

7.0 Economic and Funding Analysis

7.1 Economic Analysis

The economics for OHPA over the next ten years look very strong, The Port Authority revenues that are generated by the Port activities come from a variety of sources, but the main revenue sources are:

- Dockage
- Wharfage
- Operator Use Fee

The dockage charges are based on vessel length and an ascending rate scale accessed on a per foot basis per day. The wharfage is accessed on a short ton (st) basis, and is \$2.98 per st on break-bulk cargo and \$2.45 per st on containerized cargo. The Operator Use Fee is paid by the operator to the Port Authority at \$1.50 per st. for all cargo types.

Together these charges average over \$5.25 per short ton of cargo handled at the Port.

Based on the assumptions on vessel size and time at berth, each short ton of breakbulk earns the port approximately \$4.87 and each TEU (based on 20% empties and an average of 10 st per loaded TEU) would earn the Port Authority approximate \$34.80. Based on the current cargo throughput of 350,000st of break-bulk and approximately 30,000 TEUs of container cargoes, annual Port Authority revenues would be approximately \$2.7 million. (Note that the various cargo handling, vessel length and other assumptions used in the economic analysis are shown on the following table.)

Table 7.1-1. Assumptions Used in Economic Analysis

Bulk Cargo	Current	2016-2018	2019-2023
Annual Tonnage (Short Ton)	350,000	334,845	347,820
Avg. Ton/Vessel	20,000	20,000	20,000
Number of Vessels	17.5	16.74225	17.391
Avg. length of Vessel	600	600	600
Avg. Ton/Hr.	500	500	500
Non-working Time (hrs.)	6	6	6
Total Time at berth	46	46	46
Avg. Days at Berth	1.9	1.9	1.9
Containers:			
TEUs Handled (Annual)	30,000	36,005	75,000
% Empty	20%	20%	20%
Loaded TEUs (Annual)	24000	28804	60000
Avg. Short Ton (st) per Loaded TEU	10	10	10
Total Container Short Ton	240,000	288,040	600,000
Avg TEU Per Vessel	1000	1000	1600
Number of Vessels	30	36	47

Avg. Length of Vessel	600	600	720
TEU per Box	1.5	1.5	1.5
Avg. Moves per vessel (10% restow)	733	733	1173
Avg. Moves/Hr. (2 cranes)	60	60	60
Non -Working Time (hrs.)	6	6	6
Avg, Time at berth (hrs.)	18.2	18.2	25.6
Avg, Days at berth	0.76	0.76	1.06

If the proposed full development plan is implement within the next five years (completed by 2018), we have projected that annual container throughput could increase to 75,000 TEUs per year after the improvements are made. Net revenue per TEU could increase to approximately \$35.00 per TEU, as the increased size in vessel length could result in additional dockage per vessel call. From the operating and throughput assumptions, we estimate that an increase of 35,000 TEUs (to an annual throughput of 75,000) would therefore result in an increase in Port Authority revenues of \$1.225 million per year to a total annual revenue to the Port Authority of over \$4 million from Port operations.

Table 7.1-2. Projected Annual OHPA Revenues From Port Operations

Break-Bulk Revenue:	Rates	Current	2016 - 2018	2019-2013
Dockage (lin. Ft per Day)	\$6.85	\$131,887.07	\$131,887.07	\$136,997.60
Wharfage (per ton)	\$2.98	\$997,838.10	\$997,838.10	\$1,036,503.60
Operator Use Fee	\$1.50	\$502,267.50	\$502,267.50	\$521,730.00
Total Break-Bulk Revenue		\$1,705,856.25	\$1,631,992.67	\$1,695,231.20
Total Revenue per st Bulk Cargo		\$4.87	\$4.87	\$4.87
Container Revenue:				
Dockage (lin. Ft per Day)	\$7.20	\$98,400.00	\$118,096.40	\$258,750.00
Wharfage (per ton of loaded container)	\$2.45	\$588,000.00	\$705,698.00	\$1,470,000.00
Operator Use Fee	\$1.50	\$360,000.00	\$432,060.00	\$900,000.00
Total Revenue Container Cargo		\$1,046,400.00	\$1,255,854.40	\$2,628,750.00
Total Revenues per TEU (includes Empties)		\$34.88	\$34.88	\$35.05
Total OHPA Revenue (Dockage/Wharfage/Op Use Fee)		\$2,752,256.25	\$2,887,847.07	\$4,323,981.20

If the entire \$56 million in development projects (including \$30 million in dredging costs, or 100% of the dredging) is included in the cash flow analysis, the following Internal Rate of Return (IRR) and Net Present Value (NPV) are calculated.

