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THE EFFECT OF THE NEW SECURITY PARADIGM ON PORT INFRASTRUCTURE DEVELOPMENT AND FINANCES

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ABSTRACT

Nine public ports account for 88% of all waterborne international trade in the State of Texas. Following September 11, 2001, these ports were required to implement new and additional security measures intended to deter terrorist attacks. This research project provides an overview of the financial aspects of port infrastructure development, the implementation of new security measures, and the relationship between them at these nine Texas ports. The history of the Port Security Grant Program through August 2005 is summarized to provide an understanding of the context in which ports are making financial decisions. This report also describes the financial performance of the ports during the study period (FY 1994-FY 2004). It examines the funding approaches used to finance asset acquisition and construction, and analyzes both the profitability of Texas ports in general terms and the potential effect of new security-related expenses on port finances. The use of security fees to recoup some of the security costs is explored, as are other potential “financing” mechanisms. Finally, several conclusions and policy concerns that surfaced during the conduct of this research are presented. The information presented in this report was obtained through examination of public financial data, interviews with key executives at the port authorities, investigation of government sources, and through media reports.

EXECUTIVE SUMMARY

The State of Texas has 367 miles of coastline and 29 ports, ranging from some of the busiest freight transportation hubs in the nation to smaller recreational and fishing harbors. Most of these ports are managed by public port authorities, the most notable exception being the Port of Texas City, which is a private operation ranking among the top 10 ports in the country in terms of cargo volume. Together these public ports accounted for 88% of the foreign cargo moving through Texas ports in Calendar Year 2003. These nine ports recorded more than 8,600 vessel calls handling this foreign trade (oceangoing vessels drafting 20 feet or more).¹

In the security-conscious post-9/11 world, great emphasis has been placed on enhancing the security of international cargo shipments through the nation's seaports. This has resulted in much discussion on how to balance economic concerns with security concerns and how to decide who should bear the attendant costs. The situation becomes even more critical when considering that between 1970 and 2002, the volume of overseas trade, 99% of which moves through U.S. ports, more than doubled, and is expected to double again by 2016. The number of twenty-foot equivalent (TEUs) shipping containers moving through U.S. ports, which were virtually non-existent in 1970, doubled between 1990 and 2000, from 15.2 to 30.4 million TEUs, and is expected to double again over the current decade.²

The dramatic increase in trade volumes has necessitated significant infrastructure enhancements and expansions at Texas ports. Over the time period of 1994-2004, the nine Texas public ports included in this study added nearly \$1 billion in assets to their books. This does not include the assets of private enterprise operating at the ports. Prior to the 9/11 attacks, the federal government's role in developing and maintaining navigation infrastructure was largely confined to dredging, constructing and maintaining locks and dams, and operating/maintaining aids to navigation. In the post-9/11 era, the federal government has begun investing in security infrastructure at the nation's ports.

Ports around the country are expressing a concern that federal investment is not great enough, as unrecoverable security-related costs have been a burden for ports, terminals, and vessel operators in the post-9/11 world. Ports on the East Coast and in the Gulf have begun to add security surcharges ranging as high as 10% on dockage and wharfage, and others are preparing to assess a variety of fees. Florida's ports have stated that prior to 9/11 the state's larger ports spent between 1.9-10% of their budgets on security. Now they expect to spend between 20 and 25%.³

Not all ports are being funded in direct proportion to the costs they must incur. Facilities that have not received grant funds are seeking MTSA 2002 compliance through lower-cost options that will not provide the same level of security as the other ports. Theoretically, security fees could become a competitive issue among ports, terminals, and carriers. In the absence of federal

¹ Source: Waterborne Commerce of the United States, Calendar Year 2003, US Army Corps of Engineers.

² American Association of Port Authorities, TEA-21 Reauthorization, Legislative Priorities Fact Sheet, April 2005. (Accessed at <http://www.aapa-ports.org/govrelations/TEA21.pdf> on 7/18/05).

³ Letter from Kurt Nagle, President, American Association of Port Authorities, to House Appropriators on FY'05 Seaport Security Grants Program Funding, May 26, 2004.

funding, ports, marine terminal operators, and vessel owners have begun to examine ways to generate funds to offset the growing cost of complying with U.S. Coast Guard regulations.

PORT SECURITY GRANT PROGRAM

Shortly after the passage of MTSA 2002, Congress began making funds available for a Port Security Grant Program. This report includes detailed information for the first four rounds of grants, and a fifth round of grant awards was announced on September 13, 2005. The grants for the first four rounds were structured to focus almost exclusively on security assessments and on investments in equipment and infrastructure. Grants were not intended to fund the ongoing maintenance of security equipment and infrastructure investments, or increases in security staffing to which seaports are now committed. In the first four rounds, approximately \$564 million was awarded to applicants.

Texas Ports received a significant amount of funding in the first four rounds. Table E-1 shows Round 1-4 awards for the nine ports included in this study (not all funds have been distributed).

Table E-1. Grant Funds Awarded to Texas Ports (Rounds 1 - 4).

Grant Funds Awarded by Port	
Port	Amount
Beaumont	\$4,332,106
Brownsville	435,400
Corpus Christi	11,808,198
Freeport	1,709,000
Galveston	6,862,406
Houston	16,980,217
Orange	325,000
Port Arthur	1,645,440
Port Lavaca	558,814
TOTAL	\$44,656,581

Five of the public Texas port authorities included in the study were eligible for Round 5 grants: Beaumont, Port Arthur, Corpus Christi, Freeport, and Houston. Grant awards were announced as this report was going to press, and four of the port authorities received funding, as shown in Table E-2. The total is 50% of the amount awarded to all Texas ports in Rounds 1 - 4.

Table E-2. Grant Funds Awarded to Texas Port Authorities—Round 5.

Grant Funds Awarded by Port	
Port	Amount
Beaumont	\$ 1,676,000
Freeport	\$ 2,657,000
Houston	\$ 14,550,908
Port Arthur	\$ 3,313,960
TOTAL	\$22,197,868

PORT FINANCES

During the study period of FY 1994-FY 2004, the nine ports included in the study added almost \$1 billion in assets to their books. This is port-owned assets only, without regard to private investment in the port facilities. The following tables show how asset acquisitions were financed by the ports during the study period. The Port of Houston's financial activity is substantially greater than any of the ports comprising the remainder of the port system; therefore, the numbers are presented on a system-wide basis, and then the Port of Houston is extracted to highlight the effect it has on the system.

Table E-3. Asset Financing of Study Ports by Source of Funds.

Sources:	All Ports	% of Total	Houston
<i>Public Financing:</i>			
General Obligation Bonds	431,375,920	43.7%	330,417,000
Grants – Non-Security	32,939,793	3.3%	17,621,000
Grants – Security	14,406,754	1.5%	3,779,000
Capital Contribution from Government	19,173,985	1.9%	
<i>User Financing:</i>			
Revenue Bonds	73,097,052	7.4%	
Loans	43,008,051	4.4%	
Reimbursements	17,536,834	1.8%	
Other Contributions	3,721,344	0.4%	
Cash & Miscellaneous	351,103,761	35.6%	163,400,000
	986,363,494	100.0%	426,300,000

Table E-4. Asset Financing of Study Ports by Source of Funds, without Houston.

Sources:	All Ports except Houston	% of Total
<i>Public Financing:</i>		
General Obligation Bonds	100,958,920	21.4%
Grants – Non-Security	15,318,793	3.3%
Grants – Security	10,627,754	2.3%
Capital Contribution from Government	19,173,985	4.1%
<i>User Financing:</i>		
Revenue Bonds	73,097,052	15.5%
Loans	43,008,051	9.1%
Reimbursements	17,536,834	3.7%
Other Contributions	3,721,344	0.8%
Cash & Miscellaneous	187,703,761	39.8%
	471,146,494	100.0%

On a system-wide basis, general obligation bonds are the primary source of funds for infrastructure improvements, followed by earnings (“Cash & Miscellaneous”). Revenue bonds are a distant third. However, the effect that the Port of Houston has on the system-wide totals is significant. Without the Port of Houston, the numbers change dramatically. For the rest of the system, earnings are the primary source of funding, with general obligation bonds placing second, and revenue bonds coming in at a not-so-distant third.

As can be seen in Table E-5, there is significant variability in the profitability of the various ports. Operating Income ranges from 26% of Operating Revenues down to a loss of 52%, with a system-wide Operating Income of 7%. However, in terms of cash flow, only one port failed to produce a positive cash flow during the study period.

Table E-5. Operating Income and Cash Flow, FY 1994-FY 2004.

Port	Operating Revenue	Operating Income	Cash Flow from Operations
Beaumont	73,834,043	(15,807,016)	3,240,858
Brownsville	80,680,820	(1,095,227)	32,095,994
Corpus Christi	281,647,334	13,699,610	71,143,178
Freeport	53,567,320	(1,281,401)	12,080,202
Galveston	130,146,743	22,296,640	47,451,621
Houston	1,082,599,000	108,035,000	367,126,000
Orange	14,093,712	751,767	751,767
Port Arthur	25,463,566	(13,138,503)	(7,567,557)
Port Lavaca	21,291,066	5,555,417	5,555,417
System-Wide:	1,626,510,604	108,526,321	487,237,480

Operating Income provides a view of how well the port does financially without any income from taxation or subsidies. The greater the operating loss, the greater the need for tax revenues or some type of subsidy. The following table shows the level of dependency on taxes at each port:

Table E-6. Tax Revenues Compared to Operating Revenues.

Comparison of Tax Revenues to Operating Revenues		
Port	Total Taxes	Taxes as % of Operating Revenues*
Beaumont	49,289,788	66.8%
Brownsville	30,625,397	42.9%
Corpus Christi	18,644,465	6.6%
Freeport	58,914,023	110.0%
Galveston	N/A	N/A
Houston	288,237,000	30.5%
Orange	5,593,331	39.7%
Port Arthur	39,656,721	155.7%
Port Lavaca	1,916,214	9.0%

*100% indicates that taxes are equal to operating revenues

While the Port Security Grant program has enabled ports to install and construct security infrastructure that might otherwise be unaffordable, it also adds to the asset base that a port must maintain and operate. Some port officials believe the recurring costs for system operation and maintenance could be in the range of 10% to 15% of acquisition costs.⁴

Table E-7 provides a total of estimated future security expenses (in 2004 dollars) for the nine ports included in the study.

Table E-7. System-wide Estimated Future Security Expenses.

Future costs associated with grant-funded security projects (All Ports)					
Year	Capital Expense	Annual Cap. Replacement Allowance	Marginal M&O Increase	Security Force Adjustments	Total Forecasted Increases
1		\$5,462,838	\$4,085,135	\$5,706,144	\$15,242,117
2		\$5,462,838	\$4,085,135	\$5,706,144	\$15,242,117
3		\$5,462,838	\$4,085,135	\$5,706,144	\$15,242,117
4		\$5,462,838	\$4,085,135	\$5,706,144	\$15,242,117
5		\$5,462,838	\$4,085,135	\$5,706,144	\$15,242,117
6		\$5,462,838	\$4,085,135	\$5,706,144	\$15,242,117
7	\$31,321,824	\$5,462,838	\$4,085,135	\$5,706,144	\$15,242,117
8		\$5,462,838	\$4,085,135	\$5,706,144	\$15,242,117
9		\$5,462,838	\$4,085,135	\$5,706,144	\$15,242,117
10	\$9,882,938	\$5,462,838	\$4,085,135	\$5,706,144	\$15,242,117
TOTAL	\$41,204,762	\$54,628,380	\$40,851,350	\$57,061,440	\$152,421,170

The raw numbers alone do not provide the context necessary to evaluate the potential impact of security expenses on port finances. Table E-8 shows how much the increase in critical assets and security staffing could affect the finances of each port. It compares the estimated future expenses as defined above to Operating Revenues.

⁴ Testimony of Noel K. Cunningham, Director of Operations and Emergency Management Port of Los Angeles, Los Angeles, California for The American Association of Port Authorities, before the Subcommittee on Coast Guard and Maritime Transportation House Transportation and Infrastructure Committee, June 9, 2004.

Table E-8. Projected Security Expense Increases as % of Operating Revenues.

Security Expense Increases as % of Operating Revenues (FY 2004)			
Port	Annual Expense Increase	Operating Revenues FY 2004	Security Expense as % of Operating Revenue
Beaumont	\$948,818	\$13,045,212	7.3%
Brownsville	\$487,814	\$9,365,420	5.2%
Corpus Christi	\$3,781,524	\$28,371,297	13.3%
Freeport	\$373,000	\$6,570,514	5.7%
Galveston	\$1,586,549	\$14,474,565	11.0%
Houston	\$7,241,187	\$136,813,000	5.3%
Orange	\$232,857	\$1,365,890	17.0%
Port Arthur	\$417,580	\$4,639,655	9.0%
Port Lavaca	\$184,788	\$2,595,466	7.1%
TOTALS	\$15,254,117	\$217,241,019	7.0%

Security expenses as a percent of operating revenues range from 5.2% to 17.0%. System-wide the average is 7.0% of operating revenues.

SECURITY FEES

The idea of levying fees or surcharges to recover security-related costs is beginning to take hold across North America, but especially in the Gulf. In the U.S., some legislative proposals call for a federal security fee on cargo. Ports have been very aggressively resisting any Federal security fees on maritime cargo. Their position is that if Congress must earmark funds for maritime security, the existing fees on maritime commerce should be used, not a new additional tax.

However, the Gulf Seaports Marine Terminal Conference (GMSTC), to which eight of the nine study ports belong, has taken action to impose security fees at its member ports. The membership consists of 20 U.S. Gulf public port authorities. The agreed-upon fee structure is:

Vessels: 5% of total dockage assessed per port call

Cargo:

- Breakbulk: 10 cents per ton
- Dry bulk: 2 cents per ton
- Liquid bulk: 2 cents per ton
- Containers: \$2 per box
- Vehicles: TBD
- Passengers: \$1 per passenger

The container assessment will be billed to the carrier and not the cargo interest in accordance with the practice that has been established at other ports.

Of the eight Texas ports that are members, seven implemented the fee on April 1, 2005. The Port of Corpus Christi Authority took independent action apart from the GSMTC. Corpus Christi's fee went into effect August 1, 2004. It consists of a 10% surcharge on all dockage, wharfage, and Terminal Use rates. On January 1, 2005, the surcharge was automatically increased to 10.5% and will continue to increase by 0.5% per year until it reaches 12%.

CONCLUSIONS AND OBSERVATIONS

Several policy concerns exist that have not yet been resolved at the federal level:

- According to the Inspector General's reports, funding is not being allocated based on risk or vulnerability. The question of how best to allocate limited funds in such a way as to mitigate risk to the maximum extent possible is still being debated.
- A potential unintended consequence of the historical manner of distributing funds is that a competitive imbalance could be created.
- Another potential unintended consequence is that ports will have uneven levels of security. This is not necessarily a problem, unless some ports fail to reach a minimum level of security. The possibility exists that as some port complexes are "hardened," terrorists could seek entry ports that are less rigid.
- There will likely continue to be an ongoing debate about how much financial responsibility the federal government should assume for security infrastructure. Currently, the federal government takes the position that homeland security is a shared effort and financial responsibility. Ports take the position that terrorist threats are a national security concern, and the federal government should take responsibility for dealing with them.
- The financial effects are just now beginning to solidify. As more security projects are completed, the financial responsibility of the ports will rise.
- The Port Security Grant Program has helped ports get their basic security infrastructure established. However, it is not clear who will pay to replace worn-out or technically obsolete equipment and infrastructure in the future. Until this question is resolved, ports will have to accumulate the funds to deal with this issue.
- With the exception of the Port of Houston, Texas ports rely principally on internally generated cash to finance their asset acquisitions. Six of the nine ports already rely on taxes for a significant portion of their cash flow. It will be difficult to raise taxes to pay for security measures. This means that it will be necessary to institute significant security fees or rely more on private business to assist with security.
- As a whole, Texas ports appear to be in a stable financial position. However, security expenses could consume anywhere from 5.2% to 17.0% of operating revenue at a given port. This will force a slow-down to some degree of infrastructure development until a funding stream can be generated to offset this increased expense.

- Several potential new financing schemes are the subject of public debate at this time. They include various port charges, DHS appropriations, earmarking of customs fees, and federal security fees.

It will be important for Texas ports to find ways to merge operational and security practices and information management in such a way that efficiencies and cost reductions can be realized in the operations of the port. While some security measures are strictly overhead expenses, many operational best practices are also good security practices (and vice versa). Implementing such practices and using data for a variety of purposes could very well augment the financial stability of Texas ports.

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DISCLAIMER

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CHAPTER 1 – INTRODUCTION

BACKGROUND

The State of Texas has 367 miles of coastline and 29 ports, ranging from some of the busiest freight transportation hubs in the nation to smaller recreational and fishing harbors. Most of these ports are managed by public port authorities, the most notable exception being the Port of Texas City, which is a private operation ranking among the top 10 ports in the country in terms of cargo volume. Large portions of port-owned real estate are often leased to the private sector with the port authority operating as a landlord. In addition, many privately owned and operated terminals exist within port zones independent of the local port authorities. Businesses operating in the port area include terminal operators, ocean carriers, trucking companies, freight forwarders, brokers, and food servicing companies.

In the security-conscious post-9/11 world, great emphasis has been placed on enhancing the security of international cargo shipments through the nation's seaports. This has resulted in much discussion on how to balance economic concerns with security concerns and how to decide who should bear the attendant costs.

A large measure of the country's unprecedented growth is due to the increased productivity of the American economy and foreign trade. U.S. Gross Domestic Product (GDP) is dramatically more dependent on international trade than at any earlier time. For the United States alone, in 2004 the value of trade in goods and services (imports and exports), including earnings and payments on investment, was 31.5% of the value of U.S. GDP versus 13% in 1970, an increase of 142%.⁵ Between 1970 and 2002, the volume of overseas trade, 99% of which moves through U.S. ports, more than doubled, and is expected to double again by 2016. The number of twenty-foot equivalent (TEUs) shipping containers moving through U.S. ports, which were virtually non-existent in 1970, doubled between 1990 and 2000, from 15.2 to 30.4 million TEUs, and is expected to double again over the current decade.⁶ To remain competitive in the global marketplace, U.S. businesses must have an efficient and reliable transportation system.

Additionally, ports play a critical role in our nation's defense. Nearly all of the military equipment sent to the Persian Gulf in 2003 was loaded in commercial U.S. seaports (rather than coming from Europe or U.S. military ports).

The dramatic increase in trade volumes has necessitated significant infrastructure enhancements and expansions at Texas ports. Over the time period of 1994-2004, Texas ports added nearly \$1 billion in assets to their books. This does not include the assets of private enterprise operating at the ports. Many ports have expressed a concern that they will be forced to spend money on security instead of capital improvements, likely resulting in a system unable to handle the

⁵ The 2005 Trade Policy Agenda and 2004 Annual Report of the President of the United States on the Trade Agreements Program, submitted to the Congress pursuant to Section 163 of the Trade Act of 1974, as amended (19 U.S.C. 2213) by the Office of the United States Trade Representative (USTR), March 2005.

⁶ American Association of Port Authorities, TEA-21 Reauthorization, Legislative Priorities Fact Sheet, April 2005. (Accessed at <http://www.aapa-ports.org/govrelations/TEA21.pdf> on 7/18/05).

expected growth in trade volumes. The Port of Miami claims that this is precisely what has happened there.⁷

Any level of funding will require risk-management decisions. Government officials are quick to point out that security is not just a government responsibility. The private sector—or more precisely, non-federal entities—has to pay its share.

Decisions on what security measures to implement are made within the framework of the Marine Transportation Security Act of 2002 (MTSA 2002) and the resulting regulations issued by the U.S. Coast Guard. Additionally, each Coast Guard Captain of the Port may require security measures he deems necessary to ensure the safety and security of the port. Facilities not addressing Coast Guard security concerns may have their operations suspended or be subjected to civil penalties.

