the activity is determined to be in the public interest.

(i) Activities on sovereignty lands shall be designed to minimize or eliminate adverse impacts on fish and wildlife habitat. Special attention and consideration shall be given to endangered and threatened species habitat.

(j) To the maximum extent feasible, all beach compatible dredge materials shall be placed on beaches or within the nearshore sand system.

(k) Oil and gas drilling leases on state-owned submerged lands shall be approved only when the proposed lease area is at least one mile seaward of the outer coastline of Florida as defined in *United States v. Florida*, 425 U. S. 791, 48 L. Ed. 2d 388, 96 S. Ct. 1840, upon adequate demonstration that the proposed activity is in the public interest, that the impact upon aquatic resources has been thoroughly considered, and that every effort has been made to minimize potential adverse impacts

national security. Drilling leases may be issued in the prohibited area if said lease stipulates that any drilling shall be conducted from outside said area.

(3) Riparian Rights

(a) None of the provisions of this rule shall be implemented in a manner that would unreasonably infringe upon the traditional, common law riparian rights of upland property owners adjacent to sovereignty lands.

(b) Applications for activities on sovereignty lands riparian to uplands can only be made by and approved for the upland riparian owner, their legally authorized agent, or persons with sufficient title interest in uplands for the intended purpose.

(c) All structures and other activities must be within the riparian rights area of the applicant and must be designed in a manner that will not restrict or otherwise infringe upon the riparian rights of adjacent upland riparian owners.

(d) All structures and other activities must be set back a minimum of 25 feet from the applicant's riparian rights line. Marginal docks may be set back only 10 feet. There shall be no exceptions to the setbacks unless the applicant's shoreline frontage is less than 65 feet or a sworn affidavit of no objection is obtained from the affected adjacent upland riparian owner, or the proposed structure is a subaqueous utility line.

Specific Authority 253.03(7) FS, Law Implemented 253.03, 253.12, 253.14, 253.47, 253.67, .75 FS, History—New 3-27-82, Amended 8-1-83.

16Q-21.05 Procedures.

(1) All activities on sovereignty lands shall require a lease, easement, consent of use, or other form of approval. The following shall be used to determine the form of approval required:

(a) Consent of Use — is required for the following activities, provided that any such activity not located in an Aquatic Preserve or Managee Sanctuary and which is exempt from Department of Environmental Regulation permitting requirements under Section 403.813(2)(a), (b), (c), (d), (e), (g), (h), (i), and (k), Florida Statutes, is hereby exempted from any requirement to make application for consent of use, and such consent is herein granted by the board:

1. A single dock or access channel which is no more than the minimum length and size necessary to provide reasonable access to navigable water;

2. Docks, access channels, boat ramps, or other activities which preempt no more than 1,000 square feet of sovereignty land area for each 100 linear feet of shoreline in the applicant's ownership (see "preempted area" definition Rule 16Q-21.03(25), Florida Administrative Code). Proportional increases in the 1,000 square foot threshold can be added for fractional shoreline increments over 100 linear feet;

3. Marginal docks and mooring pilings along an existing seawall, bulkhead or revetment;

4. Replacement or construction of bulkheads or seawalls at or within three feet waterward of the line of mean high water;

5. Placement of riprap at or within ten feet waterward of the line of mean high water;

6. Dredging or other removal of sovereignty materials;

7. Renourishment of publicly owned beaches; and

8. Artificial reefs for public use.

1. Docks, boat ramps, or other such activities which are larger than those which can be approved under consent of use (Section 16Q-21.05(1)(a), Florida Administrative Code);

2. All revenue generating/income related activities;

3. Grandfather structures upon sale, reassignment or other form of conveyance or transfer;

4. Existing licenses upon the date of expiration or renewal.

5. Aquaculture;

6. Oil and gas exploration and development; and

7. Dead shell and other mining.

(c) Easement — is required for:

1. Utility crossings and rights of way;

2. Road and bridge crossings and rights of way;

3. Groins, breakwaters, and other such shoreline protection structures;

4. Public navigation project channels;

5. Spoil disposal sites;

6. Spoil disposal sites;

7. Borrow areas for beach renourishment; and

8. Canals, channels, and other public water management structures.

(d) Management Agreement — is required for:

1. Management and protection activities which do not require title interest in state lands. Such activities may include, but are not limited to, endangered species, rookery, preserve, or sanctuary protection, and management of educational, recreational, or scientific study areas.

(e) Grandfather structure registration — is required for:

1. Docks, piers and other such structures on sovereignty lands in existence prior to March 10, 1970 which do not now have a lease but would require a lease pursuant to Section 16Q-21.05(1)(b), Florida Administrative Code.

2. Docks, piers and other such structures which were approved by the Board or department between March 10, 1970 and March 27, 1982 which would now require a lease pursuant to Section 16Q-21.05(1)(b), Florida Administrative Code.

(2) All requests for purchases, disclaimers, and quitclaims of sovereignty lands shall be processed in accordance with Rules 16Q-21.13, 16Q-21.14, and 16Q-21.15, Florida Administrative Code, respectively.

(3) All requests for sales, exchanges, leases, and private bridge or road easements on sovereignty lands shall be processed in accordance with the notice and hearing requirements of Section 253.115, Florida Statutes.

Specific Authority 253.03(7) FS. Law Implemented 253.03, 177.27 FS. History—New 9-26-77, Formerly 16C-12.01, 16Q-17.01, Amended 3-27-82, 8-1-83.

16Q-21.06 Applications — General Information.

(1) Most activities on sovereignty lands will also require a permit from the Department of Environmental Regulation. Much of the information required for applications under this rule has been intentionally designed to be identical to information required for the Department of Environmental Regulation permit applications. Therefore, if a Department of Environmental Regulation permit is also required, a copy of the application on file with the Department of Environmental Regulation will satisfy many of the

Specific Authority 253.03(7) FS. Law Implemented 253.03 FS. History—New 3-27-82.

16Q-21.07 Applications for Consent of Use.

(1) Applications for consent of use shall include the following:

(a) Name, address and telephone number of applicant and applicant's authorized agent, if applicable;

(b) Location of the proposed activity including: county; section, township and range; affected waterbody; and a vicinity map, preferably a reproduction of the appropriate portion of United States Geological Survey quadrangle map;

(c) Satisfactory evidence of title in subject riparian upland property or demonstration of sufficient title interest in uplands for the intended purpose;

(d) A detailed statement of the proposed activity;

(e) Multiple boat slip facilities may require an affidavit certifying that the facility will not be a revenue generating/income producing facility;

(f) Two copies of a dimensioned site plan drawing(s) with the following requirements:

1. utilizing an appropriate scale on 8 1/2" X 11" size paper;

2. showing the approximate water's edge;

3. showing the location of the shoreline vegetation, if existing;

4. showing the location of the proposed structures and any existing structures;

5. showing the applicant's upland parcel property lines; and,

6. showing the primary navigation channels or direction to the center of the affected waterbody.