Table 7.1-3. Economic Evaluation of Investments for 10 and 20 Years

IRR -10 years	-10%
NPV	\$453,239.72
IRR - 20 years	6%
NPV	\$3,832,356.85

The results indicate that it would be difficult to get a return on the proposed investments during this initial planning period (the 10 years between 2013 and 2013), as the projects are assumed not to be completed until around 2018, leaving only half of the planning period (5 years) to generate a return. However, over the long term, even looking to 2023, the additional revenue that the Port Authority would earn based on being able to handle the larger vessels and more container cargo, would start to make a positive Internal Rate of Return (IRR). If the investments are made by 2018, the IRR will be around 6% by 2023.

Funding opportunities for Fernandina Port aligned in three funding categories.

- Federal Funding Strategies
- State Funding Strategies
- Local and Private Capital Funding Strategies

7.2 Federal Funding Opportunities

Federal funding for ports can be used to support a port's needs in a number of areas, including navigation channel improvements, landside transportation access, infrastructure development, economic development, and security. Funding sourced for a federal channel navigation improvement project, and sourced for landside transportation access projects through the US DOT and FDOT, will be covered separately in conjunction with identified project opportunities. This section will cover federal grants associated with port security, the TIGER program, and EDA.

7.2.1 Port Security Grant Program (PSGP) Funding Opportunity Announcement (FOA)

Program Overview and Priorities

PSGP directly supports maritime transportation infrastructure security activities. PSGP is one tool in the comprehensive set of measures authorized by Congress and implemented by the Administration to strengthen the Nation's critical infrastructure against risks associated with potential terrorist attacks.

The vast majority of U.S. maritime critical infrastructure is owned and/or operated by State, local, and private sector maritime industry partners. PSGP funds available to these entities are intended to improve port-wide maritime security risk management; enhance maritime domain awareness; support maritime security training and exercises; and to maintain or reestablish maritime security mitigation protocols that support port recovery and resiliency capabilities. PSGP investments must address U.S. Coast Guard (USCG) identified vulnerabilities in port security and support the prevention, detection, response, and/or recovery from attacks involving improvised explosive devices (IED) and other non-conventional weapons.

Program Objectives

PSGP plays an important role in the implementation of the National Preparedness System (NPS) by supporting the building, sustainment, and delivery of core capabilities essential to achieving the National Preparedness Goal (NPG) of a secure and resilient Nation. Delivering core capabilities requires the

combined effort of the whole community, rather than the exclusive effort of any single organization or level of government. PSGP's allowable costs support efforts to build and sustain core capabilities across Prevention, Protection, Mitigation, Response, and Recovery mission areas.

Grantees under the FY 2013 PSGP are encouraged to build and sustain core capabilities through activities such as:

- Strengthening governance integration;
- Enhancing Maritime Domain Awareness (MDA)
- Enhancing IED and Chemical, Biological, Radiological, Nuclear, Explosive (CBRNE) prevention, protection, response and supporting recovery capabilities within the maritime domain
- Enhancing cybersecurity capabilities
- Maritime security risk mitigation projects that support port resilience and recovery capabilities
- Training and exercises
- Transportation Worker Identification Credential (TWIC) implementation

In general, the following match requirements apply for PSGP (including ferry systems):

- Public Sector. Public sector applicants must provide a non-Federal match (cash or in-kind) supporting at least 25 percent (25%) of the total project cost for each proposed project.
- Private Sector. Private sector applicants must provide a non-Federal match (cash or in-kind) supporting at least 50 percent (50%) of the total project cost for each proposed project.

7.2.2 Transportation Investment Generating Economic Recovery (TIGER) program

TIGER provides discretionary grants utilizing U.S. general treasury funds for port infrastructure projects, among others. TIGER is the only general federal funding source for port-related infrastructure projects, which are critical to U.S. exports and the competitiveness of the U.S. economy.

Each applicant should provide evidence that the expected benefits of the project *justify* the costs (recognizing that some costs and benefits are difficult to quantify). If it is clear that the benefits do not justify the costs, the Department will not award a TIGER Discretionary Grant to the project. Benefits include the extent to which residents of the United States as a whole are made better off as a result of the project.