Prior to the 9/11 attacks, the federal government's role in developing and maintaining navigation infrastructure was largely confined to dredging, constructing and maintaining locks and dams, and operating/maintaining aids to navigation. In the post-9/11 era, the government has begun investing in security infrastructure at the nation's ports. Ports around the country are expressing a concern that this investment is not high enough. There has been an almost exclusive focus on funding security at the nation's airports, while seaports across the country have not received the same level of federal support for security improvements. Many lawmakers and maritime officials believe that the nation's port system is the weak link in homeland security.

Unrecoverable security-related costs have been a burden for ports, terminals, and vessel operators in the post-9/11 world. Ports on the East Coast and in the Gulf have begun to add security surcharges ranging as high as 10% on dockage and wharfage, and others are preparing to assess a variety of fees. Florida's ports have stated that prior to 9/11 the state's larger ports spent between 1.9-10% of their budgets on security. Now they are expected to spend between 20 and 25%.⁸

Not all ports are being funded in direct proportion to the costs they must incur. Facilities that have not received grant funds are seeking MTSA 2002 compliance through lower-cost options that will not provide the same level of security as the other ports. Theoretically, security fees could become a competitive issue among ports, terminals, and carriers. In the absence of federal funding, ports, marine terminal operators and vessel owners have begun to examine ways to generate funds to offset the growing cost of complying with U.S. Coast Guard regulations.

⁷ According to Marine News, "the Port of Miami has absorbed \$6 million in costs annually for the past three years to pay for additional security operating costs, except for two grants totaling \$4 million. The additional expenses have caused the port to put on hold such projects as road improvements, bulkhead repairs, and construction of an intermodal container transfer facility." (Marine News, Feb 05, p. 9, "Criticism of Port Security Grant Program 'Misses the Mark'")

⁸ Letter from Kurt Nagle, President, American Association of Port Authorities, to House Appropriators on FY 05 Seaport Security Grants Program Funding, May 26, 2004.

STUDY OBJECTIVES

The purpose of this research project is to provide an overview of the financial aspects of port infrastructure development and the implementation of new security measures. This information will provide a framework within which to evaluate the financial effect of prior and proposed security measures at Texas ports.

The objectives will be met by:

- examining the cost and sources of funding for prior infrastructure development,
- evaluating the financial condition of Texas ports,
- documenting what has transpired to date within the Port Security Grant Program,
- estimating the potential financial impact of security measures, and
- identifying key policy issues that are unresolved at this time.

RESEARCH APPROACH

This report focuses on Texas public port authorities that are currently active in international trade. This includes the nine largest ports managed by public port authorities in the State of Texas. These ports include:

- Port of Beaumont
- Port of Brownsville
- Port of Corpus Christi
- Port Freeport
- Port of Galveston
- Port of Houston
- Port of Orange
- Port of Port Arthur
- Port of Port Lavaca

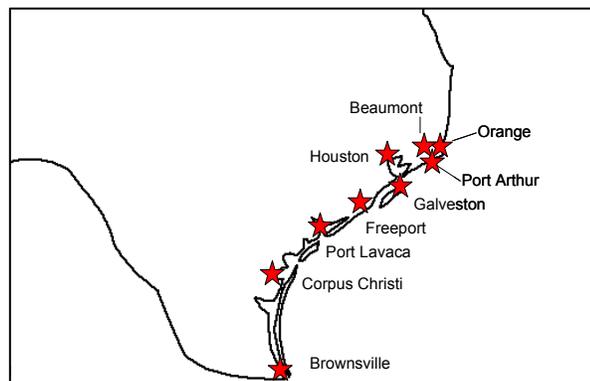


Figure 1. Texas Ports.

Brief descriptions of each port are found in Appendix A, “Port Profiles.”

Together these ports accounted for 88% of the foreign cargo moving through Texas ports in Calendar Year 2003. The remaining 12% flowed through the Port of Texas City. These nine ports recorded more than 8,600 vessel calls handling this foreign trade (oceangoing vessels drafting 20 feet or more).⁹

⁹ Source: Waterborne Commerce of the United States, Calendar Year 2003, U.S. Army Corps of Engineers.

Table 1. Foreign Tonnage and Vessel Trips by Port.

Port	Foreign Tonnage	Vessel Trips*
Beaumont	68,787,271	1,180
Brownsville	2,314,661	140
Corpus Christi	53,394,091	1,078
Freeport	25,100,661	768
Galveston	3,788,316	429
Houston	126,893,405	4,340
Orange	10,000	2
Port Arthur	18,466,795	386
Port Lavaca	8,024,041	280
Total	306,779,241	8,603
State Total	350,172,000	

*Vessel trips are for inbound vessels drafting 20 ft or more

The research approach of the Texas Transportation Institute (TTI) was to employ its unique contacts with Texas ports to facilitate the collection of information on financial history, investments in assets, port security grants, and port security expenses. Much of the financial and investment data was gleaned from audited financial statements. Security grant information was obtained from various sources. Additionally, information regarding the effect of the new security paradigm on port finances was obtained from personal interviews with port officials.

This report analyzes relevant financial trends for Texas ports and how they might be affected by the new security paradigm. Certain policy issues and concerns that will need to be addressed by state and national officials are highlighted.

ORGANIZATION OF THE REPORT

This report is organized into six chapters, including this introduction.

Chapter 1 is the introduction to the report. It provides background material, outlines the study objectives, and describes the approach to research.

Chapter 2 provides a history of what has happened to date in the Port Security Grant Program. It also discusses proposed changes to the program.

Chapter 3 provides information on port finances. It describes the financial performance of the ports during the study period. It examines the funding approaches used to finance asset acquisition and construction, and it analyzes the profitability of Texas ports in general terms.

Chapter 4 presents information related to security-related costs. It examines the potential effect of these new security-related expenses on port finances. The information presented in this chapter is based on federally funded security measures included in Rounds 1 - 4; Round 5 award information was not available at the time of this assessment.

Chapter 5 looks at the security fees that ports are now imposing on their customers. It provides a review of the situation throughout the North American continent, and then the focus is placed on what Texas ports are doing.

Chapter 6 presents some conclusions and policy concerns that resulted from this analysis.

CHAPTER 2 – PORT SECURITY GRANT PROGRAM

Shortly after the passage of MTSA 2002, Congress began making funds available for a Port Security Grant Program. This report includes detailed information for the first four rounds of grants, and a fifth round of grant awards was announced on September 13, 2005. The grants for the first four rounds were structured to focus almost exclusively on security assessments and on investments in equipment and infrastructure. Grants were not intended to fund the ongoing maintenance of security equipment and infrastructure investments, or increases in security staffing to which seaports are now committed.

The following table summarizes some of the key features of the first four rounds. The details of each of these rounds, plus the fifth round, are provided in the following sections.

Table 2. Summary of Port Security Grant Program—Rounds 1 - 4.

Program	Lead Agency	Amount Awarded	Characteristics
Port Security Grant Program	TSA* (USCG and MARAD participate)	FY 2002: 1 st round - \$92 million FY 2003: 2 nd round - \$169 million FY 2004: 3 rd round - \$179 million 4 th round - \$49 million	Competitive grant award process. Intended for enhanced operational and facility security at ports, port facilities, and vessels.
Urban Area Security Initiative	ODP*	FY 2003: \$75 million	Discretionary for large high-threat urban areas. Separate from its basic UASI program which provided formula grants to 50 urban areas for equipment, training, planning, exercise, operational needs, and critical infrastructure protection, ODP awarded port security grants to 14 high risk port areas. ODP collaborated with TSA and the Office of State and Local Government Coordination to identify the eligible port areas. TSA provided ODP with applications from its previously reviewed pool of applications.
MTSA Grant Program (unfunded)	MARAD	\$0	Fair and equitable allocation of grants. Intended to offset the cost of implementing MTSA mandated facility and area maritime security plans including equipment, personnel, and other security-related costs.

*TSA = Transportation Security Administration

USCG = US Coast Guard

MARAD = Maritime Administration (Dept. of Transportation)

ODP = Office of Domestic Preparedness (Dept. of Homeland Security)

The Office of the Inspector General in the Department of Homeland Security (DHS) provided the following summary showing the types of projects for which grants were awarded in Rounds 1 through 3.

Table 3. Summary of Port Security Grant Projects by Number of Projects and Proportion of Funding.¹⁰

Project Type	Round 1			
	Projects		Funding	
	No.	%	\$	%
Assessment	25	17.36%	\$6,515,000	6.94%
Proof of Concept	17	11.81%	\$10,024,757	10.68%
Access Controls	21	14.58%	\$21,867,672	23.29%
Communications	2	1.39%	\$390,000	0.42%
Physical Enhancements	43	29.86%	\$21,602,983	23.01%
Surveillance	29	20.14%	\$29,129,389	31.03%
Vessel/Vehicle	7	4.86%	4,343,947	4.63%
Totals:	144	100.0%	\$93,873,748	100.0%
Round 2				
Assessment	21	5.36%	\$1,243,483	0.74%
Proof of Concept	2	0.51%	\$1,469,294	0.87%
Access Controls	103	26.28%	\$36,234,437	21.45%
Communications	8	2.04%	\$10,711,330	6.34%
Physical Enhancements	127	32.40%	\$80,144,671	47.44%
Surveillance	113	28.83%	\$34,832,149	20.62%
Vessel/Vehicle	18	4.59%	\$4,288,772	2.54%
Totals:	392	100.0%	\$168,924,136	100.0%
Round 3				
Assessment	0	0.00%	\$0	0.00%
Proof of Concept	0	0.00%	\$0	0.00%
Access Controls	84	19.00%	\$46,229,529	25.82%
Communications	20	4.52%	\$11,166,836	6.24%
Physical Enhancements	170	38.46%	\$70,493,696	39.38%
Surveillance	151	34.16%	\$47,238,899	26.39%
Vessel/Vehicle	17	3.85%	3,896,940	2.18%
Totals:	442	100.0%	\$179,025,900	100.0%
Rounds 1, 2, & 3 Combined				
Assessment	46	4.70%	\$7,758,483	1.76%
Proof of Concept	19	1.94%	\$11,494,051	2.60%
Access Controls	208	21.27%	\$104,331,638	23.61%
Communications	30	3.07%	\$22,268,166	5.04%
Physical Enhancements	340	34.76%	\$172,241,350	38.98%
Surveillance	293	29.96%	\$111,200,437	25.17%
Vessel/Vehicle	42	4.29%	\$12,529,659	2.84%
Totals:	978	100.0%	\$441,823,784	100.0%

Source: Review of the Port Security Grant Program, Office of Inspector General, Office of Inspections, Evaluations, & Special Reviews, Department of Homeland Security, OIG-05-10, January 2005.

¹⁰ Information provided by TSA on December 19, 2003. Total projects and funding amounts may differ from amounts in award announcements due to negotiation of grants. Aggregated amounts are based on the “not-to-exceed” amount for individual projects at the time of the award. Assessment and Proof of Concept Projects were ineligible in Round Three.

Project Type Descriptions

- An *Assessment* ascertains vulnerabilities of physical or operational security of a port, multiple terminals, terminal or vessel (commuter or ferry service), and identifies mitigation strategies.
- *Proof of Concept* projects are pilot security enhancement projects whose feasibility or implementation has potential applicability across the broadest possible range of facilities or operations.
- *Access Controls* include, but are not limited to, identification systems and access gates.
- *Communications* include, but are not limited to, communication systems, command and control systems, and computer systems.
- *Physical Enhancements* include, but are not limited to, fencing, physical barriers, and screening and detection equipment.
- *Surveillance* includes, but is not limited to, cameras, closed circuit television (CCTV), and lighting.
- *Vessel/Vehicle* funding was awarded for patrol-related activities. Funding for vehicles was awarded in round one only.

The Office of Inspector General (DHS) released a report in January 2005 that was somewhat critical of the Port Security Grant Program, especially in two areas: (1) distribution of funds for political purposes rather than addressing risks, and (2) excessive delays in distributing and spending grant funds for their intended purposes. According to the audit report, hundreds of thousands of dollars were invested in redundant lighting systems and unnecessary technical equipment.

According to the Inspector General, after three rounds of the Port Security Grant Program, recipients spent only a small portion of the entire amount awarded. Of the \$515 million awarded between June 2002 and December 2003, including \$75 million provided under the Office for Domestic Preparedness's (ODP's) Urban Area Security Initiative (UASI), grant recipients had expended only \$106.9 million, or 21% of total program awards as of September 30, 2004. The DHS requires that the grant money be spent within a year of the award, but few of the recipients met this provision, according to the report. As a result, the majority of projects have not been completed.

The report also questioned whether grants for small projects in resort areas and remote locations should have been considered as critical as larger projects at ports that are more vital to the national economy. The report indicated that the money was intentionally being distributed as widely as possible across the country rather than focusing on locations that intelligence reports suggested were most likely to be targets.

The Inspector General goes on to state that the program has not yet achieved its intended results in the form of actual improvements to port security.

As a result of the report, the Port Security Grant Program was restructured for Round 5. The following sections describe each of the five rounds. The change in Round 5 is readily apparent.

The table below summarizes the status of TSA funds as of September 22, 2004, and ODP funds as of September 30, 2004.

Table 4. Status of Port Security Grant Funds.

Round	Date Announced	Total Available (Authorized)	Date Funds Awarded	Total Awarded	Total Obligated	Expended	Balance
1	02/28/02	\$92,022,239	06/17/02	\$92,033,239	\$92,022,239	\$56,012,075	\$36,010,164
2	01/14/03	\$169,142,815	06/03/03	\$169,142,815	\$167,163,470	\$29,824,262	\$137,339,208
ODP	05/14/03	\$75,000,000	9/18-12/10/03	\$75,000,000	\$16,646,150	\$13,843,476	\$2,802,674
3	06/21/03	\$178,925,255	12/10/03	\$178,860,070	\$178,489,664	\$7,239,342	\$171,250,322
4	05/05/04	\$49,500,000	09/13/04	\$49,429,867			
Totals		\$564,645,212		\$564,465,991	\$454,321,523	\$106,919,155	\$347,402,368

Source: Review of the Port Security Grant Program, Office of Inspector General, Office of Inspections, Evaluations, & Special Reviews, Department of Homeland Security, OIG-05-10, January 2005.

The nine Texas ports included in this study received a significant amount of funding in the first four rounds. Table 5 shows how much of each round was allocated to the ports included in the study.

Table 5. Grant Funds Received by Texas Ports by Round (Rounds 1 - 4).

Grants Received by Round	
Round	Amount
Round 1	\$6,329,483
Round 2/TSA	\$10,726,637
Round 2/ODP	\$5,737,047
Round 3	\$11,169,950
Round 4	\$7,407,032
Other	\$3,286,432
TOTAL	\$44,656,581

Table 6 shows the amount that each port has been awarded to date (not all funds have yet been distributed).

Table 6. Grant Funds Awarded to Texas Ports (Rounds 1 - 4).

Grant Funds Awarded by Port	
Port	Amount
Beaumont	\$4,332,106
Brownsville	\$435,400
Corpus Christi	\$11,808,198
Freeport	\$1,709,000
Galveston	\$6,862,406
Houston	\$16,980,217
Orange	\$325,000
Port Arthur	\$1,645,440
Port Lavaca	\$558,814
TOTAL	\$44,656,581

Round 1

Round 1 grants were awarded on June 17, 2002. Grants in Round 1 were to be used for security assessments and for the implementation of measures once the assessments were performed. The Conference Report for the Fiscal Year 2002 Supplemental Appropriations Act also stipulated that grants could only be used for additional security activities not currently being performed at the ports. MARAD and the U.S. Coast Guard (USCG) administered the program on behalf of TSA.

The funding level was set at \$92.3 million. Funds were split as follows:

- \$78 million to fund enhanced facility and operational security (including but not limited to facility access control, physical security, cargo security and passenger security);
- \$5 million for security assessments enabling ports and terminals to evaluate vulnerabilities and identify mitigation strategies; and
- \$9.3 million to fund “proof-of-concept” projects exploring the use of new technology, such as electronic seals, vessel tracking, and electronic notification of vessel arrivals.

Funds were awarded both to port authorities and private terminals. According to information released by DHS, 857 project applications totaling \$691.5 million were received. Initial awards for 79 grants to fund 144 individual projects at 51 ports were made with available funding, amounting to 13.3% of the total requested. The projects included 24 security assessment projects, 14 proof-of-concept projects, and 106 facility and operation security enhancement projects.¹¹

¹¹ Review of the Port Security Grant Program, Office of Inspector General, Office of Inspections, Evaluations, & Special Reviews, Department of Homeland Security, OIG-05-10, January 2005.

Round 2

Round 2 grants were announced on June 12, 2003. Out of a total of \$996 million in applications, a total of \$169,055,136 was awarded to 199 state and local governments and private companies (17%). TSA received 1,112 applications. Applicants were required to provide a copy of their port or terminal security assessment along with their grant application. Awards were made for 392 projects, 15% of which went to refineries, tank terminals, and pipelines.¹²

In addition to the \$169 million awarded by TSA in Round Two, ODP provided \$75 million under the Urban Area Strategic Initiative (UASI) program to 49 applicants for 86 port security projects. Funds were distributed to cover recent infrastructure security protective measures, security enhancements, training, exercises, equipment, planning, and information sharing. Allowable uses of funds for the ports included, but were not limited to, operational activities conducted during the orange alert from January 2003 through April 2003.

The UASI program, separate and distinct from TSA's competitive grant program, provides discretionary grants for high-density and high-threat urban areas. UASI grants typically address the equipment, training, planning, and exercise needs of these areas. Prior to this, the UASI had not been used for port security grants. Unlike TSA, ODP did not use a competitive grant award process. Rather, in working with TSA and the Office of State and Local Government Coordination (OSLGC), ODP utilized a risk-based process to identify eligible port areas and grant award amounts even before applications were submitted. While ODP did not use the same type of grant award process, ODP did rely on TSA to forward unfunded project applications from TSA's second round of grants. ODP then made grant awards for its projects from these applications.

Round 3

In Round 3, preference was given to regulated facilities and vessels that were already required to have security assessments in place. TSA announced that 1,085 applications were received for \$987 million in projects. The grants were designated for mitigating identified vulnerabilities rather than developing plans. As in previous rounds, recurring costs for personnel and operations and maintenance were not eligible for funding.

On December 10, 2003, TSA announced the award of \$179,025,900 for security planning and projects to improve dockside and perimeter security (18.1% of the amount requested). This included 442 projects in 326 locations to 235 applicant organizations.¹³ Of these 442 projects, 84 were for access control (\$46 million); 20 were for communications (\$11 million); 170 were

¹² Review of the Port Security Grant Program, Office of Inspector General, Office of Inspections, Evaluations, & Special Reviews, Department of Homeland Security, OIG-05-10, January 2005; and "Big grant to oil firm shrouded in secrecy," Jennifer Lin, Inquirer Staff Reporter, The Philadelphia Inquirer, June 19, 2003, accessed at <http://foi.missouri.edu/federal/foia/biggrant.html>.

¹³ Review of the Port Security Grant Program, Office of Inspector General, Office of Inspections, Evaluations, & Special Reviews, Department of Homeland Security, OIG-05-10, January 2005.

for physical enhancement projects (\$70 million); 151 were for surveillance (\$47 million); and 17 were for vessel projects (\$4 million).¹⁴

In addition to Round 3 grant money, the Port of Houston also received \$1,146,432 million under ODP's Urban Area Security Initiative for hazardous materials (HAZMAT) equipment and interoperability communications links (award date: December 17, 2003). Additionally, on August 12, 2004, the governor's office awarded \$1.2 million to the Port for a variety of access control equipment.

Round 4

In Round 4, \$49,429,867 (7.7% of the total requested) was awarded to 154 projects for 120 recipients.¹⁵ The total requested was \$643,884,252. The award was announced on September 13, 2004.

Eligibility was restricted to "critical national seaports" as defined in the Request for Applications. In addition, applicants were required to be (1) federally regulated public and private ports, terminals, U.S. inspected passenger vessels, or ferries; or (2) consortia composed of local stakeholder groups (i.e., river groups, ports, and terminal associations) representing federally regulated ports, terminals, U.S. inspected passenger vessels, or ferries. Applicants were also required to have already completed a security assessment and to tie the security enhancements to the assessment.¹⁶

Program management for the Port Security Grant Program transitioned to the ODP effective May 16, 2004. However, TSA issued Round 4 and was given responsibility for administering existing contracts until closeout.