(g) If dredging is proposed, an estimate of the number of cubic yards of sovereignty materials to be removed showing how the amount was calculated.

Specific Authority 253.03(7) FS. Law Implemented 253.03, 253.12, 253.77 FS. History—New 3-27-82.

16Q-21.08 Applications for Lease.

Applications for leases are divided into four categories. All leases, except aquaculture, oil and gas, and dead shell mining, are handled under the standard lease provisions.

(1) Standard Lease

(a) Applications for standard leases shall include the following:

1. Name, address and telephone number of applicant and applicant's authorized agent, if applicable.

2. Location of the proposed activity including: county; section, township and range; affected waterbody; and a vicinity map, preferably a reproduction of the appropriate portion of United States Geological Survey quadrangle map.

3. Satisfactory evidence of title in applicant's riparian upland property.

4. Two prints of a survey prepared, signed, and sealed by a person properly licensed by the Florida State Board of Land Surveyors with the following requirements:

i. utilizing an appropriate scale on 8 1/2" X 11" size paper (unless a larger size is necessary to provide sufficient clarity and detail);

ii. showing the line of ordinary or mean high water;

iii. showing the location of the shoreline vegetation, if existing;

iv. showing the location of the proposed

structures and any existing structures;

v. showing the applicant's upland parcel property lines;

vi. showing the primary navigation channels or direction to the center of the affected waterbody; and,

vii. including a legal description of preempted area to be leased (see definition, Rule 16Q-21.03(25), Florida Administrative Code).

5. A list of names and addresses of all property owners within a 1,000 foot radius of the proposed lease area, verified by the County Property Appraiser's Office, that these names came from the latest tax assessment rolls. The names and addresses shall be clearly typed and acceptable to the department, preferably on labels suitable for mailing.

6. Current local zoning and status of any local government approvals necessary for activities.

7. Florida Department of Revenue registration number. Leases without sales tax exemption certificate shall be subject to the Florida State sales tax.

8. A \$200.00 non-refundable processing fee.

9. Computation of lease fee including the total square footage of preempted sovereignty land to be leased (see Rule 16Q-21.11(1) and definition, Rule 16Q-21.03(25), Florida Administrative Code).

10. If dredging is proposed, an estimate of the number of cubic yards of sovereignty materials to be removed showing how the amount was calculated.

(b) Terms and conditions shall include but not be limited to the following:

1. Initial payment of annual lease fee shall be made within 90 days of lease approval by the Board. A validated lease will be transmitted to the applicant upon receipt of initial payment and acknowledgment of issuance of the Department of Environmental Regulation permit, where applicable.

2. Leases shall be for a term of up to 25 years and renewable at the option of the board. Leases shall include provisions for lease fee adjustments and payments annually.

3. All leases shall be assignable, in whole or in part, upon the approval of the board. Non-compliance with any term of an executed lease may be grounds for cancellation of the lease.

4. Upon expiration or cancellation of a lease, the lessee shall remove all structures and equipment from the leased area within 180 days after such expiration or cancellation, at the option of the board. If the lessee fails to remove the structures and equipment thereon, the board shall at its option and after 10 days from receipt of written notice by certified mail to the lessee, have the structures and equipment removed at the expense of the lessee.

(2) Aquaculture Lease

(a) Applications for aquaculture leases shall include the following:

1. Name and address of the applicant;

2. Legal description and acreage of the parcel sought;

3. Two prints of a survey of the parcel sought prepared, signed, and sealed by a person properly licensed by the Florida State Board of Land Surveyors or an agent of the federal government acceptable to the department;

4. Description of the aquaculture activities to be conducted, including whether such activities are to be experimental or commercial, and an assessment

of the current capacity of the applicant to conduct such activities;

5. Statement evidencing that the lease is in the public interest;

6. Names and addresses, as shown on the latest county tax assessment roll, of each owner of property lying within 1,000 feet of the parcel sought, certified by the county property appraiser;

7. Statement of the impact of the proposed use of the parcel sought on the ecology of the area; and

8. A \$200 non-refundable processing fee.

(b) If the board determines to lease the parcel sought, the lease shall be by competitive bid. The department shall cause notice of such lease to be published in a newspaper in the county in which the parcel is situated once a week for four consecutive weeks. A copy of the notice shall also be sent to the county commission. Such notice shall contain the following:

1. Legal description and acreage of parcel sought;

2. Terms of the lease acceptable to the board;

3. Deadline, time, and date, for the receipt of all bids;

4. Address to which all bids shall be sent; and

5. The date, time, and place of the opening of bids.

(c) Competitive bids for aquaculture leases shall be written offers of a cash consideration which shall include the advertised fee for the first lease year, the amount offered above such fee for said first year being a competitive bid. The cash consideration offered shall accompany the written offer and shall be returned to the unsuccessful bidders either upon award of the lease or upon rejection of all bids.

(d) A lease shall not be approved by the board when a resolution of objection, adopted by a majority of the county commissioners of the county in which the parcel sought is situated, has been filed with the department within 30 days of the date of first publication of the notice of lease.

(e) A lease shall not be approved for a parcel larger than the applicant can utilize efficiently; however, the board may reserve a reasonable amount of submerged land adjacent to a parcel under experimental lease for the lessee when beginning operation under a commercial lease.

(f) Each lease shall contain the following:

1. The term of the lease which shall not exceed 10 years;

2. The amount of fee per acre leased to be paid on or before January 1 each year which shall take the form of:

i. Fixed fee to be paid throughout the term of the lease; or

ii. Basic fee to be paid throughout the term of the lease plus royalties based upon the productivity of the aquaculture after the first year;

3. The disposition to be made of all improvements and animal and plant life upon the termination or cancellation of the lease.

4. The right to assignment, in whole or in part, upon the approval of the board.

(g) Failure to perform the aquaculture activities for which the lease was granted shall be grounds for cancellation of the lease and forfeiture to the State of Florida of all the work, improvements, animal and plant life in and upon the parcel leased. In addition, a surety bond is required.

