

SENATE STAFF ANALYSIS AND ECONOMIC IMPACT STATEMENT

(This document is based on the provisions contained in the legislation as of the latest date listed below.)

Prepared By: Transportation and Economic Development Appropriations Committee

BILL: CS/CS/SB 2580

SPONSOR: Transportation and Economic Development Appropriations Committee, Commerce and Consumer Services Committee, and Senator Fasano

SUBJECT: Space Florida

DATE: April 18, 2006

REVISED: _____

	ANALYST	STAFF DIRECTOR	REFERENCE	ACTION
1.	<u>Barrett</u>	<u>Cooper</u>	<u>CM</u>	<u>Fav/CS</u>
2.	<u>Newman</u>	<u>Newman</u>	<u>EA</u>	<u>Fav/1 amendment</u>
3.	<u>Martin</u>	<u>Martin</u>	<u>TA</u>	<u>Fav/CS</u>
4.	_____	_____	<u>WM</u>	_____
5.	_____	_____	_____	_____
6.	_____	_____	_____	_____

I. Summary:

This committee substitute (CS) implements the recommendations of the Governor's Commission on the Future of Space and Aeronautics in Florida.

The CS consolidates the powers, duties, and assets of the Florida Space Authority (FSA)¹, the Florida Space Research Institute (FSRI), and the Florida Aerospace Finance Corporation (FAFC) into one entity, "Space Florida."

The CS requires Space Florida to enter into agreements with Enterprise Florida, Inc. (EFI), the Department of Education (DOE), the Department of Transportation (DOT), the Florida Commission on Tourism, and Workforce Florida, Inc., to implement the requirements of the committee substitute.

The CS expands sales tax exemptions for: machinery and equipment used by defense or space technology facilities to produce defense or space technology products, and machinery and equipment used predominately for space or defense research and development.

The CS creates the Florida Center for Mathematics and Science Research, to increase student achievement in math and science.

¹ Along with consolidation, this committee substitute also deletes the authority for the establishment of the Spaceport Management Council within FSA.

The CS amends the following sections of the Florida Statutes: 14.2015, 74.011, 196.012, 212.02, 212.08, 212.20, 228.1224, 288.063, 288.075, 288.35, 288.9015, 288.9415, 331.301, 331.302, 331.303, 331.305, 331.306, 331.308, 331.309, 331.310, 331.3101, 331.311, 331.312, 331.313, 331.316, 331.317, 331.318, 331.319, 331.320, 331.321, 331.322, 331.323, 331.324, 331.325, 331.326, 331.327, 331.328, 331.329, 331.331, 331.333, 331.334, 331.335, 331.336, 331.337, 331.338, 331.339, 331.340, 331.343, 331.345, 331.346, 331.347, 331.348, 331.349, 331.350, 331.351, 331.354, 331.355, 331.360, 331.369, 334.044, 445.004, and 1001.10.

The CS creates sections 331.3011, 331.3051, and 1004.86 of the Florida Statutes.

The CS repeals the following sections of the Florida Statutes: 331.314, 331.315, 331.367, 331.368, 331.401, 331.403, 331.405, 331.407, 331.409, 331.411, 331.415, 331.417, and 331.419.

II. Present Situation:

Florida's space industry is an important segment of the state's economy. Twenty-six Florida counties are home to more than 180 space-related businesses directly employing over 23,000 Floridians.² Since the 1980's, the State of Florida has assumed a more proactive role in the development of space-related enterprise. While the state and private sector have enjoyed some success in the efforts to diversify the state's space industry, recent events have significantly impacted the future of space enterprise in Florida and posed new challenges for both the state and industry.

Overview of Florida's Space Industry

Since its establishment 50 years ago, the space industry has developed a statewide presence, with half of the space-related businesses located outside of Brevard County. While launch operations remain the state's primary space-related activity, the industry has expanded to include additional capabilities and services. The space industry has also contributed significantly to the growth of Florida's research, technology development, and tourism sectors.

Florida currently ranks high among states in aerospace employment. The majority of aerospace employees are highly trained engineers, scientists, and technicians that command relatively high salaries. According to the Florida Aviation Aerospace Alliance the annual average wage of aerospace workers is approximately \$52,000.³ More than 86 percent of the 15,000 Kennedy Space Center (KSC) based employees work for prime contractors or their sub-contractors. The remainder are generally federal civil service workers employed directly by NASA. Based on NASA's 2003 estimate of its economic impact in Florida, each direct job at KSC multiplied into 2.4 indirect jobs, and each dollar of income was multiplied into \$1.81 of total income.⁴

The primary space industry segment within Florida remains launch operations. This includes products and services related to payload support and processing, spaceport operations, and ground operations equipment and support. Within the spaceport, most activities revolve around

² Florida Space Authority, *2003 Annual Report*. These figures are based on 2000 data.

³ The Florida Aviation Aerospace Alliance, *2003 Aviation/Aerospace Assessment*, October 2003.