On May 1, 2005, ODP once again made an additional award to the Port of Houston under its UASI program in the amount of \$212,000 for IT system hardening.

Round 5

On May 13, 2005, the DHS Office of State and Local Government Coordination and Preparedness (OSLGC) announced that \$140,857,128 was available for the FY 2005 Port Security Program, as authorized by the DHS Appropriations Act of 2005. June 10th was the final day for eligible ports to apply. Information released from DHS shows that facilities at 66 port areas made 280 applications for 580 projects, with a total assistance request level of \$467,794,618.90. The number of applications and projects is significantly less than in past years, most likely due to the limitation of eligibility and a new 50% cost share requirement for

¹⁴ Catalog of Federal Domestic Assistance, 97.056 Port Security Grant Program for Critical National Seaports, Accessed on September 28, 2004 at <http://www.cfda.gov>.

¹⁵ Review of the Port Security Grant Program, Office of Inspector General, Office of Inspections, Evaluations, & Special Reviews, Department of Homeland Security, OIG-05-10, January 2005.

¹⁶ Catalog of Federal Domestic Assistance, 97.056 Port Security Grant Program for Critical National Seaports, Accessed on September 28, 2004 at <http://www.cfda.gov>.

the private sector. This should result, however, in a success rate of 30%, which is higher than past rounds (which have ranged from 8-18%).

A priority for the Port Security Grant Program in FY 2005 is risk-based distribution of funding. Using a new risk-based formula to allocate funds taking into account threat, vulnerability, and consequence, the nation's 129 largest ports (as reported by the U.S. Army Corps of Engineers) were evaluated, and 66 port areas were identified as eligible applicants for inclusion in the Fiscal Year 05 program. Grants will be awarded through a competitive process. For purposes of the FY 2005 PSG Program, port areas are defined as the land area adjacent to, and within one mile of, the waterway that contains the federal navigation channel for a particular port.

Round 5 was structured with a different focus from previous rounds. The FY 2005 program focuses on protection against small craft, underwater attacks, and vehicle borne improvised explosive devices (IEDs); enhanced explosives detection capabilities for the owners/operators of vehicle ferries and associated facilities; and facility security enhancements in the nation's highest risk ports. According to program information published by DHS, this was done to directly address two national priorities set by the Department: 1) Chemical, Biological, Radiological, Nuclear, and Explosive (CBRNE) detection and response capabilities; and 2) National Infrastructure Protection Plan (NIPP) implementation.¹⁷

The following table identifies the port areas in which grant activity may take place, although inclusion on the list is not a guarantee that any grants will be awarded. The port areas are listed alphabetically – no additional significance should be attributed to this ordering.

¹⁷ Fiscal Year 2005 Port Security Grant Program, Program Guidelines and Application Kit, U.S. Department of Homeland Security, Office of State and Local Government Coordination and Preparedness, Office for Domestic Preparedness, Accessed at <http://www.ojp.usdoj.gov/odp/docs/fy2005psg.pdf>.

Table 7. Eligible Port Areas for Round 5 Port Security Grants.

Eligible Port Areas	
Albany, NY	Norfolk Harbor, VA
Anchorage, AK	Oakland, CA
Baltimore, MD	Pascagoula, MS
Baton Rouge, LA	Pensacola, FL
Beaumont, TX	Philadelphia, PA
Boston, MA	Pittsburgh, PA
Bridgeport, CT	Plaquemines, LA
Camden, NJ	Port Arthur, TX
Charleston, SC	Port Canaveral, FL
Chattanooga, TN	Port Everglades, FL
Cincinnati, OH	Port Hueneme, CA
Corpus Christi, TX	Portland, ME
Freeport, TX	Portland, OR
Greenville, MS	Portsmouth, NH
Honolulu, HI	Providence, RI
Houston, TX	Richmond, CA
Huntington, WV	San Diego, CA
Jacksonville, FL	San Francisco, CA
Kansas City, MO	Savannah, GA
Lake Charles, LA	Seattle, WA
Long Beach, CA	South Louisiana, LA
Los Angeles, CA	St. Louis, MO
Louisville, KY	St. Paul, MN
Memphis, TN	Tacoma, WA
Miami, FL	Tampa, FL
Milwaukee, WI	Texas City, TX
Minneapolis, MN	Tulsa, OK
Mobile, AL	Valdez, AK
Nashville, TN	Vancouver, WA
New Haven, CT	Vicksburg, MS
New Orleans, LA	Victoria, TX
Newport News, VA	Wilmington, DE
New York/New Jersey	Wilmington, NC

Within the eligible port areas, applicants must be:

- owners/operators of federally regulated ports, terminals, facilities, U.S. inspected passenger vessels, or ferries as defined in the Maritime Transportation Security Act (MTSA) 33 CFR Parts 101, 104, and 105;
- port authorities or other State and local agencies that provide layered security protection to federally regulated facilities; or,

- consortia composed of local stakeholder groups (i.e., river groups, ports, and terminal associations) representing federally regulated ports, terminals, U.S. inspected passenger vessels, or ferries.

The Department determined that private companies were eligible to apply for funding under the FY 2005 PSG Program. However, applications from private entities were required to demonstrate a cash match of at least 50% of the total amount requested in Federal funding in order to be considered. Applications were not allowed to be submitted on behalf of a private company by a public entity and sub-awarded back to the private company to avoid the cash match requirement. Furthermore, consortia composed of local stakeholder groups representing federally regulated ports, terminals, U.S. inspected passenger vessels, or ferries were considered private entities and were required to demonstrate the 50% cash match. The public sector, including port authorities, was not required to have a match; however, all grants that provide some sort of match received a higher ranking.

The Department specified certain projects and costs considered *ineligible* for award consideration:

- ferry systems participating in the FY 2005 Transit Security Grant Program (TSGP) cannot apply for funding for projects already under consideration for TSGP funding;
- the development of risk/vulnerability assessment models;
- projects that fund vulnerability security assessments;
- projects in which federal agencies are the beneficiary or that enhance federal property;
- projects which study technology development for security of national or international cargo supply chains (e.g., e-seals, smart containers, container tracking, container intrusion detection devices);
- proof-of-concept projects;
- projects involving training and exercises;
- projects that do not provide a compelling security benefit (primarily economic or safety vs. security);
- projects that duplicate capabilities being provided by the Federal government (vessel traffic systems, etc.);
- proposals in which there is a real or apparent conflict of interest;
- personnel costs;
- operating expenses;
- management and administrative costs; and
- reimbursement of pre-award security expenses.

As this report was going to press, DHS released its awards for Round 5. According to a DHS press release dated September 13, 2005, \$141,969,967.61 in Round 5 grants was awarded,¹⁸ and

¹⁸ U.S. Department of Homeland Security Announces Over \$141 Million in Grants to Secure America's Ports, U.S. Department of Homeland Security Office of the Press Secretary, September 13, 2005. Accessed at <http://www.dhs.gov> on September 14, 2005.

port authorities at four of the five eligible Texas ports received funding,¹⁹ as shown in Table 8. The total is 50% of the amount awarded to all Texas ports in Rounds 1 - 4.

Table 8. Grant Funds Awarded to Texas Port Authorities—Round 5.

Grant Funds Awarded by Port	
Port	Amount
Beaumont	\$ 1,676,000
Freeport	\$ 2,657,000
Houston	\$ 14,550,908
Port Arthur	\$ 3,313,960
TOTAL	\$22,197,868

Future Rounds

In the proposed FY '06 budget, the Bush Administration recommended eliminating the Port Security Grant program and merging ports into a broad targeted infrastructure protection grant program. The new Targeted Infrastructure Protection program would lump port security into a program with trains, trucks, buses and other public transit, and chemical companies and tie these grants to the goal of protecting critical infrastructure based on relative risk, vulnerability, and needs. Ports have expressed a concern that this move would pit an underfunded border protection program (port security) against underfunded domestic protection programs.

Ports are also the only industry within this new Targeted Infrastructure Protection program that has a statutory mandate to comply with MTSA 2002 and the only one for which there is a congressionally authorized grant program. Seaports contend that they, like airports, are key targets and deserve a separate program.

Port Security Grants Summary

DHS Port Security Grant Rounds 1 through 5 have provided Federal resources to augment selected security capabilities at U.S. ports. These have included assessment and proof-of-concept projects, access controls, communications, physical enhancements, surveillance, and vessel/vehicle funding, as identified above. These can be generally categorized as support for assessment and capital items including buildings (e.g., command centers), infrastructure (e.g., fencing, barriers, etc.), and equipment (e.g., cameras, sensors, card readers, etc). The grants have also excluded, with minor exceptions, future maintenance/replacement for previously existing or grant-funded infrastructures, operations costs for security infrastructures, and increased labor costs associated with enhanced security.

A concern of some in the maritime sector is that additional responsibilities associated with port security (future maintenance/replacement, operations, and labor costs) are not federally funded but must be borne, initially at least, by the port industry. Currently, the federal government takes the position that homeland security is a shared effort and financial responsibility. Ports take the

¹⁹ U.S. Department of Homeland Security, Office for Domestic Preparedness. "Port Security Grant Round V Awards." Accessed at <http://www.ojp.usdoj.gov/odp/docs/PSGList.pdf>.

position that terrorist threats are a national security concern, and the federal government should take responsibility for dealing with them.

Chapter 3 details recent and projected finances at the nine public Texas ports included in this study, and Chapter 4 presents specific attention to security-related costs. The costs are categorized according to future capital expenses, maintenance and operations increases, and labor force adjustments associated with DHS Port Security Grants Rounds 1–4 (Round 5 information was not available at the time of the assessment).

CHAPTER 3 – PORT FINANCES

Port infrastructure is financed through a mixture of private and public funding. Users of the port system directly support a substantial portion of infrastructure expenditures, as reflected in operating income, retained earnings, revenue bond proceeds, and other financial accounts. Public funding is usually accomplished via general obligation bonds, grants, taxes, or other such funds which come from either the public or other tax-supported governmental entities.

During the study period of FY 1994-FY 2004, the nine ports included in the study added almost \$1 billion in assets to their books. This is port-owned assets only, without regard to private investment in the port facilities. The following table shows asset additions by port:

Table 9. Asset Additions by Port.

Asset Additions by Port FY 1994 through FY 2004	
Port	Amount
Beaumont	52,959,269
Brownsville	99,266,116
Corpus Christi	114,243,314
Freeport	53,585,740
Galveston	48,422,177
Houston	515,217,000
Orange	3,300,218
Port Arthur	66,255,188
Port Lavaca	33,114,472
System-wide Total	986,363,494

A listing of planned capital projects for FY 2005 and FY 2006 is included in Appendix B, “Planned Capital Projects.”

The following tables show how asset acquisitions were financed by the ports during the study period. The Port of Houston’s financial activity is substantially greater than any of the ports comprising the remainder of the port system; therefore, the numbers are presented on a system-wide basis, and then the Port of Houston is extracted to highlight the effect it has on the system.

Table 10. Asset Financing of Study Ports by Source of Funds.

Sources:	All Ports	% of Total	Houston
<i>Public Financing:</i>			
General Obligation Bonds	431,375,920	43.7%	330,417,000
Grants – Non-Security	32,939,793	3.3%	17,621,000
Grants – Security	14,406,754	1.5%	3,779,000
Capital Contribution from Government	19,173,985	1.9%	
<i>User Financing:</i>			
Revenue Bonds	73,097,052	7.4%	
Loans	43,008,051	4.4%	
Reimbursements	17,536,834	1.8%	
Other Contributions	3,721,344	0.4%	
Cash & Miscellaneous	351,103,761	35.6%	163,400,000
	986,363,494	100.0%	426,300,000

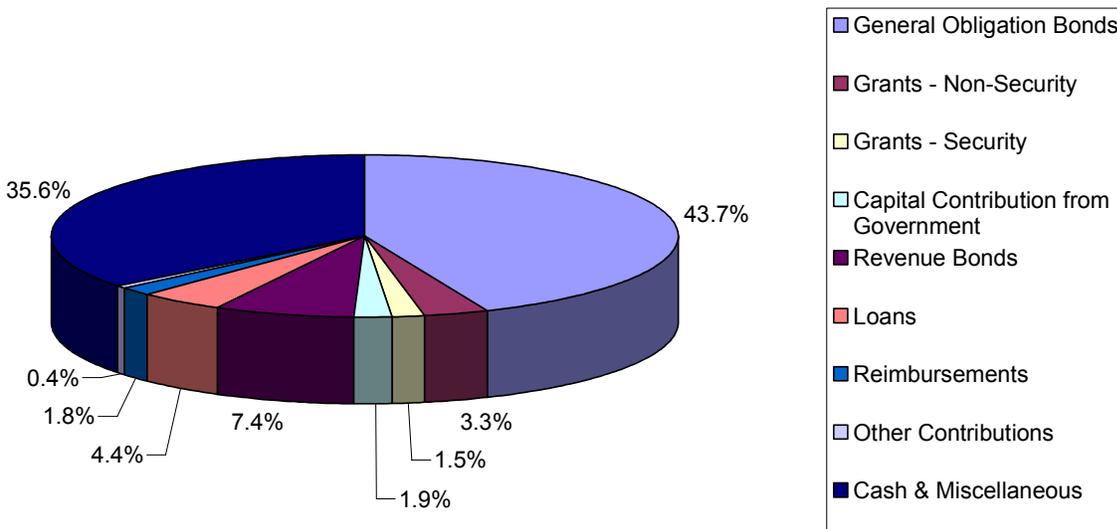


Figure 2. Sources of Funds, All Study Ports.

Table 11. Asset Financing of Study Ports by Source of Funds, without Houston.

Sources:	All Ports except Houston	% of Total
<i>Public Financing:</i>		
General Obligation Bonds	100,958,920	21.4%
Grants – Non-Security	15,318,793	3.3%
Grants – Security	10,627,754	2.3%
Capital Contribution from Government	19,173,985	4.1%
<i>User Financing:</i>		
Revenue Bonds	73,097,052	15.5%
Loans	43,008,051	9.1%
Reimbursements	17,536,834	3.7%
Other Contributions	3,721,344	0.8%
Cash & Miscellaneous	187,703,761	39.8%
	471,146,494	100.0%

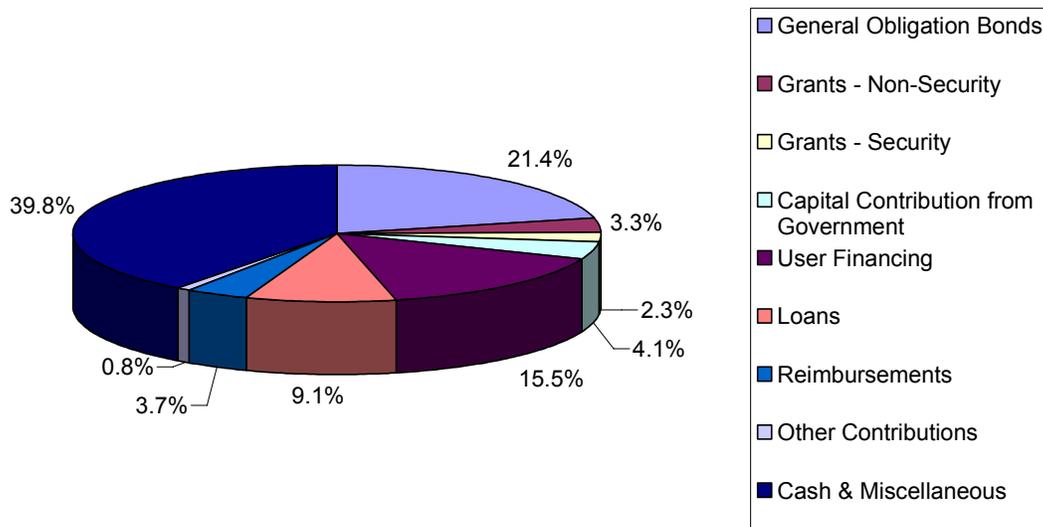


Figure 3. Sources of Funds, All Study Ports Except Houston.

On a system-wide basis, general obligation bonds are the primary source of funds for infrastructure improvements, followed by earnings (“Cash & Miscellaneous”). Revenue bonds are a distant third. However, the effect that the Port of Houston has on the system-wide totals is significant. Without the Port of Houston, the numbers change dramatically. For the rest of the system, earnings are the primary source of funding, with general obligation bonds placing second, and revenue bonds coming in at a not-so-distant third.

General Obligation Bonds

A general obligation bond is a bond that is secured by the taxing and borrowing power of the entity issuing it. Voters must approve such bonds (and the authority to levy *ad valorem* property taxes to cover debt service) before such bonds may be issued.

Table 12. Outstanding General Obligation Bonds by Port (Long-Term Portion) – FY 2004.

Port	Outstanding GO Bonds (Long Term)
Beaumont	27,915,000
Brownsville	26,958,893
Corpus Christi	-0-
Freeport	12,425,000
Galveston	N/A (city department, no taxing authority)
Houston	273,572,000
Orange	-0-
Port Arthur	22,883,074
Port Lavaca	-0-

The ability to raise funds via the issuance of general obligation bonds is directly proportional to the appraised value of property within the port’s taxing jurisdiction. Within the Texas port system, there is a vast range of appraised values, ranging from \$1.9 billion (Port Lavaca) to \$193.7 billion (Houston). This means that an equivalent tax rate in Houston will produce 102 times more revenue than in Port Lavaca.

Table 13. Appraised Taxable Property Values by Port for FY 2004.

Port	Appraised Taxable Property Value
Beaumont	7,749,632,061
Brownsville	4,331,426,055
Corpus Christi	15,619,651,089
Freeport	7,510,311,000
Galveston	N/A (city department, no taxing authority)
Houston	193,683,513,000
Orange	3,424,582,764
Port Arthur	2,787,257,307
Port Lavaca	1,918,234,247

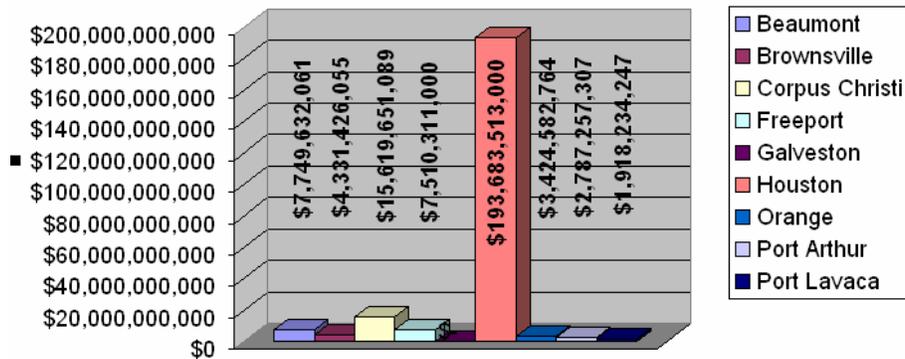


Figure 4. Appraised Property Values by Port.

Revenue Bonds

Revenue bonds are debt securities, which have a defined source of anticipated funds to pay both the principal and the interest. These funds may come from an activity, project, or revenue source that is not related to the capacity to levy taxes. From an investor’s perspective, these bonds are riskier than general obligation bonds.

In many cases, revenue bonds carry a requirement for the ratio of “net revenues” to revenue bond debt service to be a certain amount or greater. Typically, this ratio is in the range of 1.25 to 1.5. In simple terms, “net revenues” is net income without depreciation and without any general obligation tax receipts. Not all the ports have revenue bonds outstanding, and of those that do, not all report their ratios. However, for those that did, the ratios ranged from 2.3 to 10.31, indicating that the ports are generating more than enough cash flow from operations to satisfy bond indenture requirements.

Port Profitability

One way to measure a port’s financial health in broad terms is to look at Operating Income over time. Operating Income is the difference between Operating Revenues and Operating Expenses. Operating Revenues generally consists of income derived from cargo activities and land and facility rentals. It does not include taxes, investment income, financing activities, and other activities not directly related to the port’s principal operations. Operating Expenses include those expenses directly tied to the generation of Operating Revenues, including depreciation expense.