(h) The parcel leased shall be identified, well marked, and shall have, except when it will

interfere with the development of the animal and plant life being cultivated by the lessee, reasonable public access for boating, swimming, and fishing. All limitations on the public use of the parcel leased as set forth in the lease shall be clearly posted in conspicuous places by the lessee. Each parcel leased shall be marked in compliance with the rules and regulations of the Department, U. S. Coast Guard, and U. S. Army Corps of Engineers.

(3) Oil and Gas Lease

(a) Applications for nominations for the lease of sovereignty lands in which the State of Florida holds an interest in the petroleum or petroleum products shall include the following:

1. Name and address of the applicant or nominee;
2. Legal description of the parcel sought including the surface acreage; this description may utilize the submerged land blocks approved by the board on March 17, 1981;
3. Identification of the state agency vested with the ownership of the petroleum products;
4. Percentage of the petroleum interests held by the State;
5. Identification of any municipal corporation in which all or part of the parcel sought is located or within 10 miles thereof;
6. Identification of any improved beach outside a municipal corporation or lands in the tidal waters of the State of Florida abutting on or immediately adjacent to any improved beach in which or part of the parcel sought is located or within 3 miles thereof; and
7. A \$200 non-refundable processing fee.

(b) Competitive bids for oil and gas leases shall be written offers of a cash consideration including the advertised fee for the first lease year, the amount offered above said fee being the competitive bid. The cash consideration offered shall accompany the written offer by certified or cashier's check made payable to the department and shall be returned to the unsuccessful bidder upon award of the lease or upon rejection of any and all bids. All bids must contain a certified statement as to the bidder's state lease holdings pursuant to Section 253.512, Florida Statutes.

(4) Dead Shell Lease

Applications for leases to remove dead shells shall be submitted to and processed by the Division of Marine Resources of the Department. The issuance of all such leases is subject to approval by the board.

Specific Authority 253.03(7), 253.73 FS. Law Implemented 253.03, 253.12, 253.115, 253.47, 253.67—75, 370.16 FS. History—New 12-20-78, Formerly 16C-12.14, 16Q-17.14, Amended 3-27-82, 8-1-83.

16Q-21.081 Applications for Grandfather Structure Registration.

(1) Applications for grandfather structure registration shall include the following:

(a) Name, address and telephone number of applicant and applicant's authorized agent, if applicable.

(b) Location of the proposed activity including: county; section, township and range; affected waterbody; and a vicinity map, preferably a reproduction of the appropriate portion of United States Geological Survey quadrangle map.

(c) Satisfactory evidence of riparian upland property.

(d) Two copies of a dimensioned site plan drawing(s) with the following requirements:

1. Utilizing an appropriate scale on 8 1/2" X 11" size paper;
2. Showing the approximate waters edge;
3. Showing the location of the grandfathered structures;
4. Showing the applicant's upland parcel property lines;

(e) Dated aerial photography, previously issued permits or authorizations, or other satisfactory information which verifies that the structures qualify as grandfathered structures.

(f) A \$200.00 non-refundable processing and registration fee.

Specific Authority 253.03(7) FS. Law Implemented 253.03, 253.71 FS. History—New 8-1-83.

16Q-21.09 Applications for Public Easement.

(1) Applications for easements across sovereignty land for public purposes such as utilities, bridges, and roads, shall include the following:

(a) Name, address, and telephone number of applicant and applicant's authorized agent;

(b) Location of the proposed activity including: county; section, township and range; affected waterbody; and a vicinity map, preferably a reproduction of the appropriate portion of a United States Geological Survey Quadrangle Map;

(c) Satisfactory evidence of title or extent of interest of the applicant to the riparian uplands or consent of upland owners for proposed use;

(d) A detailed statement of proposed use. If the applicant is a local governing body, the request shall be by official resolution;

(e) Two prints of a survey prepared, signed, and sealed by a person properly licensed by the Florida State Board of Land Surveyors meeting the following requirements:

1. utilizing an appropriate scale on 8 1/2" X 11" size paper;
2. showing boundaries of the parcel sought;
3. showing ownership lines of the riparian uplands;
4. showing the line of ordinary or mean high water;

5. showing the location of the shoreline vegetation, if existing;

6. showing the location of any proposed or existing structures; and,

7. including a legal description and acreage of the parcel sought;

(f) Written comments from the Department of Environmental Regulation, when applicable, in the form of:

1. permit appraisal or biological assessment; and,
2. letter of intent, if issued;

(g) A \$200.00 non-refundable processing fee. The processing fee may be waived for state agencies established pursuant to Chapter 20, Florida Statutes, and local governments; and,

(h) If dredging is proposed, an estimate of the number of cubic yards of sovereignty material to be removed showing how the amount was calculated.

(2) All easements across sovereignty lands shall be subject to reverter upon failure of the applicants to use the parcels sought as proposed in the applications.

(2) The terms of the easements shall be limited to the life of the proposed project or amortization of the improvements.

Specific Authority 253.03(7) FS. Law Implemented 253.03, 253.12 FS. History—New 9-26-77, Formerly 16C-12.09 and 16Q-17.09, Revised 3-27-82.

16Q-21.10 Applications for Private Easement.

(1) Applications for easements across sovereignty lands for private purposes shall include the following:

(a) Name, address and telephone number of applicant and applicant's authorized agent;

(b) Location of the proposed activity including: county; section, township and range; affected waterbody; and a vicinity map, preferably a reproduction of the appropriate portion of a United States Geological Survey Quadrangle map;

(c) Satisfactory evidence of title or extent of interest of the applicant to the riparian uplands or consent of upland owners for proposed use;

(d) A detailed statement of proposed use;

(e) A statement evidencing that the easement sought is in the public interest;

(f) Two prints of a survey prepared, signed, and sealed by a person properly licensed by the Florida State Board of Land Surveyors meeting the following requirements:

1. utilizing an appropriate scale on 8 1/2" X 11" size paper (unless a larger size is necessary to provide sufficient clarity and detail);

2. showing boundaries of the parcel sought;

3. showing ownership lines of the riparian uplands;

4. showing the line of ordinary or mean high water;

5. showing the location of the shoreline vegetation, if existing;

6. showing the location of any proposed or existing structures; and,

7. including a legal description and acreage of the parcel sought.