⁴ W. Warren McHone, Transportation Economics Research Institute, *The Economic Impact of NASA in Florida – 2003*, March 2004.

three major programs: the Space Shuttle, the International Space Station, and expendable launch vehicles. The Space Shuttle Program, which is managed by United Space Alliance (a joint venture between Boeing Company and Lockheed Martin Corporation), constitutes the largest expenditure and employment category at KSC.

Efforts to diversify Florida's space industry beyond launch-related operations have achieved some results. The recently completed Space Life Sciences Laboratory (previously known as the Space Experiment Research and Processing Laboratory or SERPL) serves as the primary gateway to the International Space Station for science experiments and a home to ground-based investigations in biological science. This facility will anchor the 400-acre International Space Research Park at KSC. This research park is intended to serve as a magnet for new space research and technology development initiatives.

State Support for Space Enterprise

During the 1980's the state significantly strengthened its support of space enterprise through the creation of the Governor's Commission on Space and the Spaceport Florida Authority, the nation's first state space agency. Since that time, the state has continued to facilitate the expansion of space-related commerce through a variety of economic development and education initiatives.

Governor's Commission on Space – In response to the changing landscape of space commerce, Governor Bob Martinez created the Governor's Commission on Space in 1987. Creation of this commission was prompted by changes in federal space policies, increased global competition for space-related services, and the commercialization of the space industry. The commission's final report was published in 1988 and included an analysis of Florida's competitive position in attracting space commerce. The report pointed to the following as significant areas of concern: Florida's public educational system; the shortage of skilled labor; the state's overall business climate; and the lack of suppliers for space goods and services.⁵ To address these concerns, the report contained the following major recommendations:

- Enhance Florida's K-12 educational system by including space curricula and space-oriented instruction for teachers;
- Strengthen Florida's higher education system as it relates to space;
- Demonstrate a long-term commitment to developing and supporting space commerce; and
- Encourage the development of a commercial spaceport in Florida.

Florida Space Authority – In 1989, the Legislature realized a key commission recommendation through the creation of a permanent state space office – the Spaceport Florida Authority (authority).⁶ As authorized under s. 331.302, F.S., the authority constitutes the state's space transportation and economic development agency and is charged with retaining, expanding, and diversifying the state's space-related industry. The authority, which is modeled on similar types of transportation authorities (airport, seaport, etc.), is granted a wide range of powers and

⁵ *Steps to the Stars*, Governor's Commission on Space, 1988.

⁶ Chapter 2002-183, L. O. F., revised the name of the authority to the Florida Space Authority.

responsibilities. For example, the authority is empowered to own, operate, construct, and finance spaceport infrastructure. Similarly, the authority fosters space-related research and education by providing access to facilities, technology, and partnerships. Finally, the authority is responsible for space transportation planning and the coordination of state space policy. The authority is funded through a combination of state appropriations and revenues generated through the authority's activities. For fiscal year 2005-2006, the Legislature appropriated \$1.8 million to the authority.

Florida Space Research Institute – In 1999, the Legislature created the Florida Space Research Institute (FSRI) to develop opportunities for Florida's academic institutions to support space technology programs. FSRI leverages state resources with those of NASA, the military, and industry, to expand and diversify Florida's space-related enterprise. For example, FSRI is responsible for co-management (with NASA) of the new Space Life Sciences Laboratory and to assist Florida-based companies and universities with a variety of space-related research projects. FSRI also sponsors a range of workforce initiatives, including space-oriented instruction for K-12 teachers, and training for future aerospace technicians. State funding for FSRI is provided through the Office of Tourism, Trade and Economic Development (OTTED). For fiscal year 2005-2006, FSRI was appropriated \$800,000.

Florida Aerospace Finance Corporation – The same 1999 legislation that created FSRI also established the Commercial Space Financing Corporation.⁷ The mission of the corporation is to support the development of commercial aerospace products, activities, services, and facilities. To achieve these goals the corporation is authorized to provide information, technical assistance, and financial assistance to aerospace businesses. Pursuant to s. 331.407, F.S., the corporation has a range of financial services available to assist businesses, including loan facilitations, equity facilitations, loan guarantees, and creative leases. For fiscal year 2005-2006, the Legislature appropriated \$300,000 to the corporation through OTTED.

Other Space-Related Entities and Incentives – In addition to the entities previously discussed, Florida has a host of other organizations that support and promote space-related enterprise. Similarly, the state has created a number of business incentives to retain and recruit space-related firms. The following briefly summarizes some of these organizations and business incentives.

- The Technological Research and Development Authority, established by the Legislature in 1987, focuses on the cost-effective transfer of new technologies to schools and small businesses in Florida.
- The Florida Space Institute is a consortium of state academic institutions responsible for expanding Florida's space industry through applied research, developing and transferring technology, and providing education and training for individuals in space-related fields.
- Spaceport Management Council was created by the Legislature to provide coordination and recommendations on projects and activities that will increase the capabilities of Florida's space industry.

⁷ Chapter 2003-286, L.O. F., changed the name of the corporation to the Florida Aerospace Finance Corporation. This change was intended to eliminate confusion surrounding its mission and allow the corporation to service aviation-related projects.