As can be seen in Table 14, there is significant variability in the profitability of the various ports. Operating Income ranges from 26% of Operating Revenues down to a loss of 52%, with a system-wide Operating Income of 7%. However, in terms of cash flow, only one port failed to produce a positive cash flow during the study period.

Table 14. Operating Income and Cash Flow, FY 1994-FY 2004.

Port	Operating Revenue	Operating Income	Cash Flow from Operations
Beaumont	73,834,043	(15,807,016)	3,240,858
Brownsville	80,680,820	(1,095,227)	32,095,994
Corpus Christi	281,647,334	13,699,610	71,143,178
Freeport	53,567,320	(1,281,401)	12,080,202
Galveston	130,146,743	22,296,640	47,451,621
Houston	1,082,599,000	108,035,000	367,126,000
Orange	14,093,712	751,767	751,767
Port Arthur	25,463,566	(13,138,503)	(7,567,557)
Port Lavaca	21,291,066	5,555,417	5,555,417
System-Wide:	1,626,510,604	108,526,321	487,237,480

Operating Income provides a view of how well the port does financially without any income from taxation or subsidies. The greater the operating loss, the greater the need for tax revenues or some type of subsidy. The following table shows the level of dependency on taxes at each port:

Table 15. Tax Revenues Compared to Operating Revenues.

Comparison of Tax Revenues to Operating Revenues		
Port	Total Taxes	Taxes as % of Operating Revenues*
Beaumont	49,289,788	66.8%
Brownsville	30,625,397	42.9%
Corpus Christi	18,644,465	6.6%
Freeport	58,914,023	110.0%
Galveston	N/A	N/A
Houston	288,237,000	30.5%
Orange	5,593,331	39.7%
Port Arthur	39,656,721	155.7%
Port Lavaca	1,916,214	9.0%

*100% indicates that taxes are equal to operating revenues

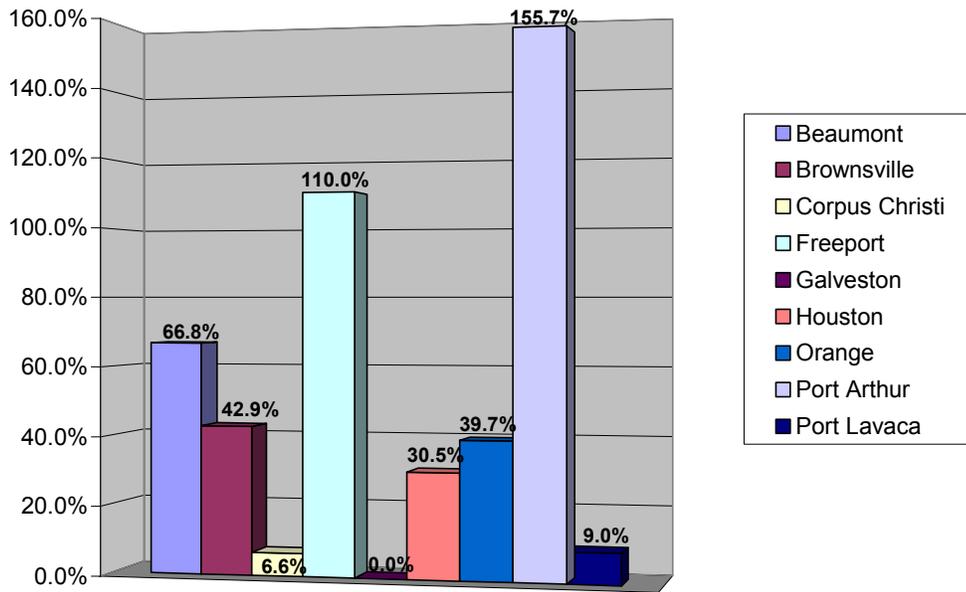


Figure 5. Ratio of Taxes to Operating Revenues.

Because it includes depreciation, Operating Income reveals whether an entity is producing enough income to maintain its asset base without additional debt. Four of the nine ports have a negative Operating Income, and therefore may have trouble maintaining their asset base. It is important to note that for several ports, a significant portion of Operating Income is tied to long-term leases that may not allow increased costs to be passed on to users for a number of years—even decades.

CHAPTER 4 – TEXAS PORT SECURITY COSTS

While the Port Security Grant program has enabled ports to install and construct security infrastructure that might otherwise be unaffordable, it also adds to the asset base that a port must maintain and operate. Some port officials believe the recurring costs for system operation and maintenance could be in the range of 10% to 15% of acquisition costs.²⁰

All new equipment and construction will need some type of maintenance and eventual replacement. For purposes of evaluating the financial impact of these new financial concerns, this report uses a time frame of 10 years. Structural items such as buildings can be expected to last longer than 10 years without the need for replacement or significant rehabilitation. All other items must be included in the port's operating budget.

Increases in operating expenses due to new security paradigm

In broad terms, the money spent on security-related projects can be broken into four categories: security assessments, buildings (e.g., command centers), infrastructure (e.g., fencing, barriers, etc.), and equipment (e.g., cameras, sensors, card readers, etc.). For purposes of this analysis, security assessments are a one-time event and, therefore, do not factor into future financial impacts. It is assumed that buildings will last at least 30 years and are outside the short to medium term planning horizon as far as capital expenses are concerned.

In order to estimate the future impacts of security projects being undertaken currently, it is necessary to use several rules of thumb. After discussions with several port officials around the state, several assumptions were made. Building maintenance and repairs are assumed to be 5% of the original cost. It is assumed that infrastructure will have to be replaced completely every 10 years, and that maintenance will amount to an average of 5% of original cost each year. Equipment is assumed to require an average of 10% of original cost for maintenance and repairs each year (per testimony from the American Association of Port Authorities) and a total replacement every 7 years. (Port officials estimated useful lives of 5 to 7 years for equipment; 7 was used to avoid overstating the impact.) Finally, it is assumed that no new major security-related equipment or infrastructure beyond that which is financed by the grants will be purchased. All future expenses are stated in 2004 dollars.

Table 16. Security Expenses Assumptions.

Type of Project	Capital Replacement Life	Annual Maintenance and Operating Expense (% of Acquisition Cost)
Buildings	30 years	5%
Infrastructure	10 years	5%
Equipment	7 years	10%

²⁰ Testimony of Noel K. Cunningham, Director of Operations and Emergency Management Port of Los Angeles, Los Angeles, California, for The American Association of Port Authorities, before the Subcommittee on Coast Guard and Maritime Transportation House Transportation and Infrastructure Committee, June 9, 2004.

Ports were asked to supply information regarding how much their operating expenses have increased because of the new security requirements. In addition to the ongoing operating expenses, ports must incur costs to maintain and replace the infrastructure and equipment which was purchased in whole or in part with grant money. There is, of course, no guarantee that there will be a grant program in place when these items must be replaced. It is therefore incumbent on the ports to plan to bear 100% of both replacement and “marginal maintenance” costs, which are estimated for each port below. (NOTE: Inflation is not factored into these estimates.)

The information supplied by the ports primarily reflects increased expenses due to staffing and operation and maintenance of new equipment as of FY 2004. It is important to note that as of FY 2004, several ports were still ramping up and executing their security-related projects. As full staffing levels are reached and all major security projects are completed, these expenses will rise.

This study assumes an incremental step from what was the “pre-9/11” practice to the new security paradigm. Where ports had to set up new departments or hire a significant number of security employees, this assumption no longer holds. Therefore, in several of the port cases below, the marginal maintenance costs are further adjusted for labor increases associated with security personnel.

The following sections present a summary of expected security-related expense increases for each port associated with Port Security Grants Rounds 1 - 4. Detailed Round 5 information was not available at the time of the individual port assessments. In each of the port sections below, the estimated security expense tables are comprised of three elements: (1) a capital replacement fund equal to the original cost of security-related equipment divided by the assumed life; (2) the marginal maintenance costs based on study assumptions; and (3) adjustments for significant changes in security staffing levels. It should be noted that these are projected costs required to support, maintain, and operate the security “capital” provided by Port Security Grant Rounds 1 - 4. That is, although Rounds 1 - 4 provided over \$44 million in security-related funding to the nine Texas ports included in this study, the costs detailed below represent projected additional costs to the ports over the coming decade to support federally-funded security measures.

The Port of Beaumont

The Port of Beaumont faces several important security challenges. The Beaumont/Port Arthur/Orange port complex serves over 20 chemical and oil refineries and the nation’s largest strategic petroleum reserve. Approximately 20% of America’s gasoline is produced in this region. Furthermore, the U.S. Navy and the U.S. Army use the Port of Beaumont (which is one of 14 ports designated by the Department of Defense as a “strategic commercial port”) to ship military hardware overseas. Beaumont led the nation in the amount of military exports in support of Operation Iraqi Freedom.

In FY 2004, the Port's revenue and expense levels were:

Table 17. Port of Beaumont Finances.

Operating Revenue	Operating Expense	Operating Income (Loss)	Cash Flow from Operations
\$13,045,212	\$13,741,609	\$(696,397)	\$189,148

The total amount awarded to the Port of Beaumont in Port Security Grant Rounds 1 - 4 is \$4,332,106. According to executive staff, the Port of Beaumont is currently spending approximately \$400,000 annually due to additional security measures required since 9/11 (this includes maintenance, operation, and labor force). Replacement of security capital initially provided in Rounds 1 - 4 (buildings, infrastructure, and equipment) using the capital lifetime rates presented in Table 16 is projected to cost nearly \$550,000 on an annual basis over the next 10 years. This brings a total forecasted increase in security capital, maintenance and operations, and labor at the Port of Beaumont to nearly \$950,000 per year. (It should be noted that this amount does not include costs associated with security capital provided in Port Security Grant Round 5, which totaled \$1,676,000 for the Port of Beaumont.)

Table 18. Port of Beaumont Cost of Security Projects by Type.

Security Projects Involving Port Security Grant Funding* (Total expense reported)			
Sec. Assessments	Buildings	Infrastructure	Equipment
-0-	\$431,553	\$215,777	\$3,684,776

*Assumed Round 2/TSA was split 50% buildings, 25% infrastructure, and 25% equipment

Table 19. Port of Beaumont Estimated Future Security Expenses.

Future Costs Associated with Port Security					
Year	Capital Expense	Annual Capital Replacement Allowance	Marginal M&O Increase	Security Force Adjustments	Total Forecasted Increases
1		\$547,974	\$400,844	---	\$948,818
2		\$547,974	\$400,844	---	\$948,818
3		\$547,974	\$400,844	---	\$948,818
4		\$547,974	\$400,844	---	\$948,818
5		\$547,974	\$400,844	---	\$948,818
6		\$547,974	\$400,844	---	\$948,818
7	\$3,684,776	\$547,974	\$400,844	---	\$948,818
8		\$547,974	\$400,844	---	\$948,818
9		\$547,974	\$400,844	---	\$948,818
10	\$215,777	\$547,974	\$400,844	---	\$948,818
TOTAL		\$5,479,740	\$4,008,440		\$9,488,180

Port of Brownsville

The Port of Brownsville had a security force prior to 9/11, but its primary duties were to direct people to their intended destination, to spot situations requiring immediate attention from other agencies, and to deter trespassing and illegal activities. This force did not have law enforcement duties. Following 9/11, the Port established a security force with certified peace officers and increased the level of access control.

In FY 2004 (which includes 10 months of Calendar Year 2003), the Port’s revenue and expense levels were:

Table 20. Port of Brownsville Finances.

Operating Revenue	Operating Expense	Operating Income (Loss)	Cash Flow from Operations
\$9,365,420	\$9,384,485	\$(19,065)	\$2,186,528

Brownsville is one of the ports where staffing levels had to be significantly adjusted to comply with the new security paradigm. The average of security expenses for the period March 2, 1999 through March 1, 2002 came to \$407,684 (Brownsville’s fiscal year ends on March 1). In the year ending March 1, 2005, the port incurred \$671,007 in security expenses and expects to spend \$799,736 in FY 2006. (This latter number will be partially offset by an expected annual amount of \$275,000 in security fees.)

The projected FY 2006 expenses represent 196% of the three-year pre-9/11 average, or \$392,000 per year, of which \$354,000 is labor-related and which corresponds to 13.5% of the port’s salary and tax expenses shown in Figure 6.

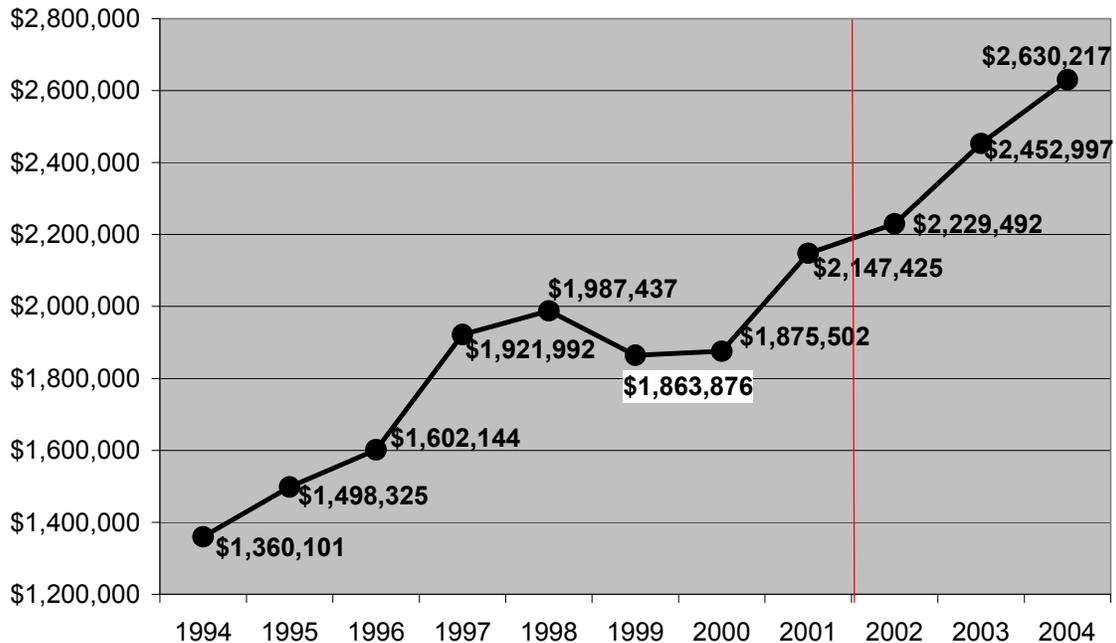


Figure 6. Brownsville’s Salary & Taxes, FY 1994-FY 2004.

The average of “Salaries and Taxes” for the period March 2, 1999 thru March 1, 2002 was \$2,084,140. For FY 2004 the amount was \$2,630,217. For FY 1994 through 2002, the annual compounded growth rate was 6.4%. Since then, the growth rate has risen to 8.6%.

Table 21. Port of Brownsville Cost of Security Projects by Type.

Security Projects Involving Port Security Grant Funding (Total expense reported)			
Sec. Assessments	Buildings	Infrastructure	Equipment
-0-	-0-	-0-	\$551,000

In FY ‘06, the port budgeted \$38,000 for maintenance and other expenses. The study estimate for maintenance and operations using expense rates presented in Table 16 is \$55,100 and this higher figure is used to allow for increased expenses in later years. The total amount awarded to the Port of Brownsville for in Port Security Grant Rounds 1 - 4 is \$435,400, and the replacement of security capital initially provided in Rounds 1 - 4 (infrastructure and equipment) using the capital lifetime rates presented in Table 16 is projected to cost over \$78,000 on an annual basis over the next 10 years. This brings a total forecasted increase in security capital, maintenance and operations, and labor at the Port of Brownsville to approximately \$488,000 per year. The Port of Brownsville was not eligible to receive funding in Port Security Grant Round 5.

Table 22. Port of Brownsville Estimated Future Security Expenses.

Future Costs Associated with Port Security					
Year	Capital Expense	Annual Capital Replacement Allowance	Marginal M&O Increase	Security Force Adjustments	Total Forecasted Increases
1		\$78,714	\$55,100	\$354,000	\$487,814
2		\$78,714	\$55,100	\$354,000	\$487,814
3		\$78,714	\$55,100	\$354,000	\$487,814
4		\$78,714	\$55,100	\$354,000	\$487,814
5		\$78,714	\$55,100	\$354,000	\$487,814
6		\$78,714	\$55,100	\$354,000	\$487,814
7	\$551,000	\$78,714	\$55,100	\$354,000	\$487,814
8		\$78,714	\$55,100	\$354,000	\$487,814
9		\$78,714	\$55,100	\$354,000	\$487,814
10		\$78,714	\$55,100	\$354,000	\$487,814
TOTAL		\$787,140	\$551,000	\$3,540,000	\$4,878,140

Port of Corpus Christi

The Port of Corpus Christi has designed its security program to address several key findings that appeared in port security assessments completed by the U.S. Coast Guard and an outside consultant: the lack of an adequate port security force, fencing, lighting, or an integrated surveillance and monitoring system. Prior to 9/11, the Port’s security focused mainly on logging people in and out of the port. It relied on local law enforcement agencies to handle any

situations requiring peace officers. There was no agency specifically trained to deal with situations in a port environment. As a result of the security assessments, the Port made the decision to establish its own security department with certified peace officers, although it has continued to use a private security company to handle such things as routine gate checks.

As in the case of Beaumont, Corpus Christi is one of 14 ports designated by the Department of Defense as a “strategic commercial port” to ship military hardware overseas. It was very active during Operation Iraqi Freedom.

In FY 2004, the Port’s revenue and expense levels were:

Table 23. Port of Corpus Christi Finances.

Operating Revenue	Operating Expense	Operating Income (Loss)	Cash Flow from Operations
\$28,371,297	\$29,081,705	\$(710,408)	\$3,295,320

The Port’s financial statements show that the total of Employee Services, Security Services, and Contract Labor increased \$2.8 million over FY 2001 levels, although not all of the increase was security-related. For FY 1994 through 2001, the annual compounded growth rate for Employee Services, Security Services, and Contract Labor was 2.4 percent. Since December 2001, the annual growth rate has been 9.2%. Port officials indicate that security force expenses are expected to level off at approximately \$1.8 million compared to \$892k in 2000, resulting in an increase of approximately \$900,000 per year, which corresponds to 7.4% of the port’s labor and security expenses shown in Figure 7.

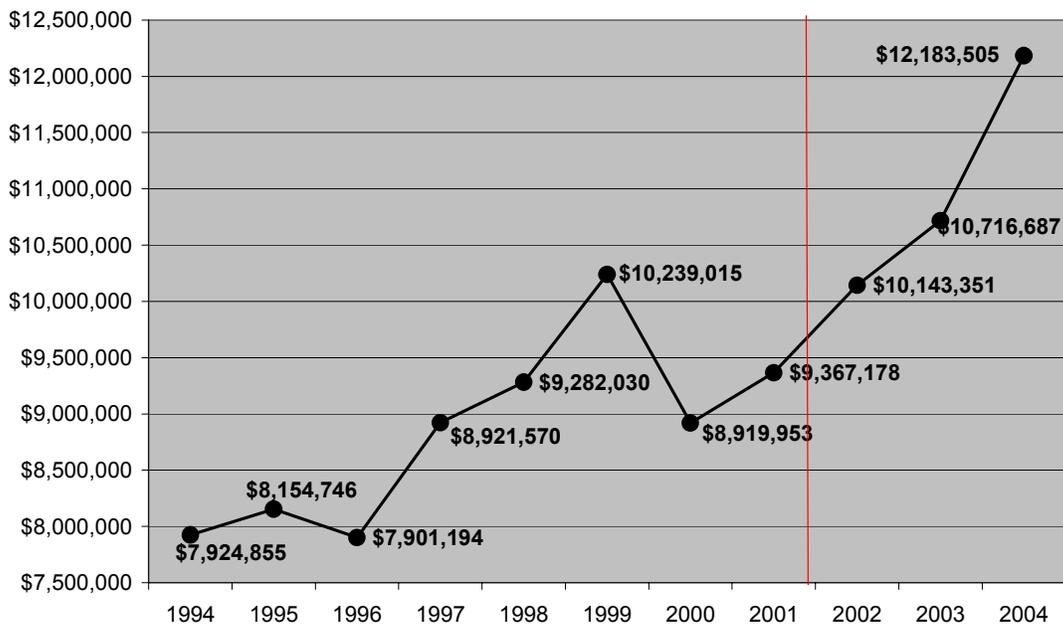


Figure 7. Corpus Christi Labor and Security Expenses, FY 1994-FY 2004.

