



December 2021

MARITIME INFRASTRUCTURE

Public Ports Engage in an Extensive Range of Activities beyond Freight Movement

Accessible Version



A Century of Non-Partisan Fact-Based Work

GAO Highlights

Highlights of [GAO-22-104630](#), a report to congressional committees

Why GAO Did This Study

The nation's coastal, Great Lakes, and inland ports have long been recognized as critical to the national and local economies. Ports can contribute not only by moving freight but also, for example, through activities related to tourism, transportation, or real estate. Nationwide port studies have typically focused on the impact of freight, and less attention has been paid to these non-freight activities.

House Report 116-452 included a provision for GAO to examine ports' non-freight activities. This GAO report describes (1) what is known about the nature of and funding for non-freight activities at public ports, and (2) the extent to which federal discretionary grant programs have provided funds to public ports for non-freight and freight projects, and stakeholders' views on this federal assistance.

To address the two objectives above, GAO conducted a non-generalizable survey of 80 ports and interviewed officials at 15 ports and 14 port industry stakeholders. GAO selected ports for variety based on their level of non-freight activity, freight traffic, and location, and whether they have applied for DOT funding. GAO also interviewed officials within DOT; the Departments of Commerce (Commerce), Defense, and Homeland Security; and the Environmental Protection Agency (EPA).

In addition, GAO (1) reviewed port documentation, such as economic impact studies and (2) analyzed DOT, Commerce, and EPA grant award data from fiscal year 2010 through fiscal year 2020.

View [GAO-22-104630](#). For more information, contact Andrew Von Ah at (202) 512-2834 or vonaha@gao.gov.

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What GAO Found

Public ports across the U.S. pursue an extensive range of activities unrelated to freight movement. Examples of such non-freight activities include cruise ship and ferry terminals, commercial fishing, recreation, and commercial and residential development. In a GAO survey of ports, 67 of the 80 respondents reported being involved in non-freight activities in the last 10 years, with most respondents having a mix of freight and non-freight activities. Port officials said they pursue non-freight activities to diversify lines of business, find new uses for underused facilities, and address unmet community development needs, among other reasons. Non-freight activities can also have economic impacts including creating jobs, according to port stakeholders and economic impact studies. For example, one study estimated that commercial fishing activity at the Port of Seattle accounted for 11,300 jobs and generated \$1.4 billion in total business output in 2017. Ports most commonly reported funding their non-freight activities with port revenues (55 survey respondents) or state funds (53 survey respondents).

Waterfront Park Area and Development, Port of San Diego



Source: Port of San Diego. | GAO-22-104630

Federal grant programs GAO reviewed have provided some funding to ports for non-freight projects but have largely focused on freight. According to GAO's analysis of federal grant award data for fiscal years 2010 through 2020, agencies provided at least \$141 million to ports for non-freight projects during this time, or about 8 percent of the almost \$1.9 billion in total funding these programs awarded to ports, in fiscal year 2020 dollars. The U.S. Department of Transportation (DOT) provided the majority of funding to ports for both freight and non-freight projects. DOT-funded non-freight projects include ferry-, cruise-, and fishing-related projects, among others. Stakeholders reported that ports, especially small ports, face challenges with federal grant programs. For example, stakeholders and federal officials said that many grant programs GAO reviewed are consistently oversubscribed and that smaller ports may lack the resources to develop a competitive application. Stakeholders GAO spoke with differed on the need for additional federal funding for non-freight activities.

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Abbreviations

AAPA	American Association of Port Authorities
BTS	Bureau of Transportation Statistics
Commerce	Department of Commerce
Corps	U.S. Army Corps of Engineers
COVID-19	Coronavirus Disease 2019
DERA	Diesel Emissions Reduction Act of 2010
DHS	Department of Homeland Security
DOD	Department of Defense
DOT	U.S. Department of Transportation
EDA	Economic Development Administration
EPA	Environmental Protection Agency
FASTLANE	Fostering Advancements in Shipping and Transportation for the Long-Term Achievement of National Efficiencies
FTA	Federal Transit Administration
INFRA	Infrastructure for Rebuilding America Program
MARAD	Maritime Administration
NOAA	National Oceanic and Atmospheric Administration
PIDP	Port Infrastructure Development Program
RAISE	Rebuilding American Infrastructure with Sustainability and Equity
USCG	U.S. Coast Guard

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December 15, 2021

The Honorable Brian Schatz
Chair

The Honorable Susan Collins
Ranking Member
Subcommittee on Transportation, Housing and Urban Development, and
Related Agencies
Committee on Appropriations
United States Senate

The Honorable David Price
Chairman

The Honorable Mario Diaz-Balart
Ranking Member
Subcommittee on Transportation, and Housing and Urban Development,
and Related Agencies
Committee on Appropriations
House of Representatives

The nation's coastal, Great Lakes, and inland ports have long been recognized as critical to the national economy and local economies. Ports' contributions may be related to the movement of freight or to other types of activities (non-freight activities), such as cruise activities or fishing. Nationwide studies have more typically focused on the impact of ports' freight activities.¹ For example, the U.S. Department of Transportation (DOT) is required to report annually on the top 25 ports based on various freight measures,² and a 2019 study commissioned by the American Association of Port Authorities (AAPA) estimated that U.S. coastal ports generated almost 30.8 million jobs and \$5.4 trillion in freight-related economic activity in 2018.³ Less attention has been paid to impacts of ports' non-freight activities.

¹For the purposes of this report, we are classifying commercial fishing as a non-freight activity, as the U.S. Army Corps of Engineers (Corps) does not include fish landings in its freight statistics.

²49 U.S.C. § 6314(b)(1). See <https://www.bts.gov/ports>; last accessed 9/29/2021.

³2018 *National Economic Impact of the U.S. Coastal Port System*, conducted by Martin Associates, Lancaster, PA, for the American Association of Port Authorities, Washington, D.C., March 2019.