(g) Written comments from the Department of Environmental Regulation, when applicable, in the form of:

1. permit appraisal or biological assessment; and,

2. letter of intent, if issued;

(h) A list of names and addresses of all property owners within a 1,000 foot radius of the proposed easement area, verified by the County Property Appraiser's Office that these names came from the latest tax assessment rolls. The names and addresses shall be clearly typed and acceptable to the Department, preferably on labels suitable for mailing;

(i) A \$200.00, non-refundable processing fee;

(j) If dredging is proposed, an estimate of the number of cubic yards of sovereignty material to be removed showing how the amount was calculated;

(k) If the application is for an easement of right-of-way for private access from a public road to lands of the applicant, proof of approval from the agency having jurisdiction over the public road; and,

(1) Payment for the value of the easement in the amount stated on an appraisal performed by an independent appraisal firm contracted by the applicant and approved by the department.

(2) Applications shall be granted upon such terms and conditions, including payment of the value of the easement, if any, that the board sees fit.

within 90 days after receipt of notification that the easement has been granted by the board or the granting of the easement shall be invalid.

(3) All easements across sovereignty lands shall be subject to reverter upon failure of the applicant to use the parcels sought as proposed in the applications.

(4) The terms of all the easements shall be limited to a reasonable period of time related to the life of the proposed project or amortization of the improvements.

Specific Authority 253.03(7) FS. Law Implemented 253.03, 253.12 FS. History—New 12-20-78, Formerly 16C-12.10 and 16Q-17.10, Revised 3-27-82.

16Q-21.11 Payments and Fees for Standard Leases, Easements, and Severed Dredge Materials.

(1) Standard Leases

(a) The annual lease fee shall be computed at a base rate of \$0.065 per square foot.

(b) There shall be a discount of 30 percent per square foot per year for all leases that are open to the public on a first come, first served basis. Marinas constructed in conjunction with owner occupied multi-family residential buildings, shall be considered open to the public on a first come, first serve basis if no less than 50 percent of its berths are made available to the general public on a rental basis.

(c) An additional 20% of the lease fee shall be charged for the first annual fee on all leases.

(d) The per square foot base rate shall be revised March 1 of each year and increased or decreased based on the Consumer Price Index-All Items pursuant to paragraph (f) below.

(e) The rate for all new leases shall be determined according to the appropriate base rate schedule for the year in which the lease is granted.

(f) The rate charged for individual leases shall be adjusted annually based upon the average increase in the Consumer Price Index-All Items for the previous five years with a 10% cap.

(g) A rate of two times the existing rate shall be applied to aquatic preserve leases where 75% or more of the subject lease shoreline and the adjacent 1,000 feet on both sides of the lease area is in a natural, unbulkheaded, nonseawalled or nonriprapped condition. A rate of up to three times the base rate may be used in Class 1 or 2 Resource Protection Areas as designated in an aquatic preserve management plan adopted by the board.

(h) Nonwater dependent uses shall be assessed a fee that is ten times the appropriate base rate or a fee calculated by multiplying the square footage of the preempted area times the appraised per square foot value of the unimproved adjacent upland property times ten per cent, whichever is greater. The fees shall be adjusted annually pursuant to either 16Q-21.11(1)(d) or the revised annual assessed value as appropriate. Grandfathered nonwater dependent uses shall be treated as water dependent uses when grandfather status is lost for any reason.

(i) There shall be a minimum annual fee of \$225.00.

(j) Waivers, partial waivers, or exclusions from payment of the lease fees for government, research, educational or charitable organizations may be granted by the Board in the event that the proposed uses are in the public interest.

(k) If a facility occupies sovereign submerged

lands portions of which are exempted from payment by virtue of grandfathered status and portions of which are leased, and grandfathered status is lost, the lease fee and rate schedule for the entire property shall be the appropriate base rate at the time the renegotiated lease is executed.

(l) There shall be an assessment for prior unauthorized use of sovereignty land for after-the-fact lease applications. The minimum assessment for such applications shall include:

1. Payment of retroactive lease fees;
2. Payment of an assessment computed as the number of square feet in the lease area times the lease fee per square foot at the time construction was commenced times ten; and,
3. Payment of an additional annual percentage on retroactive lease fees and on the assessment calculated under 2., computed at a rate of 12%. Such rate shall be adjusted annually to a rate equal to the two percentage points above the Federal Reserve Bank discount rate to member banks.

(m) Any grandfather structures which are not registered according to this rule shall lose any grandfathered rights.

(n) Any grandfather structures which are not registered according to this rule shall be considered a prior unauthorized use as of June 30, 1984, and may be treated according to the provisions of this section.

(o) The board may, at its discretion, consider equities and particular circumstances on a case by case basis to determine whether an adjustment of the assessment provisions set forth in (l) above would be warranted and may increase or lower the assessment accordingly.

(2) Private Easements

(a) The fee for private easements shall be determined by an appraisal obtained by the applicant. The appraiser must be selected from the division's approved list of appraisers and the appraisal must be reviewed and approved by the division.

(b) In addition to standard appraisal requirements and procedures, the following factors shall be considered in determining the easement fee:

1. the extent to which the easement is exclusionary; i.e., the degree to which the proposed easement precludes, in whole or in part, traditional or future public uses of the easement area or other submerged land; and

2. the enhanced property value or profit gained by the applicant if the proposed easement is approved.

(3) Severed Dredge Materials

(a) When an activity involves the removal of sovereignty materials to upland property by dredging or any other means, payment per cubic yard of material shall be as follows:

- | | |
|--|---------|
| 1. Monroe County | \$3.25 |
| 2. Bay, Brevard, Broward, Charlotte, Collier, Dade, Duval, Escambia, Lee, Manatee, Palm Beach, Pasco, Pinellas and Sarasota Counties | \$2.25 |
| 3. All other counties | \$1.25 |
| 4. Minimum payment | \$50.00 |

(b) These payments shall not be used for dead shell and mining leases which will be subject to individual royalty or other compensation payments.

(c) A waiver of the severed dredge material payment may be requested and approved when:

1. the materials are being placed on public

property and used for public purposes, or

2. it is affirmatively demonstrated that the severed dredge material has no economic value.
Specific Authority 253.03(7) FS. Law Implemented 253.03, 253.71 FS. History—New 3-27-82, Amended 5-18-82, 8-1-83.

16Q-21.12 Spoil Islands.

(1) No spoil islands shall be developed except upon a clear showing that the development is in the public interest and hardship would result if the development was not authorized.

(2) Proposals for public development of spoil islands may be authorized after comments have been solicited and received from the appropriate public agencies determining that the public interest would be served by the development.

(3) Unauthorized structures that have been constructed on spoil islands shall be removed. The procedure for removal shall be as follows:

(a) The individual claiming a possessory interest in any structure shall be served notice by certified mail that he is trespassing and that he must remove the structure within 120 days of receipt of the notice.