The best applications are often prepared by transportation agencies that have used in-house economic expertise and benefit-cost analysis (BCA) to influence the design of the project from the beginning. All Applicants should also consult the TIGER BCA Resource Guide available on the USDOT TIGER website (www.dot.gov/tiger) that will provide supplemental information, standard monetized values (where available), and updates for preparing a BCA. If applicants need additional help, DOT staff are available to answer questions and offer technical assistance until the final application deadline has passed.

The following provides general information and guidance on conducting an analysis. (Also see OMB Circulars A-4 and A-94-<http://www.whitehouse.gov/omb/circulars/>)

The content is divided along the following topics.

1. A description of the current infrastructure baseline (including anticipated changes over the analysis period) and identifies the problem that the project will address.
2. A description of the project including cost - initial and ongoing, funding sources, and how the project would change the current status/baseline and problem to be addressed
3. A description of the impact of that change and the corresponding population that it affects, including the economic nature of those benefits.
4. A summary of the results, including an explanation of how the analysis was done and the benefits calculated.

7.2.3 Economic Development Assistance Programs - Cooperative Agreement Grant

Background

The Economic Development Administration's (EDA) mission is to lead the Federal economic development agenda by promoting innovation and competitiveness, preparing American regions for economic growth and success in the worldwide economy. EDA fulfills this mission through strategic investments and partnerships that create the regional economic ecosystems required to foster globally competitive regions throughout the United States. EDA supports development in economically distressed areas of the United States by fostering job creation and attracting private investment. Specifically, under the Economic Development Assistance Programs (EDAP) Federal Funding Opportunity (FFO) announcement, EDA will make construction, non-construction, and revolving loan fund investments under the Public Works and Economic Adjustment Assistance Programs. Grants made under these programs will leverage regional assets to support the implementation of regional economic development strategies designed to create jobs, leverage private capital, encourage economic development, and strengthen America's ability to compete in the global marketplace. Through the EDAP FFO, EDA solicits applications from rural and urban communities to develop initiatives that advance new ideas and creative approaches to address rapidly evolving economic conditions.

EDA's programs provide economically distressed communities and regions with comprehensive and flexible resources to address a wide variety of economic needs and are designed to lead to the creation or retention of jobs and enhanced private investment. EDA's programs support local and regional economic development efforts to establish a foundation for vibrant economies throughout the United States. Through these programs, EDA supports bottom-up strategies that build on regional assets to spur economic growth and resiliency. EDA encourages its partners throughout the country to develop initiatives that present new ideas and creative approaches to advance economic prosperity in distressed communities.

EDA Investment Priorities

Through the competitive grant process outlined in this funding opportunity, all proposed projects are evaluated to determine the extent to which they align with EDA's investment priorities, create or retain jobs, leverage public and private resources, demonstrate the ability to start the proposed project promptly and use funds quickly and effectively, and provide a clear scope of work and specific, measureable outcomes.

EDA's investment priorities are designed to provide an overarching framework to guide the agency's investment portfolio to ensure its investments have the greatest impact. All applications for EDA assistance should align with at least one of the following investment priorities:

1. Collaborative Regional Innovation
2. Public/Private Partnerships
3. National Strategic Priorities
4. Global Competitiveness
5. Environmentally-Sustainable Development
6. Economically Distressed and Underserved Communities

7.3 State of Florida

The State of Florida has one of the most progressive port support programs in the U.S. and under the current Governor these programs have expanded to historic levels. During the October AAPA Convention in Orlando the 15 deep water ports that comprise the Florida Ports Council gave the Governor its first-ever

award recognizing contributions to Florida's ports. This section will describe Florida's port programs, followed by a highlight of recent events.

- Florida Seaport Transportation and Economic Development Program (Florida Statute 311.07)
 - \$15M available each year
 - Funds are available for dredging, wharf rehabilitation, equipment acquisition, environmental protection, intermodal access and development of port master plans
 - 50-50 matching funding
 - Ports must comply with state water quality provisions, and must have a comprehensive master plan
 - Projects involving rehabilitation of wharves, docks, berths, bulkheads, or similar projects require 25% match of funds.
 - Application guidelines are as defined by the Florida Seaport Transportation and Economic Development Council
- Strategic Port Investment Initiative
 - Signed by Rick Scott June 2012
 - The initiative operates within the FDOT
 - \$35M annually available from State Transportation Trust Fund
 - The FDOT will maintain a priority list of projects that meet the state's economic development goal of becoming a hub for trade, logistics, and export-oriented activities by:
 - Providing important access and major on-port capacity improvements
 - Providing capital improvements to strategically position the state to maximize opportunities in international trade, logistics, or the cruise industry
 - Achieving state goals of an integrated intermodal transportation system
 - Demonstrating the feasibility and availability of matching funds through local or private partners
- Intermodal Logistics Center Infrastructure Support Program
 - Signed by Rick Scott in June 2012
 - Provides \$5M a year for roads, rail, or other methods to move goods through a seaport
 - The initiative operates within the FDOT
 - The FDOT provides up to 50% of the required funding under this initiative
 - The FDOT must consider the following criteria when evaluating projects for intermodal logistics center infrastructure assistance:
 - The ability of the project to serve a strategic state interest.
 - The ability of the project to facilitate the cost-effective and efficient movement of goods.
 - The extent to which the project contributes to economic activity, including job creation, increased wages, and revenues.
 - The extent to which the project efficiently interacts with and supports the transportation network
 - A commitment of a funding match.
 - The amount of investment or commitments made by the owner or developer of the existing or proposed facility.