Non-freight activities can also be important to some ports and local economies.⁴ As we have previously reported, the global shipping industry has evolved in recent decades, moving towards larger ships in an effort to reduce costs and increase efficiency.⁵ As a result, some port infrastructure can no longer adequately accommodate freight. Due to this and other changes in the global economy and local conditions, some ports have undertaken or expanded non-freight activities.

House Report 116-452 accompanying a bill for the Department of Transportation, and Housing and Urban Development, and Related Agencies appropriations, 2021, includes a provision for GAO to examine ports' non-freight activities.⁶ This report describes

- what is known about the nature of and funding for non-freight activities at public ports and
- the extent to which federal discretionary grant programs have provided funding to public ports for non-freight and freight projects, and stakeholders' views on this federal assistance.

For both the above objectives, we conducted a non-generalizable survey of ports to obtain information on the non-freight activities occurring at the ports and funding for these activities. We received responses to our survey from 80 ports located across the contiguous U.S., Alaska, and Hawaii, including coastal ports, inland ports, and Great Lakes ports. (For more information on our survey, see app. II). In discussing the views of survey respondents in this report, out of 80 respondents, we refer to:

- “a few” survey respondents if two to three survey respondents expressed this view;
- “some” if four to six survey respondents expressed the view; and
- “many” if seven or more survey respondents expressed the view.

We also interviewed officials at 29 non-federal entities, including 15 ports, 13 associations representing ports; engineers, or the commercial fishing,

⁴In this report, when we refer to “ports” we are referring to public ports in the U.S. and not privately owned ports. Some ports also administer commercial airports and host industrial or offshore wind development. These activities are outside of the scope of this review.

⁵See GAO, *West Coast Ports: Better Supply Chain Information Could Improve DOT's Freight Efforts*, [GAO-17-23](#) (Washington, D.C.: Oct. 31, 2016).

⁶H. R. Rep. No. 116-452 at 88-89 (2020).

freight, or cruise industries; and an economist from an economic and transportation consulting firm that has conducted economic impact studies on the port industry. We selected a sample of ports that vary in terms of the levels of non-freight activity, freight traffic, and geographic location, and whether the port has applied for DOT funding.⁷ The views presented in our report provide perspectives of a range of ports but are not generalizable to all ports. We selected industry associations based on geographic location, membership, recommendations from other interviewees, and previous GAO work. In discussing the views of stakeholders in this report, out of 29 non-federal entities, we refer to:

- “a few” stakeholders if representatives from two to three expressed this view;
- “some” if representatives from four to six expressed the view; and
- “many” if representatives from seven or more expressed the view.

We also interviewed officials within DOT and the Department of Commerce (Commerce), the Department of Defense (DOD), the Department of Homeland Security (DHS), and the Environmental Protection Agency (EPA).

To describe what is known about the nature of and funding for non-freight activities at ports, we also reviewed port documentation for our selected ports, including planning documents and economic impact studies. In addition, we conducted a literature search related to non-freight activities at ports over the past 10 years. We did not identify any comprehensive studies of non-freight activities at ports through this search.

In addition, to identify the extent to which federal discretionary grant programs have provided funding to public ports for non-freight and freight projects, and stakeholders’ views on this federal assistance, we reviewed the U.S. Committee on the Marine Transportation System’s Federal Funding Handbook for Marine Transportation System Infrastructure. In addition, we interviewed the previously mentioned port officials as well as industry and federal stakeholders to identify relevant discretionary grant

⁷We do not identify ports by name in this report unless we are reporting publicly available information or profiling a specific port in a “Port Focus”.

programs.⁸ We also analyzed DOT, Commerce, and EPA grant award data from fiscal year 2010 through fiscal year 2020 (the most recent year available) for programs identified as relevant to describe the total amount of funding awarded as well as funding awarded to port authorities for port projects generally and for non-freight projects specifically.⁹ We chose this period because it included the entirety of the previous decade as well as the most recent year of data available and allowed us to assess the extent to which these programs have awarded funding to ports. For programs that first awarded funding after 2010, we reviewed grant award data from when the program first awarded funding through 2020. (For more information on the programs selected and the years for which data were available, see app. 1.)

To assess the reliability of grant award data, we compared the data provided by the federal agencies to award announcements and other available agency data. We also discussed the data with relevant agency officials. We determined the data were sufficiently reliable to describe the amount of funding that relevant discretionary grant programs have awarded, as well as the funding they have awarded to port authorities, as opposed to other recipients such as transit agencies, for freight and non-freight purposes.

To describe the purpose of the programs and eligible recipients, we reviewed relevant documentation such as authorizing legislation, the most recent Notices of Funding Opportunity, and agency outreach materials and talked to relevant agency officials. For a more detailed description of our methodology, see appendix I.

We conducted this performance audit from November 2020 to December 2021 in accordance with generally accepted government auditing standards. Those standards require that we plan and perform the audit to obtain sufficient, appropriate evidence to provide a reasonable basis for our findings and conclusions based on our audit objectives. We believe

⁸Ports can also receive funding through federal formula grant programs such as DOT's Congestion Mitigation and Air Quality Improvement Program (CMAQ) and Surface Transportation Block Grant Program. However, formula grant programs are outside of the scope of this report.

⁹EPA Brownfields Program grant award data were not detailed enough for us to comprehensively assess how much funding has gone to port authorities for non-freight projects.

that the evidence obtained provides a reasonable basis for our findings and conclusions based on our audit objectives.

Background

Port Structure and Governance

No universal federal definition exists for what constitutes a port. According to DOT's Maritime Administration (MARAD), the federal agency tasked with promoting the maritime industry, a port is a geographic area such as a harbor with piers or docks that serves to facilitate the transfer of cargo, vehicles, or people between ships and shore. According to the Bureau of Transportation Statistics (BTS), ports are commonly recognized as places where cargo is transferred between ships and trucks, trains, pipelines, storage facilities, or refineries. Ports meeting these various definitions are located across the U.S., not only along the coasts but also along inland waterways and the Great Lakes. Ports range in size from large coastal ports with substantial freight activity that generates hundreds of millions of dollars in annual revenue to small inland ports with little to no freight activity.