**Table 24. Port of Corpus Christi Cost of Security Projects by Type.
Security Projects Involving Port Security Grant Funding*
(Total expense reported)**

Sec. Assessments	Buildings	Infrastructure	Equipment
-0-	\$1,623,770	\$5,261,176	\$8,281,244

*Assumes 50/50 split of Round 1 money between buildings and equipment and a 50/50 split of Round 2 money between infrastructure and equipment

The total amount awarded to the Port of Corpus Christi in Port Security Grant Rounds 1 - 4 is \$11,808,198. The Port of Corpus Christi estimates that the additional operational costs due to the new security requirements are approximately \$1 million per year.²¹ The study estimate for maintenance and operations using expense rates presented in Table 16 is \$1,172,372, and the higher figure is used to allow for increased expenses in later years. In addition, replacement of security capital initially provided in Rounds 1 - 4 (infrastructure and equipment) using the capital lifetime rates presented in Table 16 is projected to cost over \$1.7 million on an annual basis over the next 10 years. This brings a total forecasted increase in security capital, maintenance and operations, and labor at the Port of Corpus Christi to over \$3,781,000 per year. Although the Port of Corpus Christi was eligible to receive funding in Port Security Grant Round 5, no funding was awarded.

Table 25. Port of Corpus Christi Estimated Future Security Expenses.

Future Costs Associated with Port Security					
Year	Capital Expense	Annual Cap. Replacement Allowance	Marginal M&O Increase	Security Force Adjustments	Total Forecasted Increases
1		\$1,709,152	\$1,172,372	\$900,000	\$3,781,524
2		\$1,709,152	\$1,172,372	\$900,000	\$3,781,524
3		\$1,709,152	\$1,172,372	\$900,000	\$3,781,524
4		\$1,709,152	\$1,172,372	\$900,000	\$3,781,524
5		\$1,709,152	\$1,172,372	\$900,000	\$3,781,524
6		\$1,709,152	\$1,172,372	\$900,000	\$3,781,524
7	\$8,281,244	\$1,709,152	\$1,172,372	\$900,000	\$3,781,524
8		\$1,709,152	\$1,172,372	\$900,000	\$3,781,524
9		\$1,709,152	\$1,172,372	\$900,000	\$3,781,524
10	\$5,261,176	\$1,709,152	\$1,172,372	\$900,000	\$3,781,524
TOTAL		\$17,091,520	\$11,723,720	\$9,000,000	\$37,815,240

²¹ Vanessa Santos-Garza, "At the ports, it's lights, camera, security guards," Corpus Christi Caller-Times, January 24, 2005.

Port Freeport

Port Freeport’s security planning has been driven by several key issues. The Freeport complex includes 16 private chemical plants, including an ammonia plant next to the public deepwater cargo facilities. The Port also hosts one of the country’s largest Strategic Petroleum Reserves at Bryan Mound. As a result of a security assessment done after 9/11, the Port decided to hire a port security manager and formalize its approach to security.

In FY 2004, the Port’s revenue and expense levels were:

Table 26. Port Freeport Finances.

Operating Revenue	Operating Expense	Operating Income (Loss)	Cash Flow from Operations
\$6,570,514	\$6,718,109	\$(147,595)	\$1,497,586

For FY 1994 through 2001 the annual compounded growth rate for Payroll and Related Expenses was 4.9%. Since September 30, 2001, the annual growth rate has risen to 6.6%.

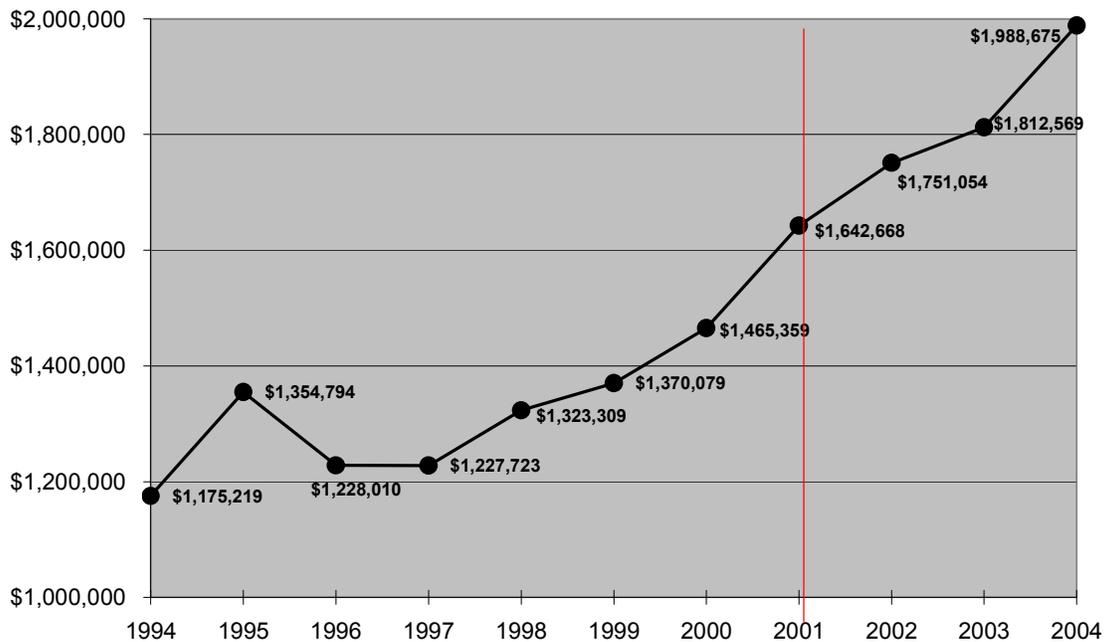


Figure 8. Port Freeport Payroll & Related Expenses, FY 1994 – FY 2004.

The 5-year improvement projects total is \$1,289,000 for security-related items. This is offset by \$1,214,000 in grant awards in Port Security Grant Rounds 1 - 4. According to estimates produced by port staff, annual ongoing expenses have risen \$185,000 (including maintenance of

equipment) in comparison to pre-9/11 expense levels. Immediate purchases are planned for \$140,000 (boat, fencing, lighting, 2 vehicles). Port Freeport’s expenses are significantly higher than what study estimates for marginal maintenance and operation alone would indicate (\$185,000 versus \$138,000), and it is assumed that the difference in value is accounted for by increased labor (\$47,150) associated with security enhancement. This labor cost corresponds to 2.4% of the port’s payroll and related expenses shown in Figure 8. In addition, replacement of security capital initially provided in Rounds 1 - 4 (infrastructure and equipment) using the capital lifetime rates presented in Table 16 is projected to cost \$188,000 on an annual basis over the next 10 years. This brings a total forecasted increase in security capital, maintenance and operations, and labor at Port Freeport to \$373,000 per year. (It should be noted that this amount does not include costs associated with security capital provided in Port Security Grant Round 5, which totaled \$2,657,000 for Port Freeport.)

Table 27. Port Freeport Cost of Security Projects by Type.

Security Projects Involving Port Security Grant Funding (Total expense reported)			
Sec. Assessments	Buildings	Infrastructure	Equipment
\$100,000	\$385,000	\$650,000	\$861,000

Table 28. Port Freeport Estimated Future Security Expenses.

Future Costs Associated with Port Security					
Year	Capital Expense	Annual Cap. Replacement Allowance	Marginal M&O Increase	Security Force Adjustments	Total Forecasted Increases
1		\$188,000	\$137,850	\$47,150	\$373,000
2		\$188,000	\$137,850	\$47,150	\$373,000
3		\$188,000	\$137,850	\$47,150	\$373,000
4		\$188,000	\$137,850	\$47,150	\$373,000
5		\$188,000	\$137,850	\$47,150	\$373,000
6		\$188,000	\$137,850	\$47,150	\$373,000
7	\$861,000	\$188,000	\$137,850	\$47,150	\$373,000
8		\$188,000	\$137,850	\$47,150	\$373,000
9		\$188,000	\$137,850	\$47,150	\$373,000
10	\$650,000	\$188,000	\$137,850	\$47,150	\$373,000
TOTAL		\$1,880,000	\$1,378,500	\$471,500	\$3,730,000

Port of Galveston

The Port of Galveston’s security program has been driven by several key factors. It was in 2001 that the Port’s cruise terminal business began to thrive, causing a need for more protection for passengers. At the same time, its cargo volumes began to increase. Also, the Port has facilities which are adjacent to retail/pedestrian traffic, creating a need for a different program than that found in other Texas ports.

In FY 2004, the Port’s revenue and expense levels were:

Table 29. Port of Galveston Finances.

Operating Revenue	Operating Expense	Operating Income (Loss)	Cash Flow from Operations
\$14,474,565	\$13,321,542	\$1,153,023	\$4,392,1400

The Port of Galveston financials indicate that a dramatic shift has taken place in labor expenses since 9/11. For FY 1994 - 1998, Galveston experienced rather dramatic reductions in force. For FY 1999 – FY 2001, the annual compounded growth rate for Salaries & Benefits and Contract Labor was 7.7%. Since December 31, 2001, the growth rate has risen to 15.8%.

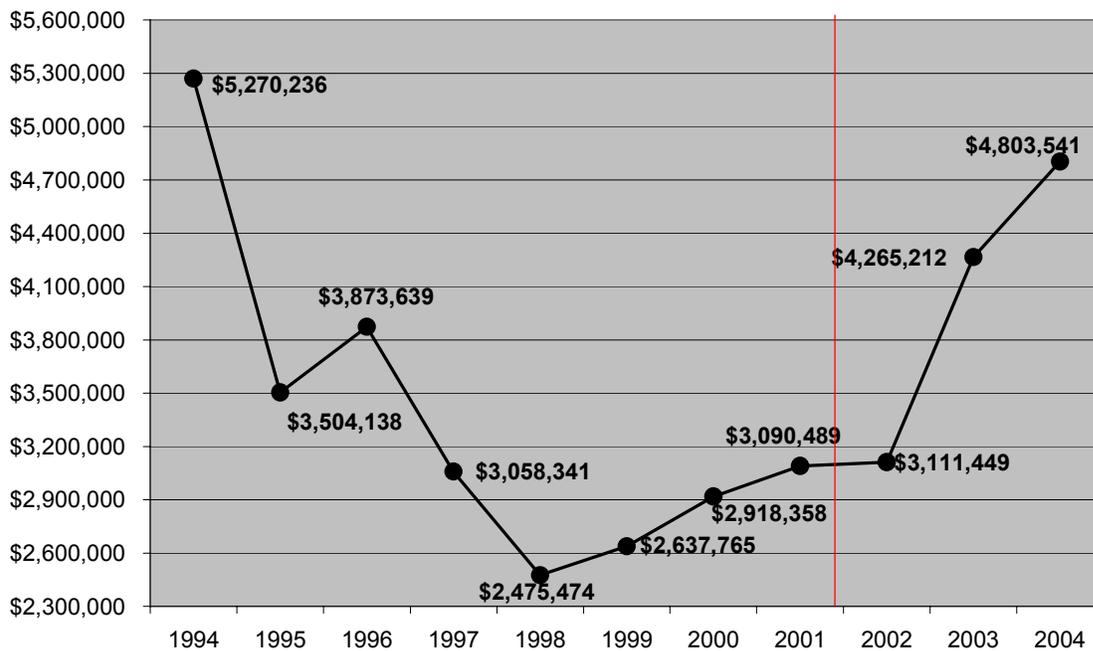


Figure 9. Galveston Labor Expenses, FY 1994-FY 2004.

Table 30. Port of Galveston Cost of Security Projects by Type.

Security Projects Involving Port Security Grant Funding (Total expense reported)			
Sec. Assessments	Buildings	Infrastructure	Equipment
\$375,000	771,600	\$2,403,206	\$3,312,600

The financial data provided by the Port and the estimate derived using the study assumptions are very similar. The cost estimate for maintenance and operations using expense rates presented in Table 16 is \$490,000 per year. The average percent of total labor costs accounted for by security

at six other ports in this study (excluding Houston and Beaumont) was 8.0%. Using this as an estimate for security labor costs at Galveston corresponds to an annual increase of \$383,000. The total amount awarded to the Port of Galveston in Port Security Grant Rounds 1 - 4 is \$6,862,406, and the replacement of security capital initially provided in Rounds 1 - 4 (infrastructure and equipment) using the capital lifetime rates presented in Table 16 is projected to cost over \$713,000 on an annual basis over the next 10 years. This brings a total forecasted increase in security capital, maintenance and operations, and labor at the Port of Galveston to over \$1,586,000 per year. The Port's projections for 2006 indicate an increase of \$1,511,000 compared to FY 2001. The Port of Galveston was not eligible to receive funding in Port Security Grant Round 5.

Table 31. Port of Galveston Estimated Future Security Expenses.

Future Costs Associated with Port Security					
Year	Capital Expense	Annual Cap. Replacement Allowance	Marginal M&O Increase	Security Force Adjustments	Total Forecasted Increases
1		\$713,549	\$490,000	\$383,000	\$1,586,549
2		\$713,549	\$490,000	\$383,000	\$1,586,549
3		\$713,549	\$490,000	\$383,000	\$1,586,549
4		\$713,549	\$490,000	\$383,000	\$1,586,549
5		\$713,549	\$490,000	\$383,000	\$1,586,549
6		\$713,549	\$490,000	\$383,000	\$1,586,549
7	\$3,312,600	\$713,549	\$490,000	\$383,000	\$1,586,549
8		\$713,549	\$490,000	\$383,000	\$1,586,549
9		\$713,549	\$490,000	\$383,000	\$1,586,549
10	\$2,403,206	\$713,549	\$490,000	\$383,000	\$1,586,549
TOTAL		\$7,135,490	\$4,900,000	\$3,830,000	\$15,865,490

Port of Houston

Houston has a host of security issues that shape its security program. With more than 100 petrochemical waterfront facilities, Houston is the second largest petrochemical complex in the world. In terms of maritime traffic and cargo, the Port of Houston ranks first in the U.S. for its number of ship arrivals and total cargo tonnage. It handles 2/3 of all containerized cargo arriving at Gulf of Mexico ports.²² Approximately 50% of all the gasoline used in the U.S. is refined in the Houston area, and there are more than 150 private industrial companies along the ship channel.

The Port Authority itself owns 11 terminals that line the ship channel. It is important to note that approximately 15% of the total tonnage reported for the Port of Houston actually moves across the Authority's public wharves; the rest is handled by private interests. The Port reported 6,539 vessel calls to Houston facilities for the year 2004.

²² This was prior to Hurricane Katrina. The percentage will rise, at least for a time, because of hurricane damage in New Orleans and Gulfport.

The Port had a security force prior to 9/11, but has since increased security measures, improved communications with other area agencies, and has increased the level of access control and prevention of illegal activities.

In FY 2004, the Port’s revenue and expense levels were:

Table 32. Port of Houston Finances.

Operating Revenue	Operating Expense	Operating Income (Loss)	Cash Flow from Operations
\$136,813,000	\$121,839,000	\$14,974,000	\$44,640,000

The total amount awarded to the Port of Houston in Port Security Grant Rounds 1 - 4 is \$16,980,217. The Port of Houston Authority went through a significant hiring effort to implement its new security program. The Port’s police department budget has doubled from \$3.85 million to \$7.69 million per year, not including “non-police” expenses such as Marine Department expenses for additional patrols by the Port’s fire boats during heightened MARSEC (Coast Guard Maritime Security alert) levels. This increase in security staffing (\$3.84 million) provides an estimate for future expenses for security labor staffing.

The study estimate for maintenance and operations using expense rates presented in Table 16 is \$1,545,963. In addition, replacement of security capital initially provided in Rounds 1 - 4 (infrastructure and equipment) using the capital lifetime rates presented in Table 16 is projected to cost over \$1.8 million on an annual basis over the next 10 years. This brings a total forecasted increase in security capital, maintenance and operations, and labor at the Port of Houston Authority to over \$7,241,000 per year. (It should be noted that this amount does not include costs associated with security capital provided in Port Security Grant Round 5, which totaled \$14,550,908 for the Port of Houston.)

Table 33. Port of Houston Cost of Security Projects by Type.

Security Projects Involving Port Security Grant Funding (Total expense reported)			
Sec. Assessments	Buildings	Infrastructure	Equipment
\$300,000	\$5,487,235	\$1,352,779	\$12,039,626

Table 34. Port of Houston Estimated Future Security Expenses.

Future costs associated with port security					
Year	Capital Expense	Annual Cap. Replacement Allowance	Marginal M&O Increase	Security Force Adjustments	Total Forecasted Increases
1		\$1,855,224	\$1,545,963	\$3,840,000	\$7,241,187
2		\$1,855,224	\$1,545,963	\$3,840,000	\$7,241,187
3		\$1,855,224	\$1,545,963	\$3,840,000	\$7,241,187
4		\$1,855,224	\$1,545,963	\$3,840,000	\$7,241,187
5		\$1,855,224	\$1,545,963	\$3,840,000	\$7,241,187
6		\$1,855,224	\$1,545,963	\$3,840,000	\$7,241,187
7	\$12,039,626	\$1,855,224	\$1,545,963	\$3,840,000	\$7,241,187
8		\$1,855,224	\$1,545,963	\$3,840,000	\$7,241,187
9		\$1,855,224	\$1,545,963	\$3,840,000	\$7,241,187
10	\$1,352,779	\$1,855,224	\$1,545,963	\$3,840,000	\$7,241,187
TOTAL		\$18,552,240	\$15,459,630	\$38,400,000	\$72,411,870

Port of Orange

The main focus of the Port of Orange’s security efforts have been on perimeter control for its waterfront facilities, which consist of approximately 2,300 linear feet of docking space and 4 warehouses. The port has used new software and technology to create a virtual barrier around its property.

In FY 2004, the Port’s revenue and expense levels were:

Table 35. Port of Orange Finances.

Operating Revenue	Operating Expense	Operating Income (Loss)	Cash Flow from Operations
\$1,365,890	\$1,316,560	\$49,330	\$49,330

For FY 1994 - 1998, Orange experienced rather dramatic reductions in force. For FY 1999 - 2001, the annual compounded growth rate for Salaries & Benefits and Contract Labor was 2.9%. Since December 31, 2001, the growth rate has risen modestly to 3.6%.

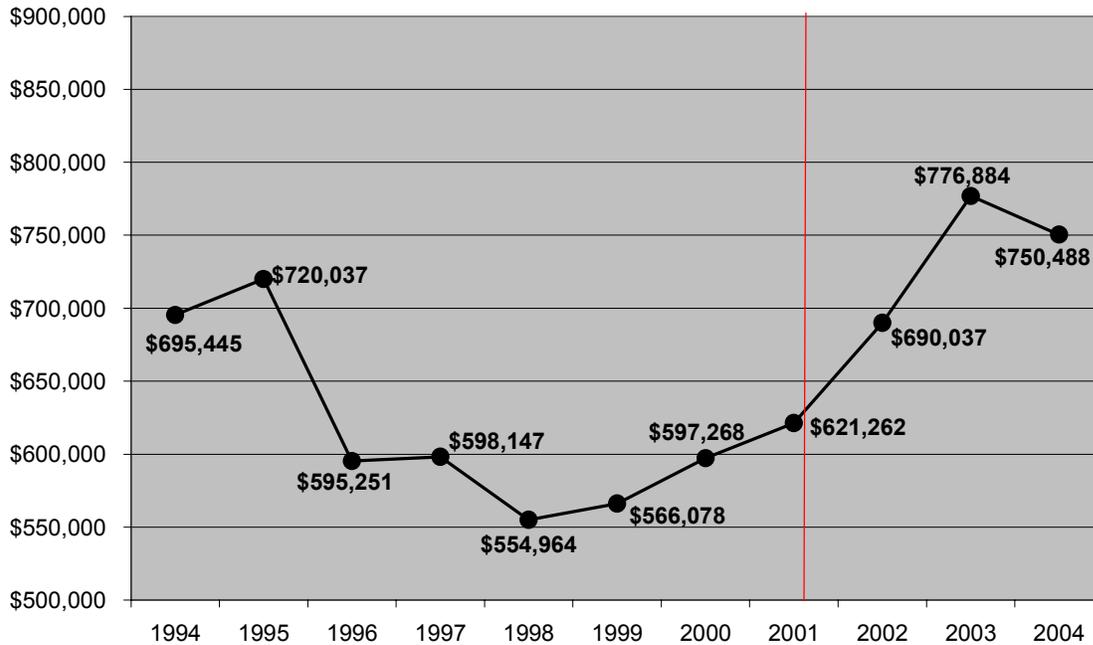


Figure 10. Port of Orange Labor Expenses, FY 1994-FY 2004.