(b) If the individual fails or refuses to remove the structure within 120 days of receipt of the notice, the board shall have the structure removed at the individual's expense.

(c) If the individual cannot be located, notice of trespass and intent to remove the structure shall be posted on the structure for 120 days prior to removal.

(4) Continuing human habitation of any spoil islands is prohibited.

Specific Authority 253.03(7) FS. Law Implemented 253.03, 253.115 FS. History—New 9-26-77, Formerly 16C-12.05 and 16Q-17.05, Revised 3-27-82.

16Q-21.13 Applications to Purchase Lands Riparian to Uplands.

(1) Applications to purchase lands riparian to uplands may be made by the riparian owners only. The board reserves the right to reject any and all such applications. The following shall be included in each application:

(a) Name and address of the applicant;

(b) Two prints of a survey prepared, signed, and sealed by a person properly licensed by the State of Florida Board of Land Surveyors or an agent of the federal government approved by the department clearly showing:

1. the boundaries of the parcel sought;
2. land tie referenced, by ground survey, to an established accessible section corner, subsection corner, other U. S. Government Land Office survey corner, or other controlling corner(s);
3. boundary lines of the applicant's adjacent uplands;
4. existing mean high water line, surveyed and approved in accordance with Chapter 177, Part II, Florida Statutes, between the applicant's uplands and the parcel sought extending 1,000 feet from both sides of the parcel;
5. U. S. Government Land Office meander line.

(c) Five maps, no larger than 8 1/2" X 14" in size, showing the location of the parcel sought for purchase. These maps need not be certified;

(d) Legal description and acreage of the filled parcel.

(e) Aerial photograph showing the date of flight, if available, with the parcel sought identified thereon;

(f) Legal description and acreage of the filled parcel.

(g) Aerial photograph showing the date of flight, if available, with the parcel sought identified thereon;

(f) One copy of the recorded subdivision plan with any dedication data, if the applicant's uplands are part of the subdivision;

(g) Satisfactory evidence of title in the applicant to the riparian uplands;

(h) Statement of the applicant's proposed use of the parcel sought;

(i) Statement evidencing that the sale of the parcel is in the public interest;

(j) Names and addresses, as shown on the latest county tax assessment roll, of all owners of land lying within 1,000 feet of the parcel sought, certified by the county appraiser; and

(k) An appraisal of the current market value of the parcel sought made within 3 months after the date of application by an appraiser with designations acceptable to the department.

(l) A non-refundable processing fee of \$200 shall accompany each application, except for applications from state agencies.

(2) If the parcel sought is located in Pinellas or Sarasota County, the applicant shall simultaneously file an application with the respective water and navigation control authority having jurisdiction over the parcel.

(3) When state-owned submerged lands have been filled without authority after June 11, 1957 (state-owned submerged lands filled before June 11, 1957 are addressed in Rules 16Q-21.14 and 16Q-21.15, Florida Administrative Code), the board, by law may:

(a) Direct the fill be removed by or at the expense of the applicant;

(b) Direct the fill remain as state-owned and have it surveyed at the expense of the applicant; or

(c) Sell the filled lands. The following sale prices shall be recommended by the department to the board:

1. One and one-half times the present appraised value of the lands excluding building improvements if the unauthorized filling was done by the applicant's predecessor in title between June 11, 1957 and July 14, 1967.

2. Two times the present appraised value of the lands excluding building improvements if the unauthorized filling was done by the applicant's predecessor in title after July 14, 1967.

3. Three times the present appraised value of the lands excluding building improvements if the unauthorized filling was done by the applicant after June 11, 1957.

(4) Full payment for the deed shall be made within 90 days after notification of confirmation of the sale by the board or the sale shall be invalid. *Specific Authority 253.03, 253.12, 370.021 FS. Law Implemented 253.115, 253.12 FS. History—New 9-26-77, Formerly 16C-12.04 and 16Q-17.04, Revised 3-27-82.*

16Q-21.14 Disclaimers to Confirm Title to Filled Formerly Sovereignty Lands.

(1) Applications for disclaimers to confirm title of formerly sovereignty lands filled prior to May 29, 1951 (prior to June 11, 1957 in Dade and Palm Beach Counties), or subsequent to these dates under authority of a U. S. Army Corps of Engineers permit issued prior to these dates, must be supported by documentary evidence acceptable to the department including the following:

(a) Name and address of the applicant;

(b) Two prints of a survey prepared, signed, and sealed by a person properly licensed by the Florida

federal government acceptable to department clearly showing:

1. present mean high waterline, surveyed and approved in accordance with Chapter 177, Part 11, Florida Statutes;

2. applicant's ownership to the former mean high water line shown or indicated;

3. U. S. Government Land Office meander line; and

4. traverse of fill, showing the location of the former mean high water line, which is properly riparian to the applicant's uplands, with a land tie to an established accessible section corner, subsection corner, other U. S. Government Land Office Survey corner, or other controlling corner(s);

(c) Five maps, no larger than 8 1/2" X 14" in size, showing the location of the parcel sought. The maps need not be certified;

(d) Legal description and acreage of the filled parcel;

(e) Aerial photograph showing the date of flight, if available, evidencing the date of filling;

(f) Satisfactory evidence of title in the applicant to the riparian uplands to the mean high water line as it existed prior to filling;

(g) Two affidavits executed by disinterested parties evidencing the date, as accurately as possible from personal knowledge, when the filling of the parcel sought was completed;

(h) Copy of the U. S. Army Corps of Engineers permit issued prior to May 29, 1951 (June 11, 1957 in Dade and Palm Beach Counties) authorizing the fill, if applicable; and

(i) A non-refundable processing fee of \$200 shall accompany each application, except for applications from state agencies.

Specific Authority 253.03(7) FS. Law Implemented 253.12, 253.129 FS. History—New 9-26-77, Formerly 16C-12.06 and 16Q-17.06, Revised 3-27-82.

16Q-21.15 Quitclaims to Clear Title to Filled Formerly Sovereignty Lands.