Most ports in the U.S. are governed by port authorities—governmental entities that either own or administer the land or facilities at the port. Port authorities can be an independent entity organized under state law; part of a local or state government (e.g., the Maryland Port Administration); or an interstate authority (e.g., the Port Authority of New York and New Jersey). Port authorities have differing missions set by their charter and authorizing legislation.

- Some charters provide broad powers to port authorities that enable them to undertake a wide range of community and economic development activities. For example, the Port of Kansas City is tasked with promoting the general welfare, encouraging industrial development within the port district, and increasing commerce, among other things.¹⁰ The Port of Kansas City, like other Missouri port

¹⁰Mo. Ann. Stat. § 68.020.

authorities, is authorized to undertake a wide variety of non-freight projects including environmental, cultural, and historical projects.¹¹

- Other port authorities, such as the Port of Corpus Christi, have a mission that limits the non-freight activities they can engage in. Under Texas Water Code, the Port of Corpus Christi can only conduct activities on port property that have a nexus with maritime commerce.¹²

Multiple Federal Agencies Can Provide Funding or Other Assistance to Ports

A number of federal agencies support ports through funding for infrastructure projects or data collection on port activities, among other things.¹³

- DOT, through MARAD, is responsible for carrying out federal policy in support of the maritime industry. In line with this mission, DOT and MARAD administer several discretionary grant programs that can provide funding to ports.¹⁴ In addition, MARAD's 10 regional gateway offices in port cities serve as a liaison between MARAD, ports, and stakeholders, including the private sector, and federal, state, tribal, and local government agencies. DOT also compiles statistics related to ports through BTS. BTS's National Census of Ferry Operators collects information on ferry routes, terminals, vessels, operator-funding sources, and passengers and vehicles carried, among other things. In addition, BTS's Port Performance Freight Statistics Program collects data and reports on the capacity and throughput for the top 25 ports in the U.S. as measured by various cargo statistics.

¹¹Mo. Ann. Stat. § 68.205(17)(a), (h).

¹²Tex. Water Code § 60.101(a).

¹³In addition to the agencies described, the U.S. Coast Guard (USCG), a component of DHS, oversees security and regulates safety at ports. USCG is also the lead federal agency for the maritime mode of the Transportation Systems Sector under the National Infrastructure Protection Plan. In addition, DHS can provide funding for security improvements at ports through the Federal Emergency Management Agency (FEMA). This funding for security improvements at ports was out of the scope of this review.

¹⁴We have previously reported on challenges ports have faced obtaining federal funding for infrastructure projects. See GAO, *Maritime Infrastructure: Opportunities Exist to Improve the Effectiveness of Federal Efforts to Support the Marine Transportation System*, [GAO-13-80](#) (Washington, D.C.: Nov. 13, 2012).

- DOD, through the U.S. Army Corps of Engineers (Corps), operates and maintains navigable waterways and navigation infrastructure that serve ports and the navigation interests of 45 states, according to the Corps. This work includes maintaining 13,000 miles of commercial deep-draft channels and 12,000 miles of commercial inland channels. The Corps also collects data on freight traffic at leading U.S. ports.
- Commerce can provide funding to ports through the Economic Development Administration (EDA) in addition to collecting data on environmental conditions and other issues critical to ports through the National Oceanic and Atmospheric Administration (NOAA). EDA's discretionary grant programs can provide grant funding to ports for planning, design and implementation of economic development strategies, and construction of infrastructure projects, among other things.
- EPA provides technical assistance and discretionary grants to ports related to reducing emissions. Through its Diesel Emissions Reduction Act (DERA) and Ports Initiative programs, EPA provides funding to replace and retrofit older diesel engines along with tools and assistance to help port stakeholders identify, prioritize, and implement emissions reduction strategies, according to EPA. EPA also maintains a list of funding opportunities available to ports on the Ports Initiative website.¹⁵

Public Ports across the U.S. Pursue a Diverse Range of Non-Freight Activities for Economic and Other Reasons, Typically Funded by Port Revenues









¹⁵See Environmental Protection Agency (EPA), "Funding Opportunities for Ports and Near-Port Communities", accessed September 29, 2021, <https://www.epa.gov/ports-initiative/funding-opportunities-ports-and-near-port-communities>.

Non-Freight Activities at U.S. Ports Are Extensive and Include Maritime and Non-Maritime Pursuits

Based on our survey and interviews with port and port-industry association officials, and others knowledgeable about the industry, we found non-freight activities at ports are widespread and vary considerably. In our survey, for example, 67 ports, with a range of locations and sizes, said they have been involved in non-freight activities in the last 10 years.¹⁶ The ports that responded to our survey and other port officials we interviewed described pursuing a variety of non-freight activities at U.S. ports, including both maritime activities and other activities outside a strictly maritime focus (see fig. 1).

¹⁶Eighty ports responded to our survey. The types of ports in our survey were: coastal/deepwater ports, 35; river/inland ports, 32; Great Lakes ports, 10; and Other, 2. One responding port did not identify its port type. For further details on our survey, see appendixes I through III.