- Enterprise Florida, Inc., is the public-private partnership responsible for leading Florida's statewide economic development efforts. Enterprise Florida, Inc., has designated aerospace as a target sector of Florida's economy.
- Sales Tax Exemptions – Section 212.08, F.S., provides an exemption for certain equipment and machinery used to expand the productive output of a spaceport activity. Similarly, s. 212.031, F.S., provides the lease of real property used for space flight business is exempt from Florida sales tax.

Recent Events Impacting Florida's Space Industry

A number of developments in recent years have significantly impacted space enterprise in Florida. For example, increased global competition in the face of relatively flat demand for launch services has created a challenging environment for Florida's commercial launch operators. Similarly, the tragic loss of the Shuttle Columbia and the resulting recommendations of the accident investigation board have impacted Florida-based Shuttle and Space Station operations. Finally, President Bush's New Vision for the Future of Space Exploration promises both opportunities and challenges for Florida's space industry.

New Vision for the Future of Space Exploration – In January of 2004, President Bush announced a new vision for the nation's space program. The President committed the U.S. to a long-term human and robotic program to explore the solar system, starting with a return to the Moon that will ultimately enable future exploration of Mars and other destinations. The President's plan is based on the implementation of the following priorities:

- First, the U.S. will complete its work on the Space Station by 2010. The U.S. will launch a renewed research effort on-board the Space Station to better understand and overcome the effects of human space flight on astronaut health. Following final assembly of the station, the shuttle will be retired.
- Second, the U.S. will begin developing a new manned exploration vehicle to explore beyond our orbit to other worlds. The new spacecraft, the Crew Exploration Vehicle, will be developed and tested by 2008 and will conduct its first manned mission no later than 2014.
- Third, the U.S. will return to the Moon as early as 2015 and no later than 2020 and use it as a stepping-stone for more ambitious missions. A series of robotic missions to the Moon will explore the lunar surface beginning no later than 2008. Using the Crew Exploration Vehicle, humans will conduct extended lunar missions as early as 2015.

The new vision has significant implications for Florida. As previously noted, more than half of Florida's current space-related activities are linked to the Shuttle and Space Station. The new vision calls for the retirement of the shuttle by 2010, and the reallocation of funds from the Space Station to NASA's exploration mission. The smaller Crew Exploration Vehicle, which is scheduled to enter service in 2014, will require significantly fewer personnel.

Governor's Commission on the Future of Space and Aeronautics in Florida⁸

In June 2005, the Governor established, by executive order, the Commission on the Future of Space and Aeronautics in Florida (commission). The commission was created to assess and make recommendations on how to strengthen Florida's role as a leader in the aerospace industry to maximize the economic development and job creation opportunities throughout the state.

The commission was chaired by Lieutenant Governor Toni Jennings. Voting members included representatives from the aerospace industry, the Governor's Office of Tourism, Trade, and Economic Development (OTTED), the Department of Transportation (DOT), and a member from the Senate and House of Representatives. Non-voting members included the directors of FSA, FAFC, and FSRI. The commission met eight times between July 2005 and January 2006. The commission's final report was published in January 2006. The report includes the commission's findings and recommendations as well as an overview of Florida's space and aeronautics industry.

The commission identified 18 recommendations in four major categories for enhancing the competitiveness of Florida's aerospace industry. The four categories are: strengthening the state's talent base; attracting and growing aerospace businesses; enhancing the space launch environment and infrastructure; and improving the management of the state's aerospace policy, advocacy, and support functions.

The following are the recommendations from the commission's final report⁹:

Talent

- Integrate space and aeronautics industry needs into the state's cluster based workforce development programs.
- Ensure that space industry talent currently involved in the Space Shuttle program is retained after 2010.
- Establish a Center for Mathematics and Science Education Research to enhance K-12 mathematics and science instruction quality.
- Improve K-12 mathematics and science teacher availability through a greater emphasis on teacher recruitment.
- Expand enrollment in, completions of, and retention of graduates from, post-secondary degree programs in mathematics, science, and engineering, with emphasis on aerospace fields.
- Provide hands-on opportunities for students to experience and learn about the aerospace industry.
- Increase general awareness of aerospace activities.

⁸ The commission' website:

http://www.myflorida.com/myflorida/government/governorinitiatives/space_commission/index.html

⁹ The Governor's Commission on the Future of Space and Aeronautics in Florida, Final Report, Section 4.0 *Summary of Recommendations*, pp 4-1,4-2. The report is available online at:

http://www.myflorida.com/myflorida/government/governorinitiatives/space_commission/pdfs/final_report2.pdf

- Create a center of excellence with focus on space and aeronautics research and technology.

Economic Diversification

- Position Florida to assemble, test, check out, launch, maintain, and refurbish the Crew Exploration Vehicle.
- Reaffirm space and aeronautics as a statewide target industry with EFI as the lead business development agency.
- Expand the tools available for recruitment of space and aeronautics businesses.
- Provide targeted support and venture capital for aerospace technology businesses that are created in Florida.

Space Launch Environment

- Support Federal efforts to renew and upgrade the infrastructure and technologies at the Cape Canaveral Spaceport and Eastern Range to support the nation's Vision, new military programs, and commercial growth.
- Improve highway, rail, and waterway connections to the Cape Canaveral Spaceport.
- Advocate for enhanced Federal procedures and customer service for commercial launches.
- Plan and develop a commercial spaceport targeted initially at horizontal launches and located separately from the Federal lands at the Cape.