- The extent to which the owner has commitments, including memoranda of understanding or memoranda of agreements, with private sector businesses planning to locate operations at the intermodal logistics center.
- Demonstrated local financial support and commitment to the project.

Enterprise Florida

- Tax refunds, credits, incentive grants to promote economic development in Florida
 - Qualified Target Industry Tax Refund (QTI) – incentives to attract high wage jobs
 - Capital Investment Tax Credit – annual credit against corporate income tax to attract and grow capital-intensive industries in the clean energy, biomedical technology, financial services, information technology, silicon technology, transportation equipment manufacturing or corporate headquarters
 - High Impact Performance Incentive Grant (HIPI) – Negotiated grant to attract and grow high impact facilities.

Recent News

Highlighted by Governor Rick Scott's commitment to Florida's ports, on October 17, he announced a commitment of nearly \$35 million for strategic port projects across Florida that will be recommended to the Legislature for the upcoming legislative session. The additional investments will be included in the Florida Department of Transportation's (FDOT) Work Program. Governor Scott made the announcement at the American Association of Port Authority's (AAPA) Annual Convention in Orlando.

Governor Scott said, "We're on the right track to growing more jobs for families with increased investments in our seaports. With this nearly \$35 million commitment for critical port projects, we'll enhance our ports' ability to move more goods which will position Florida to play an even greater role in global trade. Our strategy to make Florida the gateway for global trade is working."

The three Florida ports included in the Governor's proposal for additional funding are:

- Port Canaveral – \$9.7 million for development of a container yard.
- Port Everglades – \$14.7 million to support the Turning Notch project.
- Port of Tampa – \$10.4 million to improve its container yard.

Between 2011 and 2014, \$642 million has been allocated for on-port projects, including waterside projects for Canaveral, Miami and Jacksonville, and terminal and rail improvements at Tampa. Just last month, Governor Scott and the Cabinet approved the proposed bond issuance of \$150 million to fund 16 important projects at Florida seaports. In this current fiscal year, the state of Florida (including projects funded through the upcoming bond issuance) is funding over \$275 million directly on seaport projects.

In October 2013, the Florida Seaport Transportation and Economic Development (FSTED) Council approved \$15 million in allocations to seaport projects around the state. The FSTED Council is comprised of the port directors for Florida's 15 public seaports, and representatives from the Florida Department of Transportation (FDOT) and the Department of Economic Opportunity. There are 10 port projects included in these allocations, which now will become part of the FDOT 2014/15 Work Program that comes before the Florida Legislature for approval this next Legislative Session.

"Florida continues to be proactive in attracting future business to our state by strategically investing in seaport infrastructure," said Manuel Almira, chair of the FSTED Council and port director for the Port of Palm Beach. "The process of identifying and vetting seaport projects using the depth of practical knowledge and experience represented on the Council has been extremely effective in making sure that state dollars are used wisely to boost the economy and create jobs in Florida."

The Council also approved allocations under the new Strategic Port Investment Initiative within FDOT, which requires a minimum of \$35 million be invested in priority seaport projects annually. This program was created by the Florida Legislature in 2012.

7.4 Local and Private Funding Opportunities

7.4.1 Waterway Assistance Program

The Florida Inland Navigation District offers the Waterway Assistance grant program, established by the Florida Legislature for the purpose of assisting local governments with funding for projects associated with the Atlantic Intracoastal Waterway and associated waterways within the District. Municipalities, counties, port authorities and taxing districts are eligible to submit applications for funding. Eligible candidates are sent an application package in January with a filing deadline of April 1st.