Figure 1: GAO-Identified Non-Freight Activities at U.S. Public Ports

Category	Activities
 Cruise lines	<ul style="list-style-type: none"> • Great Lakes cruises • Inland waterways cruises • Ocean-going cruises
 Commercial fishing / fish processing	<ul style="list-style-type: none"> • Facilities for fishing fleet, including docking • Facilities to process fish on shore
 Recreation	<ul style="list-style-type: none"> • Boating / marinas • Sport fishing • Trails, waterfront access
 Transit	<ul style="list-style-type: none"> • Parking facilities • Passenger ferries • Streetcars • Train, bus stations • Water taxis
 Development	<ul style="list-style-type: none"> • Commercial development, such as office buildings • Convention centers • Hotels / motels • Mixed-use development, which combines activities, such as residential and retail • Public marketplaces, including farmer's market • Residential development • Services and amenities for port workers, to attract and retain workforce
 Environmental improvement / remediation	<ul style="list-style-type: none"> • Cleaning-up and re-using contaminated sites; emission reduction • Establishing habitat, parkland, including to offset loss of areas for development
 Educational / cultural	<ul style="list-style-type: none"> • Career services, job retraining, campuses of local schools / universities • Educational programs for children, college students • Museums, art, concert venues, theaters
 Other	A wide range, including agriculture, campground, casino, festivals, movie filming location, and sports facility.

Sources: GAO survey of U.S. public ports and interviews with port industry stakeholders; GAO (icons). | GAO-22-104630

Text of Figure 1: GAO-Identified Non-Freight Activities at U.S. Public Ports

Category	Activities
Cruise Lines	<ul style="list-style-type: none"> • Great Lakes cruises • Inland waterways cruises • Ocean going cruises
Commercial fishing / fish processing	<ul style="list-style-type: none"> • Facilities for fishing fleet, including docking • Facilities to process fish on shore

Category	Activities
Recreation	<ul style="list-style-type: none"> Boating / marinas Sport fishing Trails, waterfront access
Transit	<ul style="list-style-type: none"> Parking facilities Passenger ferries Streetcars Train, bus stations Water taxis
Development	<ul style="list-style-type: none"> Commercial development, such as office buildings Convention centers Hotels / motels Mixed-use development, which combines activities, such as residential and retail Public marketplaces, including farmer's market Residential development Services and amenities for port workers, to attract and retain workforce
Environmental improvement / remediation	<ul style="list-style-type: none"> Cleaning-up and re-using contaminated sites; emission reduction Establishing habitat, parkland, including to offset loss of areas for development
Educational / Cultural	<ul style="list-style-type: none"> Career services, job retraining, campuses of local schools / universities Educational programs for children, college students Museums, art, concert venues, theaters
Other	<ul style="list-style-type: none"> A wide range, including agriculture, campground, casino, festivals, movie filming location, and sports facility.

Notes: The list of Other non-freight activities shown in figure 1 is abbreviated; for a complete list of all such activities we compiled, see app. III. The non-freight activities shown here are not presented in rank order. Appendix II provides a rank ordering of non-freight activities as identified in our survey of public ports. In addition to these current activities we identified, ports cited possible future activities: billboards, cellular communications towers, housing for port workers, and leasing property for solar arrays.

Sources: GAO survey of U.S. public ports and interviews with port industry stakeholders; GAO (icons). | GAO-22-104630

Although ports have pursued non-freight activities for decades, some stakeholders we interviewed reported growing interest in recent years. For example, officials of one port-industry association described how cruise activity on Pacific Northwest rivers has increased markedly in recent years, providing considerable non-freight revenue to the ports and

surrounding communities.¹⁷ Similarly, officials at a port industry association and the Great Lakes St. Lawrence Seaway Development Corporation told us that more ports in the region are seeking to attract cruise lines, while also pursuing habitat and environmental restoration.¹⁸

The extent to which ports have developed non-freight activities varies. Most ports (about two out of three) responding to our survey reported a mix of freight and non-freight activities, but some (roughly one out of five) reported having only non-freight activities, and others (about one out of seven) reported having freight activities exclusively.

In another indication that non-freight activities are extensive at many ports, about half of respondents to our survey reported that a majority of port revenues stem from non-freight activities. Officials of an east coast port told us cruise activity has become a large portion of the port's revenue. An official at a small river/inland port told us the port derives more than 75 percent of its revenues from non-freight activities, including fisheries, commercial development, and educational activities. The port's role, the official told us, is to develop diverse industries – freight is critical, but it is not the port's mandate. For further details of our survey, including summary results by varying port characteristics and responses to individual questions, see Appendix II.

¹⁷Cruising has grown to become a significant non-freight activity at ports. According to a cruise-industry trade association, there are now about 30 ports throughout the United States where ocean-going cruise ships depart and call. Until 2020 and the Coronavirus Disease 2019 (COVID-19) pandemic, U.S. cruise passenger volume had been growing by 4.8 percent annually since 2013, reaching 14.2 million in 2019. Ports with cruise activity and a cruise-industry trade association described to us the sharp decline in business due to COVID-19 restrictions, but noted that prior to the pandemic, satisfying growing demand was a challenge. Meanwhile, DOT officials noted that increased freight activity at ports in 2020-2021, may signal a greater freight focus for ports in years to come.

¹⁸The Great Lakes St. Lawrence Seaway Development Corporation is a government-owned corporation that operates the U.S. portion of the binational seaway. See 33 U.S.C. Chapter 19.

PORT FOCUS: The Port of San Diego



Source: Port of San Diego. | GAO-22-104630

employee salaries. The port operates under a 1962 state law, as amended, that created a special port district to promote not just commerce and navigation, but also fisheries and recreation.^a The port also has authority to protect natural resources and water quality in San Diego Bay. According to port officials, while other big California ports generally manage only where freight activities take place, San Diego manages the whole of the coastline of its five member municipalities.^b For about a third of its acreage, the port acts as environmental steward, port officials told us; another third is for industrial development, including shipyards and facilities to support the U.S. Navy (which has a large local presence); and the remainder is non-industrial, including the hotels, marinas, restaurants, and everything else.

The Port of San Diego, a large ocean port spanning 34 miles of coastline just north of the Mexican border, relies on what port officials described as an expansive charter to be an all-in-one manager of waterfront stretching across five cities, and has an extensive range of non-freight activities.