(1) Applications for quitclaim deeds to clear title to sovereignty lands filled after May 29, 1951, but prior to June 11, 1957 (except in Dade and Palm Beach Counties) or subsequent to these dates under authority of a U. S. Army Corps of Engineers permit issued prior to these dates, must be supported by documentary evidence acceptable to the department and including the following:

(a) Name and address of the applicant;

(b) Two prints of a survey prepared, signed, and sealed by a person properly licensed by the Florida State Board of Land Surveyors or an agent of the federal government acceptable to the department clearly showing:

1. present mean high water line surveyed and approved in accordance with Chapter 177, Part 11, Florida Statutes;

2. applicant's ownership to the mean high water line prior to filling;

3. U. S. Government Land Office Meander line; and,

4. traverse of fill, showing the location of the former mean high water line, which is properly riparian to the applicant's upland ownership, with a tie to an established accessible section corner, subsection corner, other U. S. Government Land Office survey corner, or other controlling corner(s);

(c) Five maps, no larger than 8 1/2" X 14" in size, showing the location of the parcel sought. The

maps need not be certified;

(d) Legal description and acreage of the filled parcel;

(e) Aerial photograph showing the date of flight, if available, and showing the land as it existed prior to and after the filling;

(f) Satisfactory evidence of title in the applicant to the riparian uplands;

(g) Two affidavits executed by disinterested parties evidencing the date, as accurately as possible from personal knowledge, of commencement and completion of the fill;

(h) Copy of a U. S. Army Corps of Engineers permit issued after May 29, 1951, but prior to June 11, 1957, authorizing the fill, if applicable; and,

(i) A non-refundable processing fee of \$200 shall accompany each application, except for applications from state agencies.

(2) The consideration for the parcel sought shall be the appraised value of the parcel in its unfilled state prior to June 11, 1957. The appraisal of the parcel shall be made within 3 months after the date of application by an appraiser with designations acceptable to the department.

(3) Full payment for the deed shall be made within 90 days after notification of confirmation of the conveyance by the board or the conveyance shall be invalid.

Specific Authority 253.03(7) FS. Law Implemented 253.12 FS. History—New 9-26-77, Formerly 16C-12.07 and 16Q-17.07, Revised 3-27-82.

16Q-21.16 Applications to Reclaim Lands Lost Due to Avulsion or Artificial Erosion.

(1) Applications to reclaim lost lands as defined in Section 253.124(8), Florida Statutes, may be submitted only by the riparian upland owner or the legally authorized agent thereof.

(2) Applications to reclaim lands lost due to avulsion or artificial erosion shall include the following:

(a) Name and address of applicant;

(b) Satisfactory evidence of title in the applicant to the existing upland, such as:

1. current title insurance policy issued by a title insurance company authorized to do business in Florida; or

2. opinion of title prepared by a member of the Florida Bar; or

3. affidavit of ownership;

(c) A survey prepared, signed, and sealed by a registered land surveyor showing the applicant's upland, U. S. Meander survey line, the approximate original mean high water line and the existing approximate mean high water line, and a traverse showing the location of the former mean high water line which is properly riparian to the applicant's uplands with a land tie to an established reference point;

(d) Legal description as shown by original survey which shall include the area to be reclaimed;

(e) Copy of a recorded subdivision plat showing the original recorded shoreline if the applicant's upland is part of a subdivision, or a copy of a map taken from an R. E. D. 1. Real Estate Atlas map showing ownership lines and shorelines;

(f) Statement of proposed methods of reclaiming the subject lost lands, if not indicated in an attached Department of Environmental Regulation permit application;

(g) Two affidavits executed by disinterested parties evidencing the manner, as accurately as possible from personal knowledge, that the loss of land occurred by avulsion (storms, hurricanes), artificial erosion (caused by the emplacement of bulkheads, jetties and other structures), dredging, or artificial land cutting of uplands; and

(h) Accurate aerial photographs showing the date of flight evidencing the location and configuration of the original shoreline before and after avulsion or artificial erosion. Suggested sources: local tax assessor's office, local offices of the State Departments of Transportation and Agriculture and Consumer Services, and local offices of the U. S. Army Corps of Engineers.

Specific Authority 253.03(7) FS. Law Implemented 253.03, 253.12 FS. History—New 3-27-82.

Appendix D.

No. 70-17

THAT the state-owned lands within the following described boundaries be hereby recognized for their exceptional public value and dedicated in perpetuity as an aquatic preserve and as an element of a statewide system of aquatic preserves:

AQUATIC PRESERVE G-5

The sovereignty lands in St. Joseph Bay and the Gulf of Mexico lying within the following described boundaries:

Begin at a point on a Westerly extension of the South Corporate Limits of the City of Port St. Joe, said point being 1320 feet Westerly from the mean high water line of St. Joseph Bay, thence Southerly along a line 1320 feet Westerly of and parallel with the said mean high water line to an intersection with a Westerly extension of the South line of the $N\frac{1}{2}$ of fractional Section 2, Township 9 South, Range 11 West, thence West along said extended line to a point 2442 feet West of the mean high water line of St. Joseph Bay, thence South along a line parallel to the East line of said fractional Section 2 and fractional Sections 11 and 14 of Township 9 South, Range 11, West, to an intersection with a Westerly extension of the South line of said fractional Section 14, thence East along said extended line to the mean high water line of St. Joseph Bay, thence Southerly and Westerly along said mean high water line to the southeasterly corner of a parcel of land conveyed to T. A. Sproulls by the Trustees of the Internal Improvement Fund, thence North along the East line of said parcel to the established bulkhead line, thence Southwesterly along said bulkhead line to the Northwesterly corner of lands conveyed by the Trustees of the Internal Improvement Fund to John J. and Ava W. Grimes, thence South along the West line of parcel conveyed to Grimes to its intersection with the mean high water line of St. Joseph Bay, thence Westerly along said mean high water line to its intersection with the Easterly line of a parcel of land conveyed by the Trustees of the Internal Improvement Fund to Thomas C. Gibson, thence North along said East line to the established bulkhead line, thence Southwesterly 2032 feet along said bulkhead line to the Northwesterly corner of parcel conveyed to Thomas C. Gibson, thence South along the West line of said parcel to the mean high water line of St. Joseph Bay, thence Westerly and Northerly along said mean high water line to its intersection with the South line of Section 36, Township 3 South, Range 12 West, thence East along an Easterly extension of the South line of said Section 36 to its intersection with the established bulkhead line, thence Northwesterly 1325 feet along said bulkhead line to its intersection with an easterly extension of the North line of Government Lot 7 of said Section 36, thence Westerly 2115 feet along said extended line to the mean high water line of St. Joseph Bay, thence Northerly along said mean high water line to the most Northerly tip of St. Joseph Point, thence Southerly along the mean high water line of the Gulf of Mexico to the most Southerly tip of Cape San Blas, thence Westerly to a point in the Gulf of Mexico, said point being 15,840 feet Westerly from the mean high water line of the Gulf of Mexico, thence Northerly along a line 15,840 feet Westerly of and parallel