Eligible projects include navigation channel dredging, channel markers, navigation signs or buoys, boat ramps, docking facilities, fishing and viewing piers, waterfront boardwalks, inlet management, environmental education, law enforcement equipment, boating safety programs, beach re-nourishment, dredge material management, environmental mitigation and shoreline stabilization.

Annually, the district distributes approximately \$6.2 million dollars. Funding is limited by the Legislature to be equal to the tax revenue that the District receives from the County in which the project is located. For public projects, the District may provide up to 75% for public navigation projects. From 1986-2012, projects within Nassau County have received \$989,775 for improvements.

7.4.2 Ad Valorem

Ad valorem taxation may be a funding mechanism available to the Port of Fernandina. According to 189.404 (3) FS, *General laws or special acts that create or authorize the creation of independent special districts and are enacted after September 30, 1989, must address and require the following in their charters:*

(b) The powers, functions, and duties of the district regarding ad valorem taxation, bond issuance, other revenue-raising capabilities, budget preparation and approval, liens and foreclosure of liens, use of tax deeds and tax certificates as appropriate for non-ad valorem assessments, and contractual agreements.

(l) If an independent special district has the authority to levy ad valorem taxes, other than taxes levied for the payment of bonds and taxes levied for periods not longer than 2 years when authorized by vote of the electors of the district, the millage rate that is authorized.

The Charter for OHPA (House Bill No. 619) codifies the powers and duties of the authority including authorizing the issuance of bonds and other instruments of indebtedness. A review of the charter found no reference to ad valorem taxation as appears to be required under 189.404 (3).

The Tampa Port Authority is the only Florida port with a dedicated ad valorem tax. Their current assessment, \$0.1750 per \$1,000 of property valuation, is used to fund capital improvements. Having this additional funding reduces the Port's dependency on operational funds.

7.4.3 Public-Private Partnerships (P3)

To address the need for timely and cost effective development of improvements that serve a public purpose, Governor Rick Scott in June 2013 signed into law, House Bill 85 which provides expanded opportunities for public-private partnerships (P3). Under Florida Statute 287.05712 counties, municipalities or special districts may enter into agreements with private entities for the purpose of developing qualified projects. According to the statute, qualified projects include:

1. *A facility or project that serves a public purpose, including, but not limited to, any ferry or mass transit facility, vehicle parking facility, airport or seaport facility, rail facility or project, fuel supply facility, oil or gas pipeline, medical or nursing care facility, recreational facility, sporting or cultural facility, or*

educational facility or other building or facility that is used or will be used by a public educational institution, or any other public facility or infrastructure that is used or will be used by the public at large or in support of an accepted public purpose or activity;

2. *An improvement, including equipment, of a building that will be principally used by a public entity or the public at large or that supports a service delivery system in the public sector;*
3. *A water, wastewater, or surface water management facility or other related infrastructure; or*
4. *Notwithstanding any provision of this section, for projects that involve a facility owned or operated by the governing board of a county, district, or municipal hospital or health care system, or projects that involve a facility owned or operated by a municipal electric utility, only those projects that the governing board designates as qualifying projects pursuant to this section.*

Public entities may solicit or receive unsolicited proposals for qualifying projects with procurement procedures stipulated in the statute for either scenario. The statute also calls for the establishment of a task force charged with recommending guidelines for the creation of a uniform process for establishing these partnerships. The task force's recommendations are due to the Governor, House and Senate by July 2014.

Public-private partnerships have been used primarily for transportation projects in the past. Faced with shrinking budgets, these partnerships have been proven an effective method to fund needed improvements to public infrastructure and government facilities often much sooner and at a lower cost than public dollars. The \$1.8 billion expansion of I-595 and the Port of Miami Tunnel is expected to be completed in five years instead of the 15 to 20 years if the Florida Department of Transportation were to develop it based on available funding. Additionally, the reported cost is approximately \$200 million less than the original estimate by reusing some existing bridges and other innovative strategies.

With the expanded list of qualified projects extending beyond transportation facilities and the potential development opportunities of the Port of Fernandina's charter, public-private partnerships will be a valuable funding option.

The OHPA Charter, although empowered, has not yet been activated to support general economic development opportunities, or to seek opportunities for the generation of revenues thru the mechanisms of Improved Land Leases, Intermodal Operations in ancillary locations, Utility Services, or participation in P3 business opportunities. This broad base of potential business operations will create hybrid finance methods such as Credit Tennant Lease (CTL) or Conventional Credit Line formation based on cash flow or Equity formation.

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