According to port officials, it is the fourth largest of 11 California ports. It is also a tourist destination, with about 18 hotels, 20 marinas, restaurants, tourist attractions, and cruise ship facilities. The port maintains 22 public parks, three public boat launches, five public fishing piers, and four public viewing piers, free mooring and docking, and public art displays. Port officials also told us the port subsidizes commercial fishing by designating areas solely for commercial fishing infrastructure and by greatly reducing slip rents for fishing boats.

These non-freight activities are crucial for the port, accounting for about two-thirds of revenues, according to the officials. The revenues fund a wide range of port functions, including a police department and port

Source: GAO, based on interview with Port of San Diego officials and port documents. | GAO-22-104630

^aCalif. Stats. 1962, 1st Ex. Sess., c. 67, p. 362, § 4, as amended (Cal. Harb. & Nav. Code, App. 1, § 4).

^bThe five cities are Chula Vista, Coronado, Imperial Beach, National City, and San Diego.

Port Stakeholders Cite a Range of Economic and Other Benefits—including Diversification of Revenue—as Reasons for Pursuing Non-Freight Activities

Ports, port industry associations, and other port stakeholders cited a range of reasons why ports pursue non-freight activities.

- **New and diverse revenue sources.** Port stakeholders told us that in addition to generating significant revenue, non-freight activities can diversify a port's lines of business. According to DOT and AAPA, ports with more diverse sources of revenue are often financially stronger.¹⁹ A southern port official described how a change in U.S. trade policy once hurt the port's freight business, prompting the port to expand

¹⁹DOT and AAPA, *Port Planning and Investment Toolkit*, (Washington, D.C.: Jan. 2017).

non-freight activities to diversify its portfolio and reduce dependence on the freight traffic affected by the trade policy. An official of another southern port described extensive leasing of port property to dozens of companies. According to the official, this leasing provides a predictable and steady stream of revenue and allows the port to avoid borrowing money. A port-industry association official told us that COVID-19 underscores the importance of diversifying revenue. According to the association, if a port is only involved in one line of business, such as cruise lines, its revenues can be decimated by a disruption. But if a port has a range of activities—such as cargo, cruise, and community engagement through other, smaller projects—the port can be financially stable even if one activity is hurt.

- **Repurposing infrastructure.** Developing non-freight operations can allow ports to generate returns on underused property or obsolete infrastructure, port officials and others told us. An east coast port official described how new demand from cruise lines allowed the port to re-purpose previously underused facilities that were no longer ideal for freight use given changes in the shipping industry. In Humboldt County on the Northern California coast, a project is under way to convert a former pulp mill at a marine terminal into what its sponsor says will be the state's first commercial-scale, land-based salmon farm.
- **Economic impact.** According to economic impact studies and port stakeholders, non-freight activities' economic impacts can include job creation and support for existing or emerging businesses. For instance, a 2019 economic impact study commissioned by the Port of Seattle, among others, estimated that cruise activity at the port had an economic impact of 5,500 jobs and \$894 million in total business output for 2019.²⁰ In addition, the study found that commercial fishing accounted for 11,300 jobs and \$1.4 billion in total business output for 2017.

Port stakeholders told us that some ports see economic development and providing good jobs as a core part of their mission, with many ports effectively serving as the economic development agency for their communities. For example, officials of a southern port told us the port sees itself as a regional economic driver, with a significant portion of local employment linked to the port. Likewise, officials of a west coast port industry association told us ports take pride in being a

²⁰Community Attributes, Inc., *Port of Seattle, Port of Tacoma, and the Northwest Seaport Alliance: Economic Impact Analysis* (Seattle: March 2019).

conduit for economic development in their communities; given geographic constraints of port locales, other employment opportunities may be scarce. Port officials also reported aiding new businesses through business incubator facilities.²¹

- **Community development.** Some port and port-industry association officials, and representatives of an engineering association, told us they see non-freight activities as addressing unmet community development needs, as well as providing a place for communities to come together. For example, an official of a southern port told us that as a public entity, the port views its role as filling a gap between what the private sector can develop itself and where it needs assistance. Similarly, an official of a Midwestern port said the port tends to focus its developmental efforts in distressed communities where the private sector has less incentive to be involved, according to the port official.

These community development activities can address particular local economic needs, as some port officials described to us. One Midwestern port official, for example, described how the port led the redevelopment of a large, especially blighted property that was prominent in the local community. This development now employs local residents and has helped to revitalize the surrounding neighborhood.

Officials of a few ports provided examples of how non-freight activities can facilitate community. Officials of a west coast port considering new non-freight activities told us the port plans to create a venue that could host community events, plus public art and performance space. Similarly, officials of a southern port told us the port recognizes it has a responsibility to the community, and one way it seeks to address this is through providing places for public gatherings.

Non-freight activities that contribute to community development or a sense of community can also create goodwill, according to port stakeholders. Port stakeholders told us this goodwill can increase public trust in the port and build support for, or mitigate opposition to, port operations. For instance, one port-industry association official told us that when non-freight activities improve the environment or cause more people to become involved in the port, the port is seen less as an unattractive neighbor due to its freight operations, and people have

²¹In our work, including through our literature search, we did not identify comprehensive information or research addressing the economic impact of non-freight activities at public ports. We likewise did not identify comprehensive information on the *relative* economic impact of freight-versus-non-freight activities. In our survey, respondents were generally evenly divided on which provided the greater economic impact.

a more favorable view of the facility. Similarly, a Midwestern port official told us that a goal of its port's non-freight activities, including recreational activities, is to boost its community standing, thereby strengthening its ability to maintain core freight operations.

According to some port and port-industry association officials, changing community expectations in recent years have been a driver of ports pursuing non-freight activities that contribute to community development. For example, an official of one Midwestern port said there is more interest in residential and recreational development along the port's river as community perceptions of the benefits the waterway can provide have changed. Similarly, officials of a west coast port told us that over the past 15 years, historic waterfronts have undergone environmental cleanups, and, as a result, the public now looks to these areas to be viable and enjoyable. Officials of one port industry association told us that there is greater public expectation not only that ports provide jobs and opportunities but also that they factor in environmental impact, which could lead ports to pursue non-freight activities.