Management

- Consolidate Florida's existing space entities into a new organization, Space Florida.
- Provide dedicated funding to support innovative education programs or other space initiatives.

III. Effect of Proposed Changes:

The CS implements the recommendations of the Governor's Commission on the Future of Space and Aeronautics in Florida. The CS consolidates the powers, duties, and assets of the Florida Space Authority (FSA), the Florida Space Research Institute (FSRI), and the Florida Aerospace Finance Corporation (FAFC) into one entity, "Space Florida."

The CS also requires Space Florida to enter into agreements with Enterprise Florida, Inc. (EFI), the Department of Education (DOE), the Department of Transportation (DOT), and Workforce Florida, Inc., to implement the requirements of the committee substitute. The CS expands sales tax exemptions for: machinery and equipment used by defense or space technology facilities to produce defense or space technology products, and machinery and equipment used predominately for space or defense research and development. The CS directs the Department of Education to contract with a public university to establish the Florida Center for Mathematics and Science Research, to increase student achievement in math and science.

Sections 7, 9, 11-46, and 48-57 of the CS amend various sections of statute to make conforming changes, to reference “Space Florida” rather than the Florida Space Authority (FSA), the Florida Aerospace Finance Corporation (FAFC), or the Florida Space Research Institute (FSRI).

Section 1 amends s. 331.301, F.S., to rename sections 331.301 through 331.369, F.S., the Space Florida Act, rather than the Florida Space Authority Act.

Section 2 creates s. 331.3011, F.S., to express Legislative findings and intent. Specifically, Space Florida is to be the “single point of contact for state aerospace-related activities with federal agencies, the military, state agencies, businesses, and the private sector.”

Section 3 amends s. 331.302, F.S., to create Space Florida and specify its purpose.

Consistent with current law, this entity is created and incorporated as a public corporation, body politic,¹⁰ and subdivision of the state.

The purpose of Space Florida is to foster the growth and development of the aerospace industry in Florida. Space Florida must promote aerospace business development by facilitating business financing, spaceport operations, research and development, workforce development, and innovative education programs.

In carrying out its duties and responsibilities, Space Florida is required to advise, coordinate, cooperate, and, when necessary, enter into memoranda of agreement with municipalities, counties, regional authorities, state agencies and organizations, appropriate federal agencies and organizations, and other interested persons and groups. While this provision is similar to current law, Space Florida is required, rather than permitted, to carry out this function.

Space Florida is restricted from endorsing any candidate for any elected public office or contributing money to the campaign of any candidate for public office. (This is consistent with the restriction imposed upon EFI and other public/private partnerships within the state.)

Consistent with current law, Space Florida is not an agency as defined in ss. 216.011 and 287.012, F.S.¹¹

Space Florida is not subject to ch. 189, F.S., relating to special districts.

Section 4 amends s. 331.303, F.S., to define “aerospace”, expand existing definitions to reference the mission of Space Florida and to address emerging technologies, and to amend existing definitions to reference Space Florida, rather than FSA.

“Aerospace” means the industry that designs and manufactures aircraft, rockets, missiles, spacecraft, satellites, space vehicles, space stations, space facilities or components thereof, and equipment, systems, facilities, simulators, programs, and related activities, including the

¹⁰ Section 1.01, F.S., provides that the term “body politic” includes counties, cities, towns, villages, special tax school districts, special road and bridge districts, bridge districts, and all other districts in this state.

¹¹ Ch. 216, F.S., imposes specific planning and budgeting requirements on state agencies. Ch. 287, F.S. imposes specific procurement requirements and restrictions on state agencies.

application of aerospace technologies in air-based, land-based, and sea-based platforms for commercial, civil, and defense purposes.

This section also deletes several definitions of terms that are not used in subsequent related sections of the statutes: “complementary activity”, “conduit bond”, “spaceport system” and “federal aid”. Several other definitions are modified for clarification.

Section 5 amends s. 331.305, F.S., which provides for the powers of Space Florida.

As indicated below in brackets, many of the powers of Space Florida provided for in this committee substitute currently exist as powers of FSA, FAFC, or FSRI. This section provides that Space Florida has the power to:

- Sue and be sued by its name in any court of law or in equity. [FSA]
- Adopt and use a corporate seal and alter it at its pleasure. [FSA]
- Conduct its affairs, carry on its operations, and have offices and exercise the powers granted by this act in any state, territory, district, or possession of the U.S. or any foreign country. [ch. 607, F.S.]
- Acquire, enjoy, use, and dispose of patents, copyrights, and trademarks and any licenses and other rights or interests. [ch. 607, F.S.]
- Purchase or sell shares and other interests in other domestic or foreign corporations. [ch. 607, F.S.]
- Lend money for its purposes, invest and reinvest its funds, and hold real and personal property as security for the payment of funds loaned. [ch. 607, F.S.]
- Have and exercise all powers necessary to affect any of the purposes for which it is organized.
- Acquire property within or without its territorial limits, and sell any property or assets. [FSA]
- Make and execute any contracts necessary to the exercise of its powers. [FSA]
- Lease, as lessor or lessee any facilities or property to carry out any of its purposes. [FSA]
- Own, acquire, construct, develop, create, reconstruct, equip, operate, maintain, extend, and improve launch pads, landing areas, ranges, payload assembly buildings, payload processing facilities, labs, aerospace business incubators, launch vehicles, payloads, space flight hardware, facilities and equipment for the constructions of payloads, space flight hardware, rockets, and other launch vehicles, and other spaceport facilities and other aerospace-related systems. [FSA]
- Insure, coinsure, lend, or guarantee loans to originate for sale direct aerospace-related loans. [FAFC]
- Capitalize, underwrite, and secure funding for aerospace infrastructure, satellites, launch vehicles, and any service that supports aerospace launches. [FAFC]
- Construct, lease, or sell aerospace infrastructure, satellites, launch vehicles, and any other related activities and services. [FAFC]
- Acquire, accept, or administer grants, contracts, and fees from other organizations. [FSRI]
- Own, acquire, construct, reconstruct, equip, operate, maintain, extend, or improve:

- transportation facilities to meet the transportation requirements of Space Florida and activities conducted within spaceport territory. [FSA]
- electric power plants and transmission lines for generation of power. [FSA]
- water and flood control facilities. [FSA]
- public safety facilities for the spaceport. [FSA]
- experimental spaceport facilities and services. [FSA]
- Purchase electric power for the spaceport territory. [FSA]
- Develop and operate water and sewer systems. [FSA]
- Designate land within or without spaceport territory as conservation areas or bird and wildlife sanctuaries. [FSA]
- Establish a program for control and abatement of mosquitoes and other pests within spaceport territory. [FSA]
- Hire a safety officer. [FSA]
- Undertake, sponsor, finance, and maintain research activities. [FSA]
- Issue revenue bonds, assessment bonds, or any other bonds. [FSA]
- Make expenditures for entertainment and travel expenses and business clients. [FSA]
- In connection with any financing agreement, fix and collect fees, loan payments, rental payments, and other charges. [FSA]

The authority to develop a business plan to guide and facilitate the future of space related educational and commercial development, and to undertake a program to advertise and promote space related businesses is transferred to the newly created “duties” provision, s. 331.3051, F.S. The authority to establish a personnel management system and procedures governing per diem is transferred to s. 331.310, F.S., the provision addressing the powers and duties of the board.

The authority to exercise the power of eminent domain in spaceport territory is deleted.

Section 6 creates s. 331.3051, F.S., to specify the duties of Space Florida. As indicated below, some of the duties of Space Florida provided for in this committee substitute currently exist as powers or duties of FSA, FAFC, or FSRI. If the duty is not referenced in brackets, it is either a new duty or is an implied authority derived from s. 331.302(3), F.S.¹²

This section requires Space Florida to:

- Create a business plan to foster the growth and development of the aerospace industry. The plan must address business development, workforce development, and education, and must be completed by March 1, 2007. [FSA power]
- Enter into agreement with DOE, DOT, EFI, and Workforce Florida, Inc.

¹² Section 331.302(3), F.S., states the following: It shall be the purpose, function, and responsibility of the Florida Space Authority to develop a strategy for and implement the acceleration of space-related economic growth and educational development within the state. Projects in the state shall include the space business incubators, space tourism activities and centers, educational involvement in business incubators, and the Spaceport Florida launch centers. It shall be the authority's purpose, function, and responsibility to provide projects in the state which will develop and improve the entrepreneurial atmosphere, to provide coordination among space businesses, Florida universities, space tourism, and the Spaceport Florida launch centers, and to provide activities designed to stimulate the development of space commerce. *In carrying out these duties and responsibilities, the authority may advise and cooperate with municipalities, counties, regional authorities, state agencies and organizations, appropriate federal agencies and organizations, and other interested persons and groups.*

- In cooperation with EFI, develop a plan to retain, expand, attract, and create aerospace industry entities. [FSA power]
- Create a marketing campaign to help attract, develop, and retain aerospace businesses, research, technology, and other related activities. [FSA power]
- Consult with the Florida Commission on Tourism in developing an advertising program promoting the aerospace industry. [FSA power]
- In cooperation with EFI, develop a plan to finance aerospace businesses. The plan may include the following activities:
 - Assembling, publishing, and disseminating information concerning financing opportunities and techniques for aerospace projects, programs and activities; sources of public and private aerospace financing assistance; and sources of aerospace-related financing. [FAFC]
 - Organizing, hosting, and participating in seminars designed to disseminate information and technical assistance regarding aerospace-related financing. [FAFC]
 - Coordinating with programs and goals of NASA, the Department of Defense, and other federal, public, private, and international entities. [FAFC]
 - Establishing a network of contacts among organizations that provide information, technical assistance, and financial support to the aerospace industry. [FAFC]
- In carrying out its responsibilities for spaceport operations:
 - Seek federal support and develop partnerships to renew and upgrade infrastructure, and improve access for commercial launch activities.
 - Support federal efforts to clarify responsibilities and rules of federal agencies, in an effort to streamline access for commercial launch users.
 - Pursue the development of additional commercial spaceports in the state.
 - Promote and facilitate launch activity in the state by assisting commercial launch operators in getting authorization to launch.
 - Consult, as necessary, with appropriate federal, state, and local authorities about establishing and operating spaceport infrastructure and related facilities.
- In carrying out its responsibility for research and development:
 - Manage the contract for the operators of the Space Life Sciences Laboratory.
 - Work in collaboration with one or more universities other entities to develop a proposal for a Center of Excellence for Aerospace.
- Coordinate with Workforce Florida, Inc., community colleges, universities, and other public and private partners to develop a plan to retain, train, and retrain workers in the aerospace industry.
- Fund math and science education programs, aerospace-focused education programs for teachers, and internet-based aerospace education. (Funds for these programs may include sales tax revenues collected by businesses at KSC that are distributed to Space Florida pursuant to section 60 of this committee substitute).
- Submit an annual performance report relating to its business plan to the Governor and Legislature by September 1 of each year.