The total amount awarded to the Port of Orange in Port Security Grant Rounds 1 - 4 is \$325,000. The Port of Orange implemented a \$370,000 capital security project during 2003 – 2004 (\$325,000 of which was covered under grant funding). The Port is currently in the process of engineering a Phase II capital project which is expected to cost \$450k - \$500k. In 2006 the Port will address the construction of a permanent command center using grant money of \$172,500.

The Port of Orange’s ongoing operating expense has increased \$180,000 in order to meet security requirements. This amount consists of \$137,000 in salary and personnel expenses and \$43,000 in other expenses. This labor cost corresponds to 19.0% of the port’s labor expenses shown in Figure 10.

The study estimate for maintenance and operations using expense rates presented in Table 16 is \$37,000, which is comparable to the reported “other security expenses” amount provided by the port. The higher figure is used to allow for increased expenses in later years. In addition, replacement of security capital initially provided in Rounds 1 though 4 (infrastructure and equipment) using the capital lifetime rates presented in Table 16 is projected to cost nearly \$53,000 on an annual basis over the next 10 years. This brings a total forecasted increase in security capital, maintenance and operations, and labor at the Port of Orange to nearly \$233,000 per year. The Port of Orange was not eligible to receive funding in Port Security Grant Round 5.

Table 36. Port of Orange Cost of Security Projects by Type.

Security Projects Involving Port Security Grant Funding (Total expense reported)			
Sec. Assessments	Buildings	Infrastructure	Equipment
-0-	-0-	-0-	\$370,000

Table 37. Port of Orange Estimated Future Security Expenses.

Future Costs Associated with Port Security					
Year	Capital Expense	Annual Cap. Replacement Allowance	Marginal M&O Increase	Security Force Adjustments	Total Forecasted Increases
1		\$52,857	\$43,000	\$137,000	\$232,857
2		\$52,857	\$43,000	\$137,000	\$232,857
3		\$52,857	\$43,000	\$137,000	\$232,857
4		\$52,857	\$43,000	\$137,000	\$232,857
5		\$52,857	\$43,000	\$137,000	\$232,857
6		\$52,857	\$43,000	\$137,000	\$232,857
7	\$370,000	\$52,857	\$43,000	\$137,000	\$232,857
8		\$52,857	\$43,000	\$137,000	\$232,857
9		\$52,857	\$43,000	\$137,000	\$232,857
10		\$52,857	\$43,000	\$137,000	\$232,857
TOTAL		\$528,570	\$430,000	\$1,370,000	\$2,328,570

Port of Port Arthur

Port Arthur had a contract with a private security company prior to 9/11. As a result of the new security requirements, the amount of that contract has risen, as have salaries for employees with security-related responsibilities.

In FY 2004, the Port's revenue and expense levels were:

Table 38. Port of Port Arthur Finances.

Operating Revenue	Operating Expense	Operating Income (Loss)	Cash Flow from Operations
\$4,639,655	\$7,039,279	\$(2,399,624)	\$(20,675)

For FY 1994 through 2001 the annual compounded growth rate for Salaries and Private Security was 3.2%. Since September 30, 2001, the annual growth rate has risen to 13.6%.

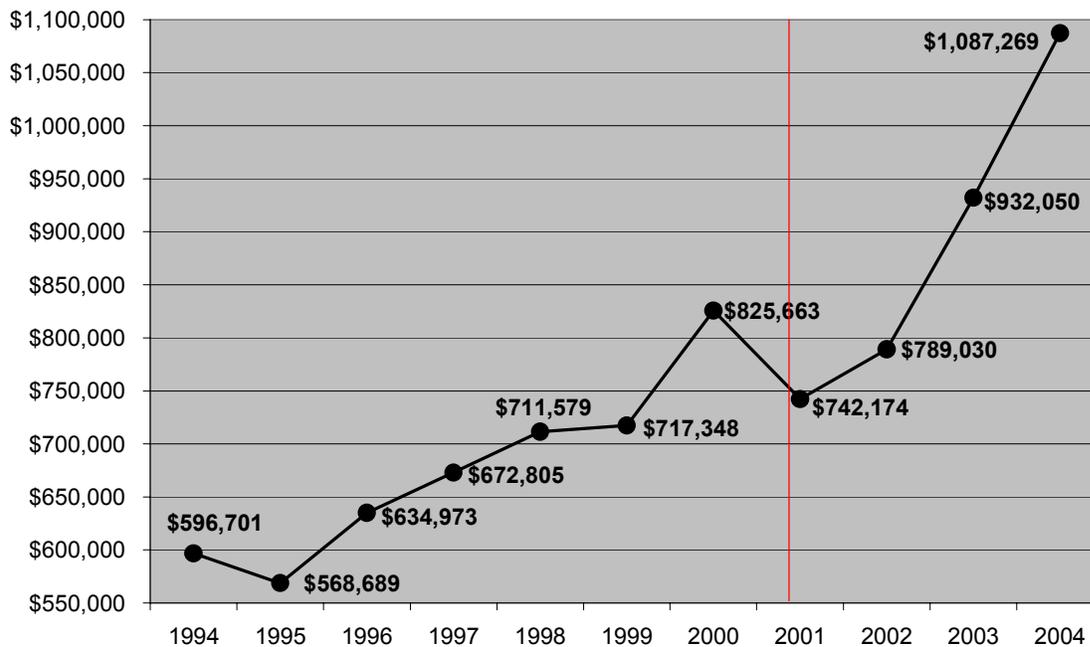


Figure 11. Port Arthur Labor & Security Expenses, FY 1994 – FY 2004.

Table 39. Port of Port Arthur Cost of Security Projects by Type.

Security Projects Involving Port Security Grant Funding (Total expense reported)			
Sec. Assessments	Buildings	Infrastructure	Equipment
-0-	\$356,960	-0-	\$1,523,060

The total amount awarded to the Port of Port Arthur in Port Security Grant Rounds 1 - 4 is \$1,645,440. According to port staff, security expenses before 9/11 were roughly \$114,000 per year. The Port spent \$164,000 in FY 04 and expects to spend \$200,000 in FY 05, roughly a 75% increase. No further security-related construction is anticipated.

The study estimate for maintenance and operations using expense rates presented in Table 16 is \$170,154 compared with the Port's reported costs for security of \$164,000 in FY 04 and \$200,000 in 2005. It is assumed that the difference in value is accounted for by increased labor (\$29,846) associated with security enhancement. This labor cost corresponds to 2.7% of the port's labor expenses shown in Figure 11. In addition, replacement of security capital initially provided in Rounds 1 through 4 (infrastructure and equipment) using the capital lifetime rates presented in Table 16 is projected to cost over \$217,000 on an annual basis over the next 10 years. This brings a total forecasted increase in security capital, maintenance and operations, and labor at the Port of Port Arthur to over \$417,000 per year. (It should be noted that this amount does not include costs associated with security capital provided in Port Security Grant Round 5, which totaled \$3,313,960 for the Port of Port Arthur.)

Table 40. Port of Port Arthur Estimated Future Security Expenses.

Future Costs Associated with Port Security					
Year	Capital Expense	Annual Cap. Replacement Allowance	Marginal M&O Increase	Security Force Adjustments	Total Forecasted Increases
1		\$217,580	\$170,154	\$29,846	\$417,580
2		\$217,580	\$170,154	\$29,846	\$417,580
3		\$217,580	\$170,154	\$29,846	\$417,580
4		\$217,580	\$170,154	\$29,846	\$417,580
5		\$217,580	\$170,154	\$29,846	\$417,580
6		\$217,580	\$170,154	\$29,846	\$417,580
7	\$1,523,060	\$217,580	\$170,154	\$29,846	\$417,580
8		\$217,580	\$170,154	\$29,846	\$417,580
9		\$217,580	\$170,154	\$29,846	\$417,580
10		\$217,580	\$170,154	\$29,846	\$417,580
TOTAL		\$2,175,800	\$1,701,540	\$298,460	\$4,175,800

Port of Port Lavaca/Point Comfort

In FY 2004, the Port’s revenue and expense levels were:

Table 41. Port of Port Lavaca Finances.

Operating Revenue	Operating Expense	Operating Income (Loss)	Cash Flow from Operations
\$2,595,466	\$1,853,568	\$741,898	\$741,898

Port staff reported that Operating Expenses have risen approximately 25% since before 9/11. Average operating expenses for the 3 years preceding the 9/11 attack came to \$1,506,720. A 25% increase would bring the total to \$1,883,400, which is very close to the amount reported for 2004 (\$1,853,187). Hence, the impact is an annual increase in operating expenses of approximately \$377,000. Of this amount, \$192,000 was reported as an increase in “Maintenance & Operations,” \$85,000 was reported as an increase in “Security Expenses,” and \$117,000 was reported as an increase in “Utilities” and “Insurance,” for a total change of \$394,000. (Decreases in personnel and “other” expenses account for the difference.)

For FY 1994 through 2001 the annual compounded growth rate for Security and Personnel Costs was 12.7%. Since June 30, 2001, the annual growth rate has actually decreased to 3.2%. This is the only case in which the growth rate for labor expenses decreased after 9/11.

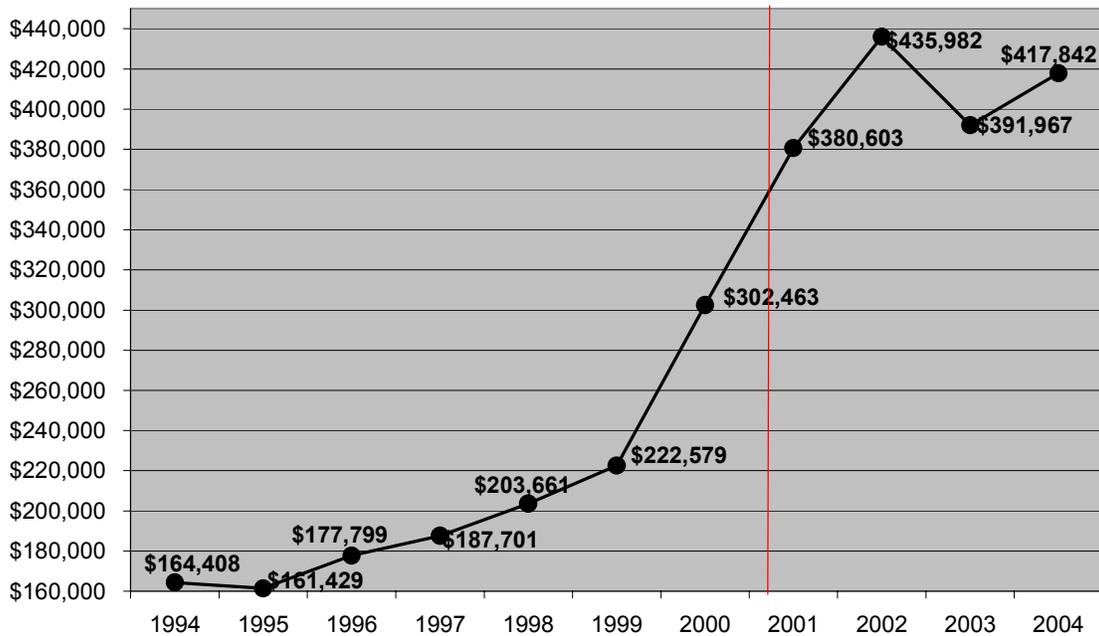


Figure 12. Port Lavaca Labor & Security, FY 1994-FY 2004.

Table 42. Port of Port Lavaca Cost of Security Projects by Type.

Security Projects Involving Port Security Grant Funding (Total expense reported)			
Sec. Assessments	Buildings	Infrastructure	Equipment
-0-	-0-	-0-	\$698,518

The total amount awarded to Port Lavaca/Point Comfort in Port Security Grant Rounds 1 - 4 is \$558,814. The study estimate for maintenance and operations using expense rates presented in Table 16 is \$69,852 compared with the Port's reported costs for security of \$85,000. It is assumed that the difference in value is accounted for by increased labor (\$15,148) associated with security enhancement. This labor cost corresponds to 3.6% of the port's labor expenses shown in Figure 12. In addition, replacement of security capital initially provided in Rounds 1 through 4 (infrastructure and equipment) using the capital lifetime rates presented in Table 16 is projected to cost nearly \$100,000 on an annual basis over the next 10 years. This brings a total forecasted increase in security capital, maintenance and operations, and labor at the Port of Port Lavaca/Point Comfort to nearly \$185,000 per year. The Port of Port Lavaca/Point Comfort was not eligible to receive funding in Port Security Grant Round 5.

Table 43. Port of Port Lavaca Estimated Future Security Expenses.

Future Costs Associated with Port Security					
Year	Capital Expense	Annual Cap. Replacement Allowance	Marginal M&O Increase	Security Force Adjustments	Total Forecasted Increases
1		\$99,788	\$69,852	\$15,148	\$184,788
2		\$99,788	\$69,852	\$15,148	\$184,788
3		\$99,788	\$69,852	\$15,148	\$184,788
4		\$99,788	\$69,852	\$15,148	\$184,788
5		\$99,788	\$69,852	\$15,148	\$184,788
6		\$99,788	\$69,852	\$15,148	\$184,788
7	\$698,518	\$99,788	\$69,852	\$15,148	\$184,788
8		\$99,788	\$69,852	\$15,148	\$184,788
9		\$99,788	\$69,852	\$15,148	\$184,788
10		\$99,788	\$69,852	\$15,148	\$184,788
TOTAL		\$997,880	\$698,520	\$151,480	\$1,847,880

System-Wide

Table 44 provides a total of estimated future security expenses associated with capital provided in Port Security Grant Rounds 1 - 4 for the nine ports included in the study.

Table 44. System-wide Estimated Future Security Expenses.

Future Costs Associated with Grant-funded Security Projects All Ports					
Year	Capital Expense	Annual Cap. Replacement Allowance	Marginal M&O Increase	Security Force Adjustments	Total Forecasted Increases
1		\$5,462,838	\$4,085,135	\$5,706,144	\$15,242,117
2		\$5,462,838	\$4,085,135	\$5,706,144	\$15,242,117
3		\$5,462,838	\$4,085,135	\$5,706,144	\$15,242,117
4		\$5,462,838	\$4,085,135	\$5,706,144	\$15,242,117
5		\$5,462,838	\$4,085,135	\$5,706,144	\$15,242,117
6		\$5,462,838	\$4,085,135	\$5,706,144	\$15,242,117
7	\$31,321,824	\$5,462,838	\$4,085,135	\$5,706,144	\$15,242,117
8		\$5,462,838	\$4,085,135	\$5,706,144	\$15,242,117
9		\$5,462,838	\$4,085,135	\$5,706,144	\$15,242,117
10	\$9,882,938	\$5,462,838	\$4,085,135	\$5,706,144	\$15,242,117
TOTAL	\$41,204,762	\$54,628,380	\$40,851,350	\$57,061,440	\$152,421,170

The raw numbers alone do not provide the context necessary to evaluate the potential impact of security expenses on port finances. Table 45 shows how much the increase in critical assets and security staffing could affect the finances of each port. It compares the estimated future expenses as defined above to Operating Revenues.

Table 45. Projected Security Expense Increases as % of Operating Revenues.

Security Expense Increases as % of Operating Revenues (FY 2004)			
Port	Annual Expense Increase	Operating Revenues FY2004	Security Expense as % of Operating Revenue
Beaumont	\$948,818	\$13,045,212	7.3%
Brownsville	\$487,814	\$9,365,420	5.2%
Corpus Christi	\$3,781,524	\$28,371,297	13.3%
Freeport	\$373,000	\$6,570,514	5.7%
Galveston	\$1,586,549	\$14,474,565	11.0%
Houston	\$7,241,187	\$136,813,000	5.3%
Orange	\$232,857	\$1,365,890	17.0%
Port Arthur	\$417,580	\$4,639,655	9.0%
Port Lavaca	\$184,788	\$2,595,466	7.1%
TOTALS	\$15,254,117	\$217,241,019	7.0%

Security expenses as a percent of operating revenues range from 5.2% to 17.0%. System-wide the average is 7.0% of operating revenues.

Projected Security Expense Increases as % of Operating Revenue

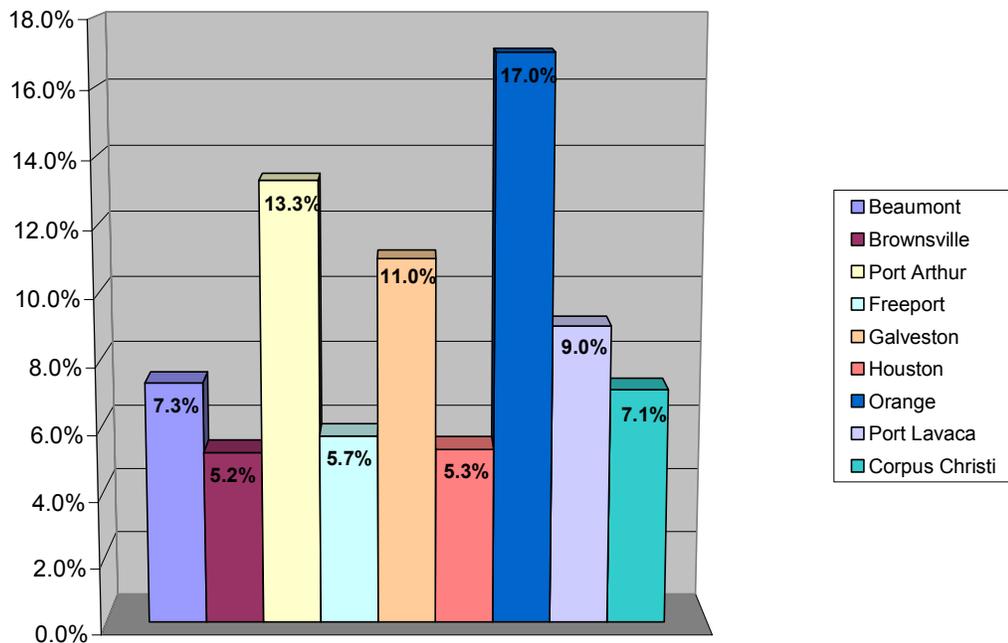


Figure 13. Projected Security Expense Increases.

In summary, although over \$44 million was awarded to these ports in Port Security Grant Rounds 1 - 4, “unfunded” annual costs for capital replacement allowance, maintenance and operation, and labor increases totals over \$15.2 million annually and represents an average of 7.0% of these ports annual operating revenue. Projected costs to these ports over the next decade (over \$152 million) totals nearly 3.5 times the amount awarded in Port Security Grant Rounds 1 - 4, and these amounts do not include increases associated with the over \$22 million awarded to four of these port authorities in Round 5.

Chapter 5 describes how some ports are utilizing fees to offset costs associated with increased security.

CHAPTER 5 – SECURITY FEES

The idea of levying fees or surcharges to recover security-related costs is beginning to take hold across North America, but especially in the Gulf.

In Canada, no port has yet assessed specifically designated security fees. However, the Port of Vancouver raised its “harbor dues” for the first time in 10 years. The 2.7% raise was for the express purpose of meeting the growing cost of security. Although the port authorities have not imposed security fees, the tenant terminal operators of some port authorities have imposed such fees. Fraser Surrey Docks, for example, which operates facilities under lease from the Fraser River Port Authority, is levying a “security surcharge” of C\$1.75 per TEU on “all laden and empty throughput containers”.²³ A similar fee is being assessed by the operators of container terminals in Vancouver. The container terminal operators in Halifax are reportedly considering a fee, but have not yet made a decision.