- **Environmental mitigation as a condition of development.** In some cases, development projects that affect the environment must provide offsetting environmental improvements—a practice known as environmental mitigation. For example, officials of a southern port told us that as part of a project to expand berthing capacity, the port needed to remove an area of mangrove forest. As a condition of the expansion, under an agreement with the state environmental agency, the port is creating a new section of mangroves elsewhere at the port.

PORT FOCUS: The Port of Bremerton, Washington

Source: Port of Bremerton. | GAO-22-104630

In Washington's Puget Sound region, the Port of Bremerton lies between the big ports of Seattle and Tacoma. Unlike its maritime neighbors, Bremerton handles only a small amount of freight, and no container traffic, according to the port's marine director. Instead, it has pursued a wide range of non-freight activities.

The port has two marinas, three public use boat ramps, two fishing docks, several parks, small venues for music and theater, and a sports facility, according to the port's marine director. Adjacent to the marine area are projects including an apartment building, a hotel, and a parking garage. The port leases waterfront buildings and maintains moorings for pedestrian ferries that operate in Puget Sound. It is a port-of-call for smaller cruise ships, and it partners with local high schools and the local community college in providing on-water training and access to facilities, the marine director said. The port also has a Vietnam War-era destroyer, which serves as a museum. The port is the local center for responders to fuel spills. It also services local tribes, providing use of its

breakwater for tribal fishing. It plans to expand in areas including ferries and cruising.

Under the port's state charter, it is authorized to engage in a range of activities for its community: economic development, providing public-park and recreation facilities, and facilitating infrastructure for the port district, port development authority, or tenants or lessees. The COVID-19 pandemic has also spotlighted the port's role as community hub. For example, when boating was determined to be a safe activity during the pandemic, boating activity increased by 30 percent, the marine director said, as people gave up distant vacation travel and turned to local boating instead.

Overall, the port official said, the cost of large, freight-only facilities means the opportunity for success for smaller ports to pursue freight activities is limited and barriers to entry are high. Non-freight activity at ports like Bremerton creates jobs and economic opportunity in smaller communities that have greater need and less opportunity than the urban freight centers, the port official said.

Source: GAO, based on interview with Port of Bremerton marine director. | GAO-22-104630

In identifying non-freight activities at ports, we also identified challenges or barriers to such activities, including why some ports elect to focus on freight. These factors include lack of authority, physical constraints, and a desire to preserve waterfront land for freight movement. Table 1 summarizes what port and port-industry association officials, and other port stakeholders, cited as factors for why ports may minimize or avoid non-freight activities.

Table 1: Stakeholder-Identified Reasons Why Ports May Not Pursue Non-Freight Activities

Factor	Description
Community opposition	Community opposition can include concern over local effects of development (congestion, pollution, noise, etc.) plus larger issues, such as climate change.
Competition	There may be perception or tension that non-freight activities are in competition with the private sector, especially if the port can pursue projects less expensively due to its being a public agency.
Difficulty of assessing benefits	Benefits of some non-freight activities may be intangible, making them harder to assess, compared to freight operations, where benefits are more tangible. The more readily assessed benefits of freight activities may make them more attractive for development than non-freight activities.
Freight focus	Ports might determine that freight focus is most appropriate, providing superior economic impact. They may also decide that non-freight activities could distract from the port's core freight mission.
Lack of authority	There may be no statutory, charter, or governance authority to undertake non-freight activities.
Lack of funding	Sources or mechanisms to finance non-freight activities may not be available, or there may be competition for funding. Also, freight activities may be more likely to be funded under certain federal grants than non-freight activities.
Lack of staff	Ports may need additional staff to pursue non-freight activities.
Loss of freight capacity or waterfront property	Once freight-related land is given over to non-freight activities, it may be difficult to reclaim and be unavailable for future freight needs.
New type of business activities	New, non-freight activities may present new burdens or risks, such as managing a workforce in non-traditional lines of business.
Physical limitations	Various port conditions may impede or preclude non-freight activities, such as: competition for port facilities, port layout, land availability, level of congestion, and inability to separate freight and non-freight activities.
Political context	Political setting, port leadership, and risk appetite may not be conducive to pursuing non-freight activities.
Regulatory challenges	Regulatory and permitting requirements may impose significant costs and delays.

Source: GAO interviews with selected ports and industry stakeholders. | GAO-22-104630

In all, our review found there is no standard template for whether a port is more or less likely to have non-freight activities. Instead, port officials and others told us that the factors that either encourage or discourage such activities combine uniquely at a particular port, influencing the activities the port may elect to pursue.

PORT FOCUS: Georgia Ports Authority



Source: Georgia Ports Authority. | GAO-22-104630

according to the authority official: Unless Savannah were to become the homeport for a cruise ship, or multiple ships—as distinct from simply a stop on a cruise ship itinerary—there would not be enough revenue generated to support putting in necessary dock facilities. Also, there is community opposition, with many people passionate about not wanting cruise business and the transient visitors it would bring into the local community. Part of Savannah’s charm for tourists is visiting the city’s historic riverfront, the authority official said, and the sight of a very large cruise ship, with thousands of people moving on and off the vessel, would undercut that experience.

Moreover, from a business perspective, it would not make sense to divert assets to the cruise business, the official said—the existing freight business is eight to 10 times more profitable. In addition, cruising is seasonal, which also undercuts revenue viability. Further, there is the ports’ state mandate, which is to focus on ships and cargo, the official said.

Source: GAO, based on interview with Georgia Ports Authority official. | GAO-22-104630

The Georgia Ports Authority has assessed the economics of non-freight activities and concluded it should maintain a strong focus on freight.

The authority, an entity of state government, operates several ports across the state. This includes the Port of Savannah, which the authority says includes the largest single-terminal container facility of its kind in North America. The authority has considered whether to broaden into non-freight activities, and each time, has determined that such activities would not be a prudent investment, an authority official told us.