Section 8 amends s. 331.308, F.S., relating to the board of directors of Space Florida. The following are the members of the board of directors of Space Florida:

- The Governor;

- The Secretary of Transportation or the secretary's designee;
- The president of Workforce Florida, Inc., or the president's designee;
- The president of EFI, or the president's designee;
- The Commissioner of Education, or the commissioner's designee;
- Twelve members from the private sector appointed by the Governor, one of which must represent organized labor;¹³ and
- Two non-voting members, one of whom is a member of the Senate and one of whom is a member of the House of Representatives.

The Governor will serve as chair of the board, and the board will biennially elect one of its members as vice chair to serve in the absence of the Governor and to perform other duties as necessary. The president of Space Florida must keep records, books, and documents of the board, as well as minutes from board meetings. Appointed members of the board are subject to confirmation by the Senate. The board of directors must meet at least four times a year. A majority of voting members constitutes a quorum. The board of directors may take official action by a majority vote of the members present at any meeting at which a quorum is present. Members of the board must serve without compensation, but may be reimbursed for expenses pursuant to s. 112.061, F.S., relating to per diem and travel expenses of public officers, employees, and authorized persons. Each member of the board who is not otherwise required to file financial disclosure pursuant to s. 112.3144, F.S., must file financial disclosure pursuant to s. 112.3145, F.S.¹⁴

Vacancies on the board must be filled for the unexpired term in the same manner as the original appointments to the board. Members of the board will serve four year terms, except that the initial terms will be staggered. The Governor must appoint two members for a one year term, four members for two year terms, and six members for four year terms. Appointments made by the President of the Senate and the Speaker of the House of Representatives will serve two year terms. Any member of the board is eligible for reappointment. Appointed members may be removed by the Governor for cause. Absence from three consecutive meetings without good cause will result in automatic removal from the board.

Section 10 amends s. 331.310, F.S., to provide for the powers and duties of the board of directors of Space Florida.

¹³ In making appointments, the Governor must ensure that the composition of the board reflects the diversity of the aerospace industry; and the Governor must consider whether members reflect the racial, ethnic, and gender diversity, and geographic distribution of the population of the state.

¹⁴ Public officers, employees and appointees are required by law to file one of two financial disclosure statements with the Florida Commission on Ethics. Section 112.3144, F.S., requires "all elected constitutional officers and candidates for such offices and, as may be determined by law, other public officers, candidates, and employees" to file a Full and Public Statement of Financial Interests. Such persons must report the *total dollar value* of the following: net worth, assets including household goods and personal effects, liabilities in excess of \$1,000, primary and secondary sources of income, and interests in specified businesses including positions held and ownership. Section 112.3145, F.S., requires "each state or local officer and each specified state employee" to file a Statement of Financial Interests each year. "State officer" is defined, in part, as an appointed member of each board, commission, authority, or council having statewide jurisdiction. Such persons must report primary and secondary sources of income, assets, liabilities and interests in specified businesses including positions held and ownership, *that exceed specified percentage or dollar thresholds*.

As indicated below, many of the powers and duties of the board of directors of Space Florida currently exist as powers or duties of the board of supervisors of FSA or FSRI, as indicated in brackets.

The board of directors of Space Florida has the power to:

- Enter any property to perform its duties and functions. Any such entry is not deemed a trespass or an entry that would constitute a taking in an eminent domain proceeding. [FSA board]
- Execute all contracts and other documents necessary to carry out the purposes of this act. [FSA board]
- Establish departments, committees, or other entities that the board deems necessary to carry out this act. [FSA board]
- Provide financial services to support aerospace-related business development. Create, form, or acquire such entities that are necessary to provide financial services to support aerospace-related business development in Florida. Financial services may include, but are not limited to, insuring, coinsuring, direct lending, loan guarantees, capitalizing, underwriting, leasing, selling, or securing funding for aerospace infrastructure.
- Examine the county tax rolls with respect to the assessed value of the real and personal property within any spaceport territory. [FSA board]
- Provide strategic direction for the aerospace-related research priorities of the state and its aerospace-related businesses. [FSRI]
- Engage in the planning and implementation of space-related economic and educational development in Florida. [FSA board]
- Execute intergovernmental agreements. [FSA board]
- Establish reserve funds for future board operations. [FSA board]
- Adopt rules pursuant to ch. 120, F.S., to carry out this act. [FSA board]