In Mexico the Ports Directorate of the Mexican Secretariat of Communications and Transportation has initiated a \$10 security fee for each full import or export container, effective February 1, 2005. The local port administrations (“APIs”) are responsible for collecting the fees, which are to be paid by the owner of the cargo or his representative. Sixty percent of the revenue generated by the fees will be distributed to terminals that have been certified under the ISPS code. Forty percent of the fees will be retained by the APIs to cover security-related costs. There is discussion underway about instituting a similar fee for cruise passengers, but many details remain to be worked out.

In the U.S., some legislative proposals call for a Federal security fee on cargo. Ports have been very aggressively resisting any Federal security fees on maritime cargo. Their position is that if Congress must earmark funds for maritime security, the existing fees on maritime commerce should be used, not a new additional tax.

Security surcharges have been, or are due to be, implemented by the South Carolina State Ports Authority (SCSPA), Virginia Port Authority, Georgia Ports Authority, Port of Portland (OR) Port of Redwood City (CA), Port of Stockton (CA), and Port of Corpus Christi Authority (TX), member ports of the Gulf Seaports Marine Terminal Conference (GSMTC), and member ports of the Florida Ports Council.

Florida Ports Council

On June 8, the Florida Ports Council (FPC) adopted specific security fee criteria and rates which will take effect on or prior to January 1, 2006. The FPC is a consortium of the state’s 13 deepwater Florida seaports which has been authorized by the Federal Maritime Commission to establish minimum rates, charges, and practices governing the use and operation of the port members' public wharves and other terminal facilities at their respective ports.

²³ Fraser Surrey Docks Terminal Service Tariffs, January 1, 2005.

Table 46. Florida Ports Council Membership.

Florida Ports Council Member Ports	
Canaveral Port Authority	Port of Palm Beach District
Broward County (Port Everglades)	Panama City Port Authority
Jacksonville Port Authority	City of Pensacola (Port of Pensacola)
Port of Key West	City of St. Petersburg (Port of St. Petersburg)
Manatee County Port Authority	Port of St. Joe
Miami-Dade County (Port of Miami)	Tampa Port Authority
Ocean Highway and Port Authority (Port of Fernandina)	

The FPC took this action “to address rapidly increasing security costs caused by unfunded mandates imposed by state and federal agencies which control seaport security protocols and procedures.” The security fee rates adopted by the conference are as follows:

Dockage: 5% of dockage Fee

Wharfage:

- Breakbulk: \$0.10/short ton
- Bulk: \$0.02/short ton
- Liquid Bulk: \$0.02/short ton
- Containers: \$2 per box
- Passengers: \$1 per embarking multi-day passenger

(Note: Day cruise passenger rates and vehicle fees will be determined at a later date.)

These are minimum rates. Member ports that justify higher fees are permitted to charge more. The effective date is no later than January 1, 2006, but individual ports may, at their discretion, implement the security fees earlier.

Each member port is now reviewing the action with their individual governing bodies, as well as with customers and users affected by the security fees.

South Carolina State Ports Authority

SCSPA’s fee became effective July 1, 2004. It is \$1 per foot on the overall length of each vessel or barge calling any terminal within its jurisdiction. This was expected to raise about \$1 million a year.²⁴

²⁴ Journal of Commerce, April 19-25, 2004, p. 25.

Redwood City (CA)

Redwood City began implementing its security fee on February 1, 2005, to cover the cost of security guards being positioned on the wharf whenever a ship is tied up. The fees are for the account of the vessel's owner(s). The port is contemplating another tariff fee to charge for security infrastructure costs.

Stockton (CA)

Stockton's fee became effective March 1, 2005. It is \$0.12 per deadweight ton on all vessels calling at port wharves in order to defray expenses associated with various mandated security measures. The fee does not cover additional services such as watchmen required during the loading or discharge of certain cargoes or as mandated by governmental or law enforcement authority.

Gulf Seaports Marine Terminal Conference

The item of most relevance to Texas ports is the recent action taken by the Gulf Seaports Marine Terminal Conference. GSMTC announced on October 25, 2004, that it would file notice with the Federal Maritime Commission of its intention to impose a security fee for vessels and cargo utilizing Gulf ports. The membership consists of 20 U.S. Gulf public port authorities. Of the nine Texas ports included in the study, only the Port of Port Lavaca is not a member. (Note: The various port tariffs differ in their membership list. This table uses the list provided by the American Association of Port Authorities.)

Table 47. Gulf Seaports Marine Terminal Conference Membership.

Gulf Seaports Marine Terminal Conference Member Ports	
Board of Commissioners of the Port of New Orleans	Brownsville Navigation District of Cameron County, Texas
Board of Commissioners of Lake Charles Harbor and Terminal District	Port of Port Arthur Navigation District of Jefferson County, Texas
Greater Baton Rouge Port Commission	Tampa Port Authority
Orange County Navigation & Port District, Orange, Texas	Port of Corpus Christi Authority
Mississippi State Port Authority at Gulfport	Panama City Port Authority
Board of Commissioners of the Port of Beaumont, Navigation District of Jefferson County, Texas	Port of Pensacola
Port Commission of the Port of Houston Authority of Harris County, Texas	Brazos River Harbor Navigation District, Freeport, Texas
Board of Trustees of the Galveston Wharves	Port of Pascagoula, Pascagoula, Mississippi
Alabama State Docks – Port of Mobile	Manatee County Port Authority
South Louisiana Port Commission	St. Bernard Port, Harbor, and Terminal District

The conference felt that “fees assessed only against cargo would not be equitably distributed, because of all-inclusive rates and container rates for vessels, which typically include port charges.” Therefore, it decided to assess the fee against vessels and barges with the exception of containers, which would be assessed on a per unit basis.

The agreed-upon fee structure is:

Vessels: 5% of total dockage assessed per port call

Cargo:

- Breakbulk: 10 cents per ton
- Dry bulk: 2 cents per ton
- Liquid bulk: 2 cents per ton
- Containers: \$2 per box
- Vehicles: TBD
- Passengers: \$1 per passenger

The container assessment will be billed to the carrier and not the cargo interest in accordance with the practice that has been established at other ports.

The required implementation date was no later than April 1, 2005, although individual members were permitted to implement the fee as they determine it was required. Of the eight Texas ports that are members, seven implemented the fee on April 1, 2005.

Port of Corpus Christi Authority

The Port of Corpus Christi Authority took independent action apart from the GSMTC. Corpus Christi’s fee went into effect August 1, 2004. It consists of a 10% surcharge on all dockage, wharfage, and Terminal Use rates. On January 1, 2005, the surcharge was automatically increased to 10.5% and will continue to increase by 0.5% per year until it reaches 12%.

Port of Port Lavaca/Point Comfort

The Port of Port Lavaca/Point Comfort (the sole GSMTC non-member port) also instituted its own version of a security fee, which is levied against inland barges and tugs only. The fee became effective on January 18, 2005.

CHAPTER 6 – CONCLUSIONS AND OBSERVATIONS

Chapters 3 and 4 have highlighted the financial conditions at nine public Texas ports and projected future costs to the ports associated with port security. In particular, although over \$44 million was awarded to these ports in Port Security Grant Rounds 1 - 4, “unfunded” annual costs for capital replacement allowance, maintenance and operation, and labor increases totals over \$15.2 million annually and represents an average of 7.0% of these ports annual operating revenue. Projected costs to these ports over the next decade total nearly 3.5 times the amount awarded in Port Security Grant Rounds 1 - 4, and these amounts do not include increases associated with the over \$48 million awarded to four of these ports in Round 5. Chapter 5 details some measures that ports around the country are implementing to offset increased security costs, but it remains to be seen the degree to which these additional security costs can be accounted for.

In addition, several policy concerns exist that have not yet been resolved at the federal level:

- According to the Inspector General’s reports, funding for Rounds 1 - 4 was not allocated based on risk or vulnerability. Round 5 was structured differently to address this concern. In the case of Texas ports, the awards for Rounds 1 - 4 tended to track the effect of anticipated security expenses on the financial operating condition of the ports, with two notable exceptions: Galveston and Orange. The question of how best to allocate limited funds in such a way as to mitigate risk to the maximum extent possible is still being debated.

Table 48. Comparison of Port Financial Condition vs. Grants Awarded.

Port	Annual Expense Increase*	Operating Revenues FY 2004	Exp % of Oper. Rev.	Rank <	Rank >	Grants Awarded	Grants Awarded as % of Oper. Rev.
Beaumont	\$948,818	\$13,045,212	7.3%	5	4	\$4,332,106	33.2%
Brownsville	\$487,814	\$9,365,420	5.2%	9	9	\$435,400	4.6%
Corpus Christi	\$3,781,524	\$28,371,297	13.3%	2	2	\$11,808,198	41.6%
Freeport	\$373,000	\$6,570,514	5.7%	7	5	\$1,709,000	26.0%
Galveston	\$1,203,549	\$14,474,565	8.3%	4	1	\$6,862,406	47.4%
Houston	\$7,241,187	\$136,813,000	5.3%	8	8	\$16,980,217	12.4%
Orange	\$232,857	\$1,365,890	17.0%	1	6	\$325,000	23.8%
Port Arthur	\$387,734	\$4,639,655	8.4%	3	3	\$1,645,440	35.5%
Port Lavaca	\$184,788	\$2,595,466	7.1%	6	7	\$558,814	21.5%

* associated with DHS Port Security Grant Rounds 1 - 4.

- A potential unintended consequence of the historical manner of distributing funds is that a competitive imbalance could be created. All ports are required to meet a certain minimum level of security, but ports with slim financial margins will have to establish higher and broader security fees than other ports. In a world where transportation costs are being aggressively monitored, this could create a disadvantage for several ports.

- Another potential unintended consequence is that ports will have uneven levels of security. This is not necessarily a problem, unless some ports fail to reach a minimum level of security. The possibility exists that as some port complexes are “hardened,” terrorists could seek entry ports that are less rigid. It is important to keep in mind that successful terrorist attacks to date have all employed readily accessible equipment and used everyday modes of transportation to arrive at their destination. Ports that do not meet a minimum level could be the entry point for such individuals.
- There will likely continue to be an ongoing debate about how much financial responsibility the federal government should assume for security infrastructure. Currently, the federal government takes the position that homeland security is a shared effort and financial responsibility. Ports take the position that terrorist threats are a national security concern, and the federal government should take responsibility for dealing with them.
- The financial effects are just now beginning to solidify. As more security projects are completed, the financial responsibility of the ports will rise. Personnel, maintenance, and operations expenses will certainly continue to rise from pre-9/11 and even current levels.
- The Port Security Grant Program has helped ports get their basic security infrastructure established. However, it is not clear who will pay to replace worn-out or technically obsolete equipment and infrastructure in the future. Until this question is resolved, ports will have to accumulate the funds to deal with this issue.
- With the exception of the Port of Houston, Texas ports rely principally on internally generated cash to finance their asset acquisitions. Six of the nine ports already rely on taxes for a significant portion of their cash flow. It will be difficult to raise taxes to pay for security measures. This means that it will be necessary to institute significant security fees or rely more on private business to assist with security.
- As a whole, Texas ports appear to be in a stable financial position. However, security expenses could consume anywhere from 5.2% to 17.0% of operating revenue at a given port. This will force a slow-down to some degree of infrastructure development until a funding stream can be generated to offset this increased expense. A sudden loss of cargo traffic could generate a financial crisis for Texas ports, which would be augmented by increased security costs and reductions to operating revenue.

ALTERNATIVE SECURITY FINANCING SCHEMES

Two alternatives for financing security measures have already been discussed in this report: port security grants and security fees. There are several other possibilities that have been—or are being—debated in the public arena. While there are many possible variations, the following options are some of the most publicized alternatives:

Various port charges: As discussed in Chapter 5, ports are authorized to assess fees and surcharges to recoup security expenses required to comply with post-9/11 regulations. These

fees may be assessed against vessels, the cargo, or the carrier; they may also take the form of terminal use fees or similar mechanisms.

As ports begin to assess these fees, they must weight the potential commercial implications in terms of their competitiveness vis-à-vis other ports. Of course, vessel owners and operators can be expected to resist all efforts to assess fees—some claim that vessel fees are a double charge because vessels also have security responsibilities under international law--so customer relations must also be considered.

The American Association of Port Authorities (AAPA) supports the ability of a public port authority to establish user fees to be assessed at the local level or on a project basis to fund its security, dredging, or landside access needs. Port authorities already have significant authority under common law and other legal precedents to charge appropriate user fees for services and benefits they provide.

DHS appropriations: Thus far, most of the federal government’s financial participation has been through appropriations for DHS. This is the port industry’s preferred alternative.

Earmark customs fees: A certain percentage of duties collected on articles transported by vessel and unloaded for purposes of entering the customs territory of the United States could be set aside for security improvements. One example of this is the bill HR 2193 that was introduced by Congressman Doug Ose (CA 3) in May of 2003. In general terms, his bill would have made available to the Secretary of Homeland Security for security enhancements at each port over each of the next five fiscal years 30 % of the difference between the amount of duties collected at each port and the port’s security costs. AAPA supports this general concept and specifically supported Congressman Ose’s bill. According to information published by the AAPA, a 2002 GAO report revealed that maritime commerce already pays over \$16 billion a year in user fees and taxes (approximately 127 taxes and fees), including \$15.2 billion in Customs fees that go directly to the General Fund.

Such a mechanism would not be without precedent. According to information published by AAPA, under 7 U.S. Code §612 a total of 30% of Customs duties is already designated for agricultural and food programs. Pursuant to 16 U.S. Code §3912, all duties on guns and ammunition are credited to the Migratory Bird Conservation Fund, and under 26 U.S. Code §9504, duties on fishing tackle, yachts, and pleasure craft are credited to the Sports Fish Restoration Account of the Aquatic Resources Trust Fund. In addition, tariffs from wood and certain wood products are credited to the Reforestation Trust Fund up to a total of \$30 million under 16 U.S. Code §1606a.

Federal security fees: Several bills have been introduced that would establish federal user fees to help offset the costs of security at the national level. One example is S. 1052 introduced by Sen. Ted Stevens (AK) in May 2005. This bill would “study...the feasibility and desirability of establishing a system of oceanborne and port-related intermodal transportation user fees that could be imposed and collected as a dedicated revenue source, on a temporary or continuing basis, to provide necessary funding for the improvement and maintenance of enhanced port security.”

AAPA does not generally support new national user fees or taxes to cover port system expenditures. It is their position that assessing any national user fee on international commerce presents a complex set of legal, commercial, and competitive challenges that are difficult to overcome. The port industry has been dissatisfied with the way the Harbor Maintenance Tax (HMT, a tax ostensibly charged to cover the cost of dredging deepwater ports) has been implemented and managed. Since enacted in 1986, the HMT has been subject to legal challenge both under the U.S. Constitution and under international treaties (the tax on exports has already been repealed as unconstitutional), surpluses have built up in the trust fund, and AAPA has had to fight numerous proposals to expand the use of the fund beyond maintenance dredging.

It will be important for Texas ports to find ways to merge operational and security practices and information management in such a way that efficiencies and cost reductions can be realized in the operations of the port. While some security measures are strictly overhead expenses, many operational best practices are also good security practices (and vice versa). Implementing such practices and using data for a variety of purposes could very well augment the financial stability of Texas ports.

SUGGESTIONS FOR FUTURE RESEARCH

During the course of this study, several issues for further analysis surfaced that were outside the scope of this study. For example:

- 1) What is the financial condition of the port system nationwide?
- 2) Is the impact (measured in terms of percentage of operating revenue) of security expenses the same across the nation, or are there regional differences?
- 3) In the light of impacts projected in this study, are Port Security Grant program funding levels and categories adequate?
- 4) Are competitive imbalances being created as a result of the manner in which security grants are being allocated?

APPENDIX A – PORT PROFILES

The material included in this appendix was taken primarily from the Texas Port Association 2005 "Project List" submitted to the Texas Transportation Commission in February 2005. In some cases revenue and cargo statistics were updated or restated to conform to the general presentation format.

Two ports were not included in the port profiles contained in the Texas Port Association document: Port Freeport and Port of Port Arthur. Information on these two ports was extracted from their web sites, annual reports, and audited financial statements.

PORT PROFILE PORT OF BEAUMONT

Governing Body: The Port of Beaumont Navigation District of Jefferson County, TX—a political subdivision of the state of Texas.

Mission: The Port of Beaumont is responsible to the taxpayers of its district for the improvement of navigation and the development of maritime shipping and waterborne-related commerce to and from its wharves; and for the maintenance, development, extension, and improvement of wharf and dock facilities of the Port of Beaumont to promote economic growth in our district and the State of Texas and in the interest of national defense.

Major Goals and Objectives:

- Be a competitive force along the Gulf Coast and maximize the flow of waterborne trade by providing highly productive facilities, equipment, and support services to meet the needs of its customers.
- Improve marine terminals, build new cargo handling capacity, and promote private investment to the benefit of the taxpayers' interest within the Port of Beaumont.
- Be a leader in providing services and facilities to accommodate the transportation of cargo and to foster economic growth and development for Beaumont, Jefferson County, and the Southeast Texas Region.

Hinterland Served:

Beaumont, Jefferson County, State of Texas, and the Midwest and Western United States

Principal Trading Partners:

Brazil, Mexico, Colombia, Argentina, China, South Africa, and others

Principal Activities and Products:

- Import and export breakbulk, bulk, and containerized cargo, with emphasis on forest products, agricultural commodities, aggregate, ash products, and project cargo. Beaumont is a strategic port for the U.S. Military and also has layberths for Maritime Administration ships.
- Imports: Breakbulk forest products, sugar, aggregate, military cargo, steel
- Exports: Bulk grain, soda ash, potash, forest products, USDA bagged agricultural commodities, sugar, military cargo

	<u>2001</u>	<u>2002</u>	<u>2003</u>	<u>2004</u>
Cargo (tons)	2,739,655	2,978,172	2,848,285	2,954,139
Revenues	\$12,812,093	\$12,394,166	\$17,692,932	\$19,001,331

**PORT PROFILE
PORT OF BROWNSVILLE**

Governing Body: The Brownsville Navigation District is governed by a Board of Commissioners consisting of five elected officials. These commissioners serve four-year terms on a staggered basis.

Mission: To be a leader in developing economic opportunities, improving the quality of life and creating jobs for the citizens of the communities we serve, creating the best transportation facilities possible, and exhibiting high standards of public administration.

Major Goals and Objectives:

- To facilitate load movements and provide efficient intermodal links
- To increase the productivity in the Port
- To operate with high levels of quality, efficiency, and competitiveness
- To operate according to ecological regulations
- To strengthen and maintain the relationship between Port/City/Region
- To attract new industry to the area

Hinterland Served:

Mexico, Central/South America and United States

Principal Trading Partners:

Mexico, Central/South America, China, Korea, Japan, Germany, and Belgium

Principal Activities and Products:

- Petroleum products
- Steel
- Ores and minerals

	<u>2001</u>	<u>2002</u>	<u>2003</u>	<u>2004</u>
Cargo (metric tons)	3,680,000	4,210,000	3,650,000	3,760,000
Revenues	\$11,964,936	\$12,149,061	\$17,610,901	\$14,173,180

PORT PROFILE PORT OF CORPUS CHRISTI

Governing Body: The Port of Corpus Christi Authority is a navigation district and political subdivision of the State of Texas. The Authority is governed by a Port Commission composed of seven commissioners: three appointed by the City of Corpus Christi City Council and three appointed by the Nueces County Commissioners Court and one appointed by the San Patricio County Commissioners Court.

Mission: It is the mission of the Port of Corpus Christi to serve as a regional economic development catalyst while protecting and enhancing its existing industrial base and simultaneously working to diversify its international maritime cargo business. In pursuit of this mission, the Port shall be guided by the following basic principles:

- The Port shall conduct its affairs in a positive, open, and cooperative manner;
- The Port shall operate in a fiscally responsible manner;
- The Port shall be a positive and proactive force in the protection of the region's marine and water-related resources; and
- The Port shall be committed to serving its customers—present and future.