The key possibility explored has been the potential for cruise operations. Savannah, with a waterfront and historic district, would seem an appealing port-of-call for cruise ships, the official said. With attractions including art, period architecture, and boutiques, the Savannah region has become a popular tourism destination. But repeated analyses have yielded the same conclusion,

Ports Described Using Port Revenues and Other Sources to Fund Non-Freight Activities

Ports responding to our survey, and port officials with whom we spoke, described a variety of funding sources to support their non-freight activities. In our survey, responding ports most commonly cited using port revenues, followed by funds from their state government, as the chief means to fund non-freight activities. Table 2 summarizes port responses on sources of funding for non-freight projects.

Table 2: Most Commonly Cited Funding Sources for Non-Freight Activities among U.S. Public Ports GAO Surveyed	
Rank	Funding Source
1	Port revenues (55 respondents)
2	State government (53 respondents)
3	Federal government (38 respondents)

Rank	Funding Source
4 (tie)	Port bonding or other port financing authority (33 respondents)
4 (tie)	Local sources (e.g., local city or town, or local revenue-generating authority or district) (33 respondents)
6	Regional sources (e.g., county, group of cities/towns, or regional revenue generating authority or district) (28 respondents)
7	Other, including private funds, tenant/occupant funding, private loan/investment, public/private partnership, facilities fees; insurance proceeds. (12 respondents)

Source: GAO survey of U.S. public ports. | GAO-22-104630

Note: Eighty total survey responses received. Not all respondents answered all questions.

Most survey respondents reported funding non-freight activities with port revenues. Sometimes, revenues generated by the port's freight business fund non-freight activities. For example, the Port of Los Angeles dedicates 10 percent of its annual operating income, including revenue from freight operations, to non-freight projects, focusing on public access, including connecting waterfront attractions and improving public experience at the waterfront. In other cases, the non-freight activity undertaken may itself be a source of significant revenue. For instance, officials of an east coast port and a west coast port told us their ports have used fees on cruise passengers to finance cruise ship facility improvements at their ports.

However, some port stakeholders we spoke with or who responded to our survey reported that they could not fund port infrastructure needed for non-freight activities through non-freight revenues alone. Survey respondents and stakeholders we spoke with also identified particular challenges small ports face in funding infrastructure generally, which also applied to non-freight activities. As one port official told us, small non-freight ports have limited revenue sources, making expensive improvements extremely difficult without the assistance of grant funding. Another noted that regional ports do not have the same revenue streams of larger ports but that infrastructure replacement costs are very similar.

In light of these challenges, officials at a number of ports said that getting public funds, such as through the state or federal government, was important to their ability to develop infrastructure needed for non-freight activities. Port stakeholders with whom we spoke provided examples of how this funding helped ports to develop non-freight activities:

- **State funding:** One port-industry association official pointed to the Florida Seaport Transportation and Economic Development Council, which has awarded funding to ports for economic development

projects including cruise terminal projects.²² Officials of a national port industry association told us that in seeking public support for expensive capital projects, many ports have recently come to rely more on state programs.

- **Federal funding:** While 38 survey respondents reported using federal funds for non-freight activities at ports, officials at a number of ports with whom we spoke or who responded to our survey emphasized the limited nature of federal funding opportunities at ports for such activities. See the next section for a discussion of federal funding for non-freight activities.
- **Local or regional sources:** Survey respondents and industry stakeholders we spoke with identified local or regional sources as a funding stream for non-freight activities. As shown above, 33 and 28 respondents, respectively, reported funding their non-freight activities with local or regional sources. These sources could include property tax revenue. For example, an economist from a transportation and economic consulting firm told us that the ability of some Pacific Northwest and Midwestern ports to draw a portion of their funding from local property tax revenue allows them to be more involved in non-freight activities. Similarly, officials of a west coast port described to us how the port uses property tax revenue to raise money through its bonding authority.

Federal Grant Programs Have Supported Some Non-Freight Activities at Ports, and Some Ports Described Funding Challenges

Reviewed Federal Grant Programs Have Provided Some Port Funding for Non-Freight Activities but Are Largely Freight Focused

Several grant programs across the federal government have provided some funding to ports for non-freight activities, although the vast majority

²²The Florida Seaport Transportation and Economic Development Council is a public entity tasked with carrying out Florida's economic development mission through implementation of ports' capital improvement projects. The council is made up of the port directors of Florida's 15 deepwater ports, the Secretary of the Florida Department of Transportation, and the Executive Director of the Florida Department of Economic Opportunity.

of federal grant funding to ports in the programs we reviewed has gone toward freight-related activities. According to our analysis of federal grant data from fiscal year 2010 through fiscal year 2020, federal grant programs have provided at least \$141 million in fiscal year 2020 dollars for non-freight projects at ports.²³ This amount is about 8 percent of the almost \$1.9 billion in fiscal year 2020 dollars in total funding these programs awarded to ports.²⁴ The majority of the funding for both non-freight and freight related projects was provided by DOT.

Within DOT, several non-freight projects at ports have received funding through two discretionary grant programs—Rebuilding American Infrastructure with Sustainability and Equity (RAISE) grants and the Passenger Ferry Grant Program.

- **RAISE.**²⁵ One of three major DOT discretionary grant programs that could benefit ports, according to DOT officials, RAISE is designed to fund surface transportation infrastructure that will have a significant local or regional impact. RAISE is open to a wide range of applicants, including port authorities and state and local governments, and it can fund a variety of projects, including port infrastructure, road, transit, and rail projects. DOT officials told us that non-freight port projects could be competitive for RAISE funding as they fit well with several of RAISE’s selection criteria, including Quality of Life.²⁶ Our analysis of RAISE grant award data from fiscal year 2010 through fiscal year 2020 identified six grants awarded to port authorities for non-freight

²³Due to limitations with Brownfields Program data, discussed later, this amount represents the minimum amount the programs we reviewed awarded for non-freight port projects.