PIERCE COUNTY WETLANDS ATLAS

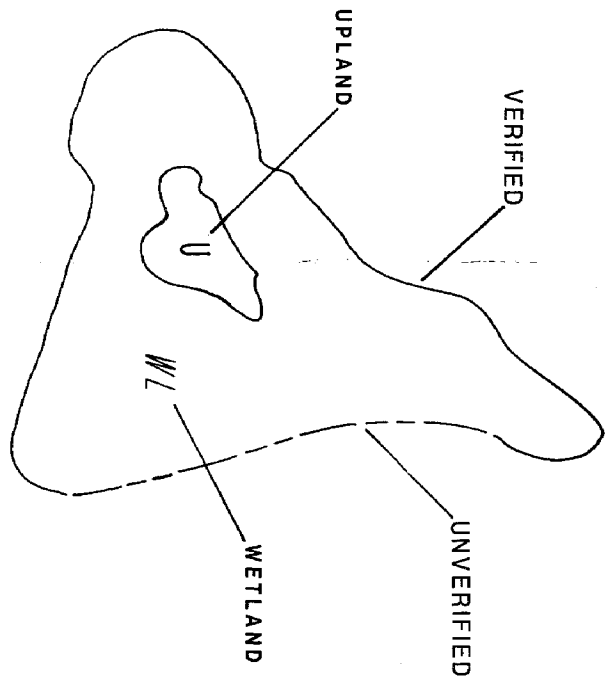
- 1988 -

This atlas does NOT represent 100% of the wetlands in the county. Wetlands under 1/4-acre were not mapped.

This atlas was compiled from National Wetlands Inventory Maps (United States Department of the Interior, Fish and Wildlife Service, 1973), Soil Survey of the Pierce County Area, Washington (United States Department of Agriculture, Soil Conservation Service, 1979), Pierce County Draft Flood Insurance Study Maps (Federal Insurance Rate Maps, Pierce County Public Works Department revisions 1985), interpretation of aerial photographs at 1:12,000 (1985), and field verification in 1987 and 1988.

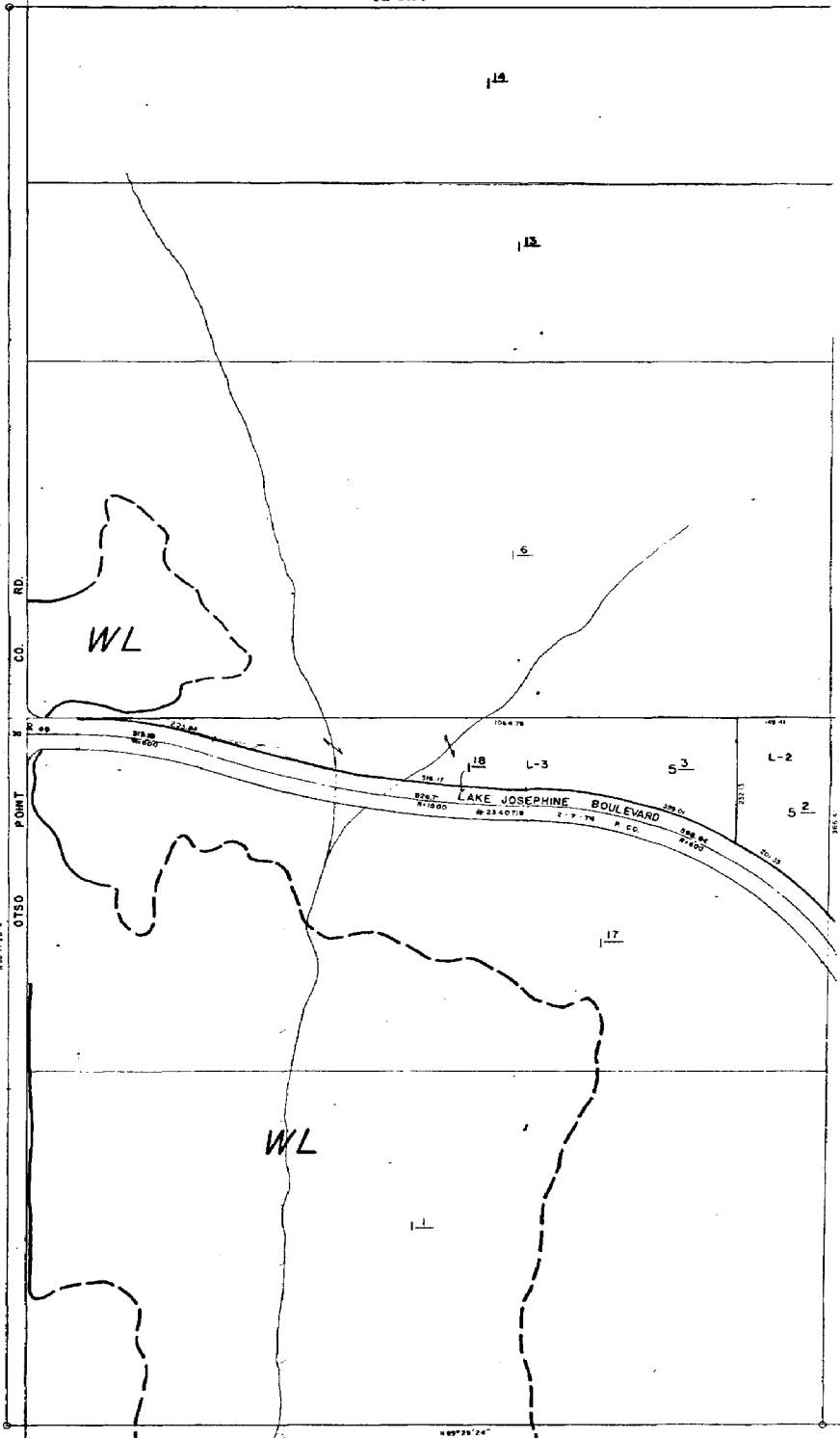
The wetland boundaries were verified in the field using the U.S. Fish and Wildlife definition (1979) which follows:
 Wetlands are those lands transitional between terrestrial and aquatic systems, where the water table is usually at or near the surface or the land is covered by shallow water. A wetland must have one or more of the following three attributes: 1)at least periodically, the land supports hydrophytic plants; 2)the substrate is predominantly undrained hydric soil; 3)the substrate is non-soil and is saturated with water or covered by shallow water at some time during the growing season of each year.