Space Florida is required to:

- Adopt bylaws, rules, resolutions, and orders prescribing the powers, duties, and functions of Space Florida to conduct the business of Space Florida, the maintenance of records, and the form of all documents and records of Space Florida. The board may adopt rules with respect to any of the projects of Space Florida with notice and a public hearing. [FSA board]
- Maintain Space Florida's offices in close proximity to Kennedy Space Center.
- Appoint a person to act as president of Space Florida.
- Abide by all applicable federal labor laws. [FSA board]
- Prepare an annual report of operations, due each year by December 31. [FSA board]
- Establish a personnel management system. Personnel of Space Florida are not state employees. [FSA board]
- Establish procedures, rules, and rates governing per diem and travel expenses. [FSA board]

Section 47 amends s. 331.355, F.S., to prohibit any business or entity from using the words "Space Florida," "Florida Space Authority," "Florida Aerospace Finance Corporation," or "Florida Space Research Institute," in its name, unless Space Florida gives written approval.

Section 58 amends s. 212.08(5)(j), F.S., to expand, from 25 percent to 100 percent, the existing sales tax exemptions for:

- Industrial machinery and equipment used in defense or space technology facilities to manufacture, process, compound, or produce defense or space technology products; and
- Machinery and equipment used predominately in defense or space research and development activities in a defense or space technology research and development facility.
- In addition, the exemption is expanded to apply to machinery and equipment used to design or assemble defense or space technology products.

This section also provides that a business eligible for sales tax exemptions for such machinery and equipment pursuant to s. 212.08(5)(j), F.S., may be certified as eligible for such exemptions for a period of two years, rather than one year, and that a business' certification may be renewed at the end of the two-year period.

This section also amends the definition of "research and development" to include the design, development and testing of space launch vehicles, space flight vehicles, missiles, satellites or research payloads, avionics, and associated control systems and processing systems. This section also amends the definition of "space technology products" to include space flight vehicles and components of space technology products.

Section 59 creates s. 1004.86, F.S., to establish the Florida Center for Mathematics and Science Research (center). The Department of Education (DOE) must contract with a competitively selected public state university to create and operate the center. DOE must monitor the center through the Division of K-12 Public Schools. The purpose of the center will be to increase student achievement in math and science.

Specifically, this section provides that the center must:

- Provide technical assistance and support to schools and school districts in the development and implementation of math and science instruction;
- Conduct applied research on policy and practices related to math and science instruction and assessment in the state;
- Conduct or compile basic research regarding student acquisition of math and science knowledge and skills;
- Develop comprehensive course frameworks for math and science courses at elementary, middle, and high schools;
- Disseminate information regarding research-based teaching practices in math and science to teachers and teacher educators;
- Collect, manage, and report on assessment information regarding student achievement in math and science;
- Establish partnerships with state universities, community colleges, and school districts; and

- Collaborate with the Florida Center for Reading Research¹⁵ in order to provide research-based practices that integrate the teaching of reading within math and science courses.

Section 60 repeals several sections of the Florida Statutes:

- Section 331.314, F.S., provides that FSA has exclusive power and authority to regulate spaceports in Florida.
- Section 331.315, F.S., relating to maintenance of projects across rights-of-way, to conform to the repeal in s. 331.305, F.S., of the Florida Space Authority's power of eminent domain.
- Section 331.367, F.S., creates the Spaceport Management Council, within FSA, to recommend ways to increase the operability and capabilities of Florida's space launch facilities, to increase space-related industry, and to promote space education, research, and technology development.
- Section 331.368, F.S., creates the Florida Space Research Institute (FSRI) as a public/private partnership to serve as an industry-driven center for research.
- Sections 331.401, 331.403, 331.405, 331.407, 331.409, 331.411, 331.415, 331.417, and 331.419, F.S., create and govern the activities of the Florida Aerospace Finance Corporation (FAFC) a not-for-profit corporation responsible for expanding employment and income opportunities for Florida residents by providing aerospace businesses with information, technical assistance, and financial assistance.

Section 61 provides that FSA, FSRI, and FAFC must submit articles of dissolution to the Department of State, in accordance with s. 607.1403, F.S., by September 1, 2006. Space Florida is the successor organization to FSA, FSRI, and FAFC. FSA, FSRI, and FAFC must transfer all records, property, obligations, and unexpended balances of appropriations, allocations, or other funds to Space Florida. Space Florida must use the assets or funds transferred to it in a manner consistent with the purpose for which the originating entity received them.

Section 62 provides that appointments to the board of directors of Space Florida must be made by July 1, 2006, the board of directors must hold its first meeting by August 1, 2006, and the board of directors must appoint a president of Space Florida no later than September 1, 2006. This section also provides that the Executive Office of the Governor must provide staffing and transitional support to Space Florida until December 31, 2006.