Major Goals and Objectives:

- Deepening and widening of the Corpus Christi Ship Channel and extending the La Quinta Channel
- Development of La Quinta Trade Gateway
- Construction of the Joe Fulton International Trade Corridor
- Security enhancements
- Expansion of strategic military and layberth sites
- Construction of new oil dock
- Expansion of refrigerated warehouse facilities
- Expansion of conference center/cruise terminal

Hinterland Served:

Texas, Central and Western United States, Canada, and Mexico

Principal Trading Partners:

Venezuela, Nigeria, Mexico, Saudi Arabia, Colombia, Algeria, Kuwait, United Kingdom, Australia, New Zealand, and Cuba

Principal Activities and Products:

- Dry bulk terminals, general cargo terminals, public and private oil docks, refrigerated warehouse, grain terminals, cotton compress, day cruises, multi-purpose cruise terminal/conference center
- Imports: Crude oil, gas oil, fuel oil, bauxite ore, feed stock, naphtha, condensate, reformat, toluene, frozen beef, fresh fruits
- Exports: Fuel oil, gasoline, feed stock, diesel, alumina, petroleum coke, toluene, cumene gas oil, asphalt, coal
- Strategic military deployment seaport for Department of Defense: 60 ships loaded, 4,500 rail cars unloaded, and 15,000 vehicles and containers loaded in 2003 during Operation Iraqi Freedom and Operation Enduring Freedom

	<u>2001</u>	<u>2002</u>	<u>2003</u>	<u>2004</u>
Cargo (tons)	87,035,957	80,958,923	85,131,124	86,393,801
Revenues	\$27,673,183	\$26,711,806	\$28,102,712	\$30,910,996

**PORT PROFILE
PORT FREEPORT**

Governing Body: Port Freeport is governed by the Board of Navigation and Canal Commissioners, a board of six commissioners that serve six-year staggered terms. The commissioners are elected by the voters of the Navigation District of Brazoria County, which currently encompasses 85% of the county.

Mission: The Brazos River Harbor Navigation District/Port Freeport serves its customers and stakeholders through the development and marketing of competitive world class navigational capabilities, technically advanced marine and multimodal terminal services and port-related industrial facilities while achieving profits and creating jobs as a leading economic catalyst for the District and the Texas Gulf Coast.

Major Goals and Objectives:

Hinterland Served:

Principal Trading Partners:

Africa, Brazil, Dominican Republic, Guatemala, Honduras, Saudi Arabia, Mexico, and Venezuela

Principal Activities and Products:

- Imports: aggregate, chemicals, clothing, foods (bananas), plastics
- Exports: autos, chemicals (resin, etc.), clothing, foods (rice), plastics, paper goods

	<u>2002</u>	<u>2003</u>	<u>2004</u>
Cargo (tons)	2,978,172	2,848,285	2,954,139
Revenues	\$11,812,892	\$12,190,166	\$12,721,854

PORT PROFILE PORT OF GALVESTON

Governing Body: The Board of Trustees of the Galveston Wharves is a municipally-owned port operated by a public agency.

Mission: The mission of the Board of Trustees of the Galveston Wharves is to manage the assets and resources under its stewardship so as to create optimum economic benefit for the City of Galveston and its local region.

Major Goals and Objectives:

Improve the competitive position of the port in relation to the state-funded ports in Louisiana, Mississippi, Alabama, and Florida by accomplishing the following:

- Complete improvements to Cruise Terminal No. 2.
- Relocate rail tracks to improve vehicular traffic flow in front of cruise terminal complex.
- Construct a third Cruise Ship Terminal and Berth.
- Construct channel-front bulkhead, fill in antiquated slips, make improvements to pier and apron and construct paved area for intermodal, heavy equipment, and bulk cargo handling.
- Construct at least 10,000 square feet of state-of-the-art warehouse.
- Demolish obsolete and out-of-service warehouses.

Hinterland Served:

Galveston, Galveston County, Harris County, Fort Bend County, Brazoria County, Chambers County, the State of Texas, and surrounding states and U.S. Midwest

Principal Trading Partners:

Mexico, Guatemala, Panama, Colombia, Venezuela, Brazil, Dominican Republic, Spain, Italy, Egypt, Israel, Turkey, Bulgaria, Belgium, England, Germany, Saudi Arabia, United Arab Emirates, Kuwait, Singapore, and China

Principal Activities and Products:

- Cruise ship operations, roll-on/roll-off operations, grain export operations, general dry bulk import and export operations, liquid bulk storage and export operations, refrigerated cargo operations, offshore support services, vessel and offshore rig repair services, container operations
- Imports: containers, bananas, agricultural equipment, machinery, vehicles, fertilizer products, lumber products, military-related cargoes

- Exports: bulk grains, containers, machinery, vehicles, liner board and paper, carbon black, light fuels

	<u>2003</u>	<u>2004</u>	<u>2005</u> <u>(Projected)</u>
Cargo (tons)	3,429,084	3,443,893	3,492,452
Cruise passengers	338,654	419,663	473,850
Revenues	\$14,565,384	\$16,207,846	\$15,919,050

PORT PROFILE PORT OF HOUSTON

Governing Body: The Port of Houston Authority is governed by a board of seven commissioners appointed by the officials of local governments located along the Houston Ship Channel. The commissioners serve without pay and are appointed for two-year terms, which are staggered so that three or four commissioners are up for reappointment each year.

Mission: The mission of the Port of Houston Authority is to provide, operate, and maintain waterways and cargo passenger facilities to promote trade and generate favorable economic effects on and contribute to the economic development of the Port Authority, the City of Houston, Harris County, and the Texas Coastal Region at rates that provide sufficient funds to cover the Port Authority's operational expenses and capital investments.

Major Goals and Objectives:

Hinterland Served:

Houston, Harris County, State of Texas, Midwest, Central and Southwest US, Canada, and Mexico

Principal Trading Partners:

Mexico, Venezuela, Saudi Arabia, Algeria, United Kingdom, Germany, and Brazil

Principal Activities and Products:

- The Port of Houston Authority owns 44 general cargo wharves, six container wharves, six liquid bulk wharves, and three dry bulk wharves available for public hire. The Port Authority facilities include the Turning Basin, the Houston Public Grain Elevator, Woodhouse Terminal, the Bulk Materials Handling Plant, Fentress Bracewell Barbour's Cut Container Terminal, Jacintoport Terminal, Care Terminal, Bayport Terminal, PHA Container Terminal-Galveston, and the PHS Cruise Terminal. The Port Authority operates the Malcolm Baldrige Foreign Trade Zone. The authority facilities handle approximately 15% of the cargo moving through the port.
- Imports: petroleum & petroleum products, crude fertilizers, minerals, organic chemicals, iron & steel, beverages
- Exports: petroleum & petroleum products, organic chemicals, cereals & cereal products, plastics, animal or vegetable fats & oils

	<u>2001</u>	<u>2002</u>	<u>2003</u>	<u>2004</u>
Cargo (tons)				
Authority	27,460,000	28,660,000	30,019,000	32,757,000
Total	185,050,000	177,561,000	190,923,000	N/A
Revenues	\$148,742,000	\$149,428,000	\$161,541,000	\$172,864,000

**PORT PROFILE
PORT OF ORANGE**

Governing Body: The Orange County Navigation and Port District was created in 1953 by an Enabling Act of the Texas Legislature. The Port has two roles, one as the Port Authority and the other as the Industrial Development Authority.

Mission: To facilitate economic development activities that benefit both the Port and County

Major Goals and Objectives:

- Comply with future Federal “Homeland Security” & “IMO” criteria
- Request State support in bond solicitation for facilitating commercial capital improvements

Hinterland Served:

City, County, State of Texas, United States, Europe, and Third World Countries

Principal Trading Partners:

Principal Activities and Products:

- The Port facilities and equipment include four berths with a total of 2,300 feet of docking space at a depth of 30 feet, a grain elevator and bagging facility, and eight warehouses.
- The Port docks are currently used for layberth and ship repair. Our docks are regularly used by MARAD, which is a division of the US Department of Transportation, to service, repair, and maintain the military ready reserve fleet.

	<u>2001</u>	<u>2002</u>	<u>2003</u>	<u>2004</u>
Cargo (tons)	798,000	764,000	825,000	N/A
Revenues*	\$2,260,521	\$1,889,001	\$1,990,561	\$1,969,975

*Port revenues

**PORT PROFILE
PORT OF PORT ARTHUR**

Governing Body: Board of Port Commissioners, a five-member board, governs the affairs of the District with management responsibilities vested in the Port Directorate Office.

Mission:

Major Goals and Objectives:

Hinterland Served:

Principal Trading Partners:

Principal Activities and Products:

- Imports: doorskins, forest/lumber products, newsprint, plywood, steel slabs, steel/aluminum products, paper products, oriented structure board
- Exports: lumber, bentonite, linerboard, newsprint, plywood, steel products, wood pulp, cotton, trucks

	<u>2001</u>	<u>2002</u>	<u>2003</u>	<u>2004</u>
Cargo (tons)	884,223	756,204	846,794	1,018,180
Revenues	\$6,413,140	\$6,634,218	\$7,154,804	\$8,409,571

**PORT PROFILE
PORT OF PORT LAVACA**

Governing Body: Board of Commissioners, Calhoun County Navigation District, operating the Port of Port Lavaca/Point Comfort

Mission: To provide competitively priced deep and shallow draft port facilities and waterway infrastructure to the industries of Calhoun County and the Mid-Texas Gulf Region

Major Goals and Objectives:

- Improve security infrastructure at liquid bulk terminal facilities
- Renovate existing berth to add liquid bulk & intermodal connection capabilities
- Expand agricultural export capability

Hinterland Served:

Calhoun County and the surrounding seven counties “Mid-Texas Gulf” Region, primarily Midwest, Southwest United States

Principal Trading Partners:

Mexico, Caribbean Nations, Middle & Far East

Principal Activities and Products:

- Petrochemical feedstocks and refined commodities
- Agricultural fertilizers and specialty chemicals

	<u>2001</u>	<u>2002</u>	<u>2003</u>	<u>2004</u>
Cargo (tons)	3,600,597	4,672,378	5,645,758	5,252,698
Revenues				
General Fund	\$3,232,899	\$3,151,445	\$3,701,266	\$2,902,101
Enterprise	\$3,046,051	\$2,658,758	\$2,582,175	\$2,802,910

APPENDIX B – PLANNED CAPITAL PROJECTS

The following summaries were taken from the Texas Ports Association and Port Authority Advisory Committee 2005 "Project List" published in February 2005.

Port of Beaumont

FY 2005		FY 2006	
Project Description	Estimated Cost	Project Description	Estimated Cost
Facilities – Construct sheet pile wall for bank stabilization and erosion control at end of #7 dock terminal	\$ 1,600,000	Intermodal – Expand roadway and rail infrastructure, including rail holding yard for commercial and military cargo at Orange County facilities	\$ 6,500,000
Intermodal – Expansion of rail loading/unloading infrastructure (phase 2 of port rail expansion program)	\$ 8,100,000	Facilities – Construct 60-acre hard surface open storage lot for cargo staging on port's Orange County property	\$ 5,500,000
Intermodal – Construct access roadway connecting IH-10 to Orange County property	\$ 4,000,000	Facilities – Construct 150,000 sq ft all-purpose transit shed with rail and truck access	\$ 7,000,000
Equipment – Purchase heavy duty reach stacker for container-on-barge facility	\$ 800,000	Equipment – Purchase mobile harbor crane	\$ 3,500,000
Facilities – Dredge to 40' and construct 1,000 ft dock facility for general and military cargo on port's Orange County property	\$ 12,000,000	Facilities – Dredge to depth of 40' and install mono-pile dock structure for general handling facility on Orange County property	\$ 6,000,000
TOTAL:	\$ 26,500,000	TOTAL:	\$ 28,500,000

Port of Brownsville

FY 2005		FY 2006	
Project Description	Estimated Cost	Project Description	Estimated Cost
Security – Cameras, lighting, vehicle pass permit system, and railroad car inspection platform	\$ 295,000	Repair elevated water storage tank	\$ 500,000
New breasting structure – Oil Dock 5	\$ 450,000	Refurbish Sheds 12, 13, and 14	\$ 250,000
Refurbish Bulk Cargo Dock	\$ 1,200,000	Reconstruct Anchor Road	\$ 100,000
Install Oil/water separator in Fishing Harbor Waste Water Treatment Plant	\$ 40,000	Construct new maintenance facility	\$ 300,000
Reconstruct port main entrance	\$ 115,000		
Expand Chemical Road entrance	\$ 59,000		
Replace water line along Oil Dock Road	\$ 100,000		
TOTAL:	\$ 2,259,000	TOTAL:	\$ 1,150,000

Port of Corpus Christi

FY 2005		FY 2006	
Project Description	Estimated Cost	Project Description	Estimated Cost
Construct 11.5 mile road and rail project in Fulton International Trade Corridor that will improve access to more than 2,000 acres of land – Year 1	\$ 2,885,000	Construct 11.5 mile road and rail project in Fulton International Trade Corridor that will improve access to more than 2,000 acres of land – Year 2	\$ 1,165,000
Improvements to Tule Lake Lift Bridge	\$ 1,090,000	Deepening of Corpus Christi Ship Channel from 45' to 52'	\$ 6,446,000
Extension of La Quinta Ship Channel, widening ship channel across Corpus Christi Bay, and construction of barge shelves	\$ 7,451,000	Upgrade Oil Docks 8 and 11 to accommodate larger ships	\$ 1,750,000
Development of La Quinta container terminal—highway and rail access & water, sewer, and other utilities (Year 1)	\$ 4,000,000	Development of La Quinta container terminal—highway and rail access & water, sewer, and other utilities (Year 2)	\$ 10,000,000
Facility improvements to meet operational needs of military	\$ 28,550,000		
Upgrade Oil Dock 4 to accommodate larger ships	\$ 986,000		
Security – new fencing, lighting, video surveillance, and thermal imaging cameras at hazardous materials docks	\$ 480,000		
Construct water taxi landing and plaza area	\$ 17,000		
Improvements to existing warehouse to accommodate passenger embarkation/ disembarkation area	\$ 00,000		
TOTAL:	\$ 46,059,000	TOTAL:	\$ 19,361,000

Port Freeport

Note: Freeport was not included in the Texas Ports Association document. Freeport's information was extracted from its 2005/2006 Capital Budget.

FY 2005		FY 2006	
Project Description	Estimated Cost	Project Description	Estimated Cost
Berth 7, Phase I	\$ 1,191,000	Berth 7, Phases I and II	\$ 22,783,000
Heavy equipment storage area	\$ 59,000	Berth 5 extension	\$ 300,000
Cool storage facility, Transit Shed 2 and Cubicle 4	\$ 4,253,000	5 th Street Entrance (Gate 12)	\$ 80,000
Parcel 25 development	\$ 400,000	Parcel 25 development	\$ 648,000
Truck Transfer Station	\$ 795,000	Truck Transfer Station	\$ 750,000
Truck queuing area	\$ 450,000	Utility Improvements	\$ 1,830,000
Utility improvements	\$ 200,000	Land Improvements, Parcel 14	\$ 500,000
Land Improvements, Parcel 14	\$ 500,000	Security improvements	\$ 620,000
Security Improvements	\$ 1,092,000	Channel deepening project	\$ 700,000
New customer facilities (Turbana)	\$ 348,500	Ro/ro ramp/dock	\$ 200,000
Channel deepening project	\$ 700,000	Transit Sheds	\$ 8,000,000
Transit sheds	\$ 8,000,000		
Capitalized maintenance—various projects	\$ 945,000		
TOTAL:	\$ 18,933,500	TOTAL:	\$ 36,411,000

Port of Galveston

FY 2005		FY 2006	
Project Description	Estimated Cost	Project Description	Estimated Cost
Security – signage, surveillance systems, fencing, and traffic control devices at Cruise Terminal Complex	\$ 2,000,000	Construct 75,000 sq ft storage warehouse at or near Pier 34	\$ 2,700,000
Relocate Mallory Storage Yard or pave around rail tracks	\$ 1,000,000	Construct roads and rehabilitate railroad crossings to improve internal traffic circulation	\$ 5,000,000
Cruise Terminal 2 improvements (pave stores delivery area, construct parking lot, construct covered pick-up/drop-off area, frontage expansion, and 10,000 sq ft warehouse adjacent to terminal)	\$ 1,365,000	Pier 34-35 pier and apron repair and reconstruction	\$ 500,000
Premium parking facility and parking lot improvements for cruise passenger parking convenience	\$ 1,100,000	Warehouse renovation and improvements necessary to construct Cruise Terminal 3	\$ 12,000,000
Improve Pier 34 upland with utilities, lighting, paving, and a rail/truck loading docks	\$ 5,000,000	Parking garage at cruise terminals for cruise passenger parking	\$ 12,000,000
Pier 35 repairs	\$ 100,000	Construct turning basin within harbor	\$ 2,000,000
Paving and fencing – New Wharf Road	\$ 85,000	Land acquisition near deep water for international commerce	\$ 1,200,000
Install sprinkler system in Plant 14	\$ 100,000	Multipurpose mobile crane	\$ 1,000,000
Harbor deepening	\$ 8,500,000		
Demolition of Pier 40 warehouse and portions of Pier 39 warehouse, repair wharf and apron, and install lighting	\$ 600,000		
TOTAL:	\$ 19,850,000	TOTAL:	\$ 36,400,000

Port of Houston

FY 2005		FY 2006	
Project Description	Estimated Cost	Project Description	Estimated Cost
North Turning Basin Access Validation Center	\$ 4,427,000	Gate AA Guard House, Access Controls, and Lighting	\$ 1,288,000
North Turning Basin Restricted Area Access Control	\$ 4,300,000	Bayport Cruise Terminal #1 Construction	\$ 20,309,000
South Turning Basin Physical Security/Access Control, fencing, perimeter controls and lighting	\$ 1,300,000	Bayport Cruise Terminal #1 passenger gangway	\$ 2,200,000
Barbours Cut truck pregate and inspection facility	\$ 10,294,000	Bayport Container Yard Phase 1 Construction	\$ 10,530,000
Bayport Phase 1 Marine Terminal Gate	\$ 18,700,000	Woodhouse Paving – Phase II	\$ 3,900,000
Bayport Container Yard – Phase 1	\$ 45,500,000	Synthetic Resin bagging and storage warehouse	\$ 2,500,000
Road and drainage improvements for Industrial Park East	\$ 3,100,000		
Turning Basin - replacement of transit Shed #9	\$ 1,600,000		
Woodhouse paving and tunnel removal – Phase 1	\$ 9,300,000		
Bayport Cruise Terminal #1	\$ 6,610,000		
Bayport Cruise Terminal #1 Wharf Construction	\$ 16,660,000		
TOTAL:	\$121,791,000	TOTAL:	\$ 40,727,000

Port of Orange

FY 2005		FY 2006	
Project Description	Estimated Cost	Project Description	Estimated Cost
Construct permanent command center	\$ 600,000	Phase 1 of project cargo heavy lift dock – 770’ of bulkhead	\$ 1,000,000
Rail rehabilitation	\$ 2,500,000		
TOTAL:	\$ 3,100,000	TOTAL:	\$ 1,000,000

Port of Port Arthur

FY 2005		FY 2006	
Project Description	Estimated Cost	Project Description	Estimated Cost
Not Available			
TOTAL:	\$ 0	TOTAL:	\$ 0

Port of Port Lavaca

FY 2005		FY 2006	
Project Description	Estimated Cost	Project Description	Estimated Cost
Security Infrastructure	\$ 150,000	Land acquisition	\$ 1,000,000
Berth improvements	\$ 250,000	General Cargo Dock improvements	\$ 750,000
Security improvements: lighting, fencing, and additional surveillance equipment	\$ 250,000		
Renovation of Multi-Purpose Dock to enable liquid bulk transfers and intermodal connections	\$ 1,500,000		
General Cargo Dock fendering improvements	\$ 200,000		
TOTAL:	\$ 2,350,000	TOTAL:	\$ 1,750,000