WETLAND BOUNDARY LEGEND



The approximate boundaries were delineated by the presence of hydrophytic plants and the hydrology of the area. See field data surveys for site-specific information. Wetland boundaries are approximate and are intended only to provide an indication of the presence of wetlands. Further evaluation may be necessary to determine exact wetland boundaries.

The preparation of these maps was financially aided through a grant from the Washington State Department of Ecology with funds obtained from the National Oceanic and Atmospheric Administration, and appropriated for Section 306 of the Coastal Zone Management Act of 1972.



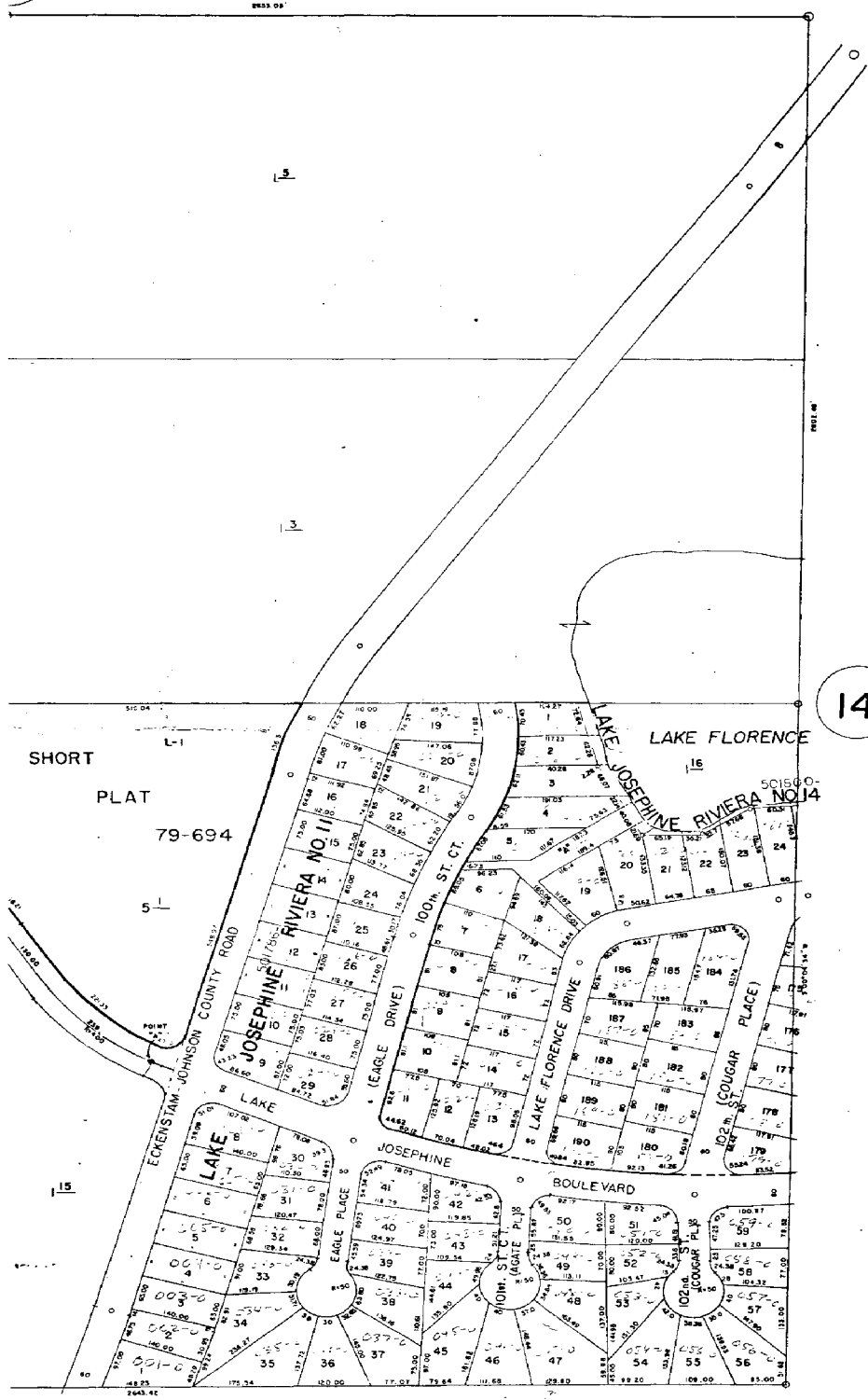
ANDERSON ISLE.

PIERCE COUNTY WETLANDS INVENTORY - 1988
 Pierce County Assessor's Base Map - 1988

— verified boundary
 - - - - - unverified boundary

Adopted by Pierce County
 Council February 28, 1989
 Ordinance 88-182

8



14

NE 5 T 19

R 1E

17

ROAD 3, SCHOOL 1

SCALE 1" = 100'

THIS IS NOT A SURVEY

Wetland boundaries are approximate and are intended only to provide an indication of the presence of wetlands. Further evaluation may be necessary to determine exact wetland boundaries.

with the mean high water line of the Gulf of Mexico to its intersection with the channel into St. Joseph Bay, thence Easterly and Southerly along said entrance channel to a P. I., said P.I. being the beginning of North Channel, thence Southeastly along a straight line to Point of Beginning.

AND BE IT FURTHER RESOLVED:

THAT it is hereby declared to be the purpose and intent of the State of Florida Board of Trustees of the Internal Improvement Trust Fund to set aside and manage the above described aquatic preserve in accordance with the management policies and criteria adopted and set forth by separate resolution adopted on the 21st day of October, A.D. 1969, for application uniformly to all elements of the statewide system of aquatic preserves.

IN TESTIMONY WHEREOF, the Trustees, for and on behalf of the State of Florida Board of Trustees of the Internal Improvement Trust Fund have hereunto subscribed their names and have caused the official seal of said State of Florida Board of Trustees of the Internal Improvement Trust Fund to be hereunto affixed, in the City of Tallahassee, Florida, on this the 2nd day of November, A.D. 1970.

[Handwritten signature]
Governor

[Handwritten signature]
Secretary of State

[Handwritten signature]
Attorney General

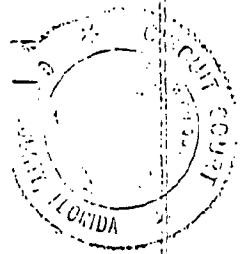
Comptroller
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Treasurer

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Commissioner of Education

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Commissioner of Agriculture

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