Section 63 amends s. 288.1224(12), F.S., to require the Florida Commission on Tourism to advise and cooperate with Space Florida regarding the marketing of space tourism, when appropriate and beneficial.

Section 64 amends s. 288.9015, F.S., to require EFI to enter into agreement with Space Florida to: develop a plan to retain, expand, attract, and create aerospace industry entities; and develop a

¹⁵ The Florida Center for Reading Research (FCRR) was established by Governor Jeb Bush in 2002 as part of his "Just Read, Florida!" initiative. FCRR is located at the Florida State University. FCRR has four main goals: to serve as Florida's "Leadership Triangle" for the Just Read Florida! initiative and to provide technical assistance and support to all districts and schools receiving the Reading First award; to conduct research that will have an impact on policy and practices related to literacy instruction and assessment; to disseminate information about research-based practices related to literacy instruction and assessment for children in pre-school through 12th grade; and to conduct basic research on reading, reading growth, reading assessment, and reading instruction that will contribute to the scientific knowledge of reading. Source: www.fcrr.org

plan to assist in the financing of aerospace businesses. This section also provides that EFI must enter into a memorandum of agreement with Space Florida and the Florida Commission on Tourism to develop an advertising program to promote the aerospace industry in Florida.

Section 65 amends s. 445.004, F.S., to require Workforce Florida, Inc., to enter into agreement with Space Florida to develop a workforce development strategy.

Section 66 amends s. 1001.10, F.S., to require the Commissioner of Education to enter into agreement with Space Florida to develop innovative aerospace-related education programs that promote K-20 math and science education.

Section 67 amends s. 334.044, F.S., to require DOT to enter into agreement with Space Florida to coordinate and cooperate in the development of spaceport infrastructure and related transportation facilities contained in the Strategic Intermodal System Plan, and when appropriate, encourage cooperation and integration of airports and spaceports in order to meet transportation-related needs.

Section 68 appropriates, for fiscal year 2006-07, \$35 million from the General Revenue Fund to OTTED to be used for infrastructure needs related to NASA's Crew Exploration Vehicle (CEV). This section appropriates \$3 million from the General Revenue Fund for Space Florida's operations; this includes operational funding for FSA, FSRI, and FAFC through September 1, 2006. This section also appropriates \$ 4 million from the General Revenue Fund for implementation of innovative education programs and financing assistance for aerospace business development projects.

Section 69 provides that this act shall take effect upon becoming law.

IV. Constitutional Issues:

A. Municipality/County Mandates Restrictions:

Subsection (b) of s. 18 Art. VII, State Constitution, provides that except upon approval of each house of the Legislature by 2/3 vote of the membership, the legislature may not enact, amend or repeal any general law if the anticipated effect of doing so would be to reduce the authority that municipalities or counties have to raise revenue in the aggregate, as such authority exists on February 1, 1989.

By expanding, from 25 percent to 100 percent, the existing sales tax exemptions for certain machinery and equipment, this committee substitute reduces the municipalities' and counties' sales tax base, thereby reducing their revenue-raising authority. The fiscal impact of the expansion of these exemptions on local revenues was estimated by the Revenue Estimating Conference to be \$200,000 in fiscal year 2006-2007 and \$300,000 in fiscal year 2007-08. Although this expansion reduces the authority of cities and counties to raise revenues, it is exempted from the purview of Section 18(b) of Article VII, Florida Constitution, because of its insignificant fiscal impact.

B. Public Records/Open Meetings Issues:

None.

C. Trust Funds Restrictions:

None.

V. Economic Impact and Fiscal Note:**A. Tax/Fee Issues:**

On February 24, 2006, the Revenue Estimating Conference estimated that the expansion, from 25 to 100 percent, of the machinery and equipment sales tax exemptions would result in a revenue loss of \$3.1 million in fiscal year 2006-07, which includes \$2.6 million in general revenue, and \$3.5 million in fiscal year 2007-08, which includes \$2.9 million in general revenue.

B. Private Sector Impact:

Businesses that purchase machinery and equipment that are eligible for the sales tax exemptions will benefit, as they will be exempt from the sales tax on such purchases.

C. Government Sector Impact:

DOR may incur administrative costs related to implementation of the expansion of the sales tax exemptions and the sales tax distribution to Space Florida.

The state may incur administrative costs associated with the re-organization of the state's space-related entities.

For fiscal year 2006-07, this committee substitute appropriates \$42 million of non-recurring funds from General Revenue Fund.

No provision is made for funding the Florida Center for Mathematics and Science Education Research which is to be established in Section 61 of this committee substitute. SB 2700 (Proposed General Appropriations Act), as introduced, includes no funding for the proposed Center. The House's proposed budget includes \$2,000,000 (SA 164) to establish a Florida Center for Mathematics and Science Research at a host university to be selected by the Board of Governors based on their review of competitive applications

VI. Technical Deficiencies:

None.

VII. Related Issues:

None.

This Senate staff analysis does not reflect the intent or official position of the bill's sponsor or the Florida Senate.

VIII. Summary of Amendments:

None.

This Senate staff analysis does not reflect the intent or official position of the bill's sponsor or the Florida Senate.