²⁴All below grant award totals are in fiscal year 2020 dollars unless otherwise noted.

²⁵Formerly known as Better Utilizing Investments to Leverage Development (BUILD) and Transportation Investment Generating Economic Recovery (TIGER). In this report, we use RAISE to refer to all iterations of the program.

²⁶For the fiscal year 2021 RAISE program the selection criteria were: Safety, Environmental Sustainability, Quality of Life, Economic Competiveness, State of Good Repair, Partnership, and Innovation.

projects totaling almost \$63 million.²⁷ Funding for non-freight port projects represented about 7 percent of the almost \$882 million awarded to port authorities for port projects (both freight and non-freight related) and about 1 percent of the almost \$8 billion awarded in total. Awarded non-freight projects include pedestrian and water access improvements, docking for cruise ships, and a bulkhead project benefiting the commercial fishing industry.

- **Passenger Ferry Grant Program.** The Passenger Ferry Grant Program also provides funding to ports for non-freight activities—more specifically for ferry projects only. The program, administered by the Federal Transit Administration (FTA), provides funding for ferry and terminal projects to a range of entities, including port authorities and transit agencies.²⁸ Our analysis of Passenger Ferry Grant Program award data found that, from the program's inception in fiscal year 2013 through fiscal year 2020, port authorities received about \$19 million to acquire ferry vessels, rehabilitate piers, and construct ferry terminals, among other projects. In total, the Passenger Ferry Grant Program has awarded about \$271 million.

In contrast to RAISE, two other major DOT discretionary grant programs available to ports—the Infrastructure for Rebuilding America program (INFRA) and the Port Infrastructure Development Program (PIDP)—have statutory eligibility requirements that focus on freight-related projects, with some exceptions.²⁹ These programs awarded over \$700 million to ports from fiscal year 2016 through fiscal year 2020, but we identified only one grant, from INFRA, that was awarded for a non-freight project, as described below.³⁰

²⁷This total does not include projects intended to improve the environmental resilience of the port generally but not linked to a specific non-freight use— projects that could benefit non-freight uses but are predominately freight projects, or port projects where the recipient is not a port authority. We also identified two river walk projects and a streetcar project where a port authority partnered with the lead applicant on the project. These projects are also not included in the total.

²⁸Ferries and ferry terminals are operated by a variety of entities including private operators, state and local governments, port authorities, transit agencies, and the federal government.

²⁹See 23 U.S.C. 117(d), 46 U.S.C. § 50302(c)(3).

³⁰MARAD's America's Marine Highway Program is a smaller grant program available to ports. It awarded grants to ports in 2010 and 2016-2020. However, its implementing regulations focus on freight related projects. See 46 C.F.R. § 393.3(a)(2).

- **INFRA.**³¹ INFRA is to provide federal financial assistance to freight and highway projects of national or regional significance. In the course of our review, we identified one non-freight INFRA award: in fiscal year 2017, INFRA awarded \$5.3 million to a ferry dock project. INFRA can provide funding to port authorities, state departments of transportation, and local governments, among other entities. However, its eligibility requirements have been focused on freight, and, it has not been a significant source of funding for non-freight activities. From its creation in fiscal year 2016 through fiscal year 2020, INFRA awarded almost \$4.3 billion in grants including about \$271 million to port authorities for port projects (6 percent).³²
- **PIDP.** PIDP is the only major DOT discretionary grant program available exclusively for port projects. Our analysis of PIDP grant award data did not identify any non-freight PIDP awards. Eligible PIDP projects are expressly limited to specified types of port and cargo-related improvements. These include projects that improve the safety, efficiency, or reliability of the loading, unloading, or movement of goods into, out of, around, or within a port, as well as environmental mitigation measures and operational improvements directly related to enhancing the efficiency of the port. Since PIDP first awarded funding in fiscal year 2019 through fiscal year 2020, it awarded almost \$512 million for port projects including almost \$473 million to port authorities. A variety of projects have been funded through PIDP, including dock rehabilitation and on-dock rail projects.

Outside of DOT, Commerce and EPA have also provided some grant funding to ports for non-freight activities since 2010.

- **Economic Development Administration.** EDA, within Commerce, provides grants to support economic development, foster job creation, and attract private investment in economically distressed areas. EDA grants are intended to leverage existing regional assets to support

³¹Formerly known as Fostering Advancements in Shipping and Transportation for the Long-Term Achievement of National Efficiencies (FASTLANE). In this report, we refer to all iterations of the program as INFRA.

³²Our previous work has evaluated DOT's application review and selection process for the INFRA program. See GAO, *Discretionary Transportation Grants: Actions Needed to Improve Consistency and Transparency in DOT's Application Evaluations*, [GAO-19-541](#) (Washington, D.C.: June 26, 2019) and GAO, *Discretionary Transportation Grants: DOT Should Take Actions to Improve the Selection of Freight and Highway Projects*, [GAO-18-38](#) (Washington, D.C.: Nov. 2, 2017). We currently have ongoing work reviewing the fiscal years 2019 and 2020 INFRA program.

economic development strategies that advance new ideas and creative approaches. Commerce officials told us that EDA can fund non-freight activities at ports, including rehabilitating infrastructure to improve resiliency and expand ports. Our analysis of EDA data found that for fiscal years 2010 through 2020, EDA provided 22 grants totaling over \$39 million for the following types of non-freight projects at ports: construction of a fish market, marina and pier improvements, and bike lanes, among other projects.³³ This represented about 30 percent of the almost \$129 million EDA provided to port authorities for all port projects during this period.³⁴ In total, EDA provided over \$5 billion in grants to a variety of entities during this period.

- **DERA and Brownfields Program Grants.** EPA's DERA grants provide funding for projects that reduce diesel emissions from mobile sources. Eligible applicants are regional, state, local, and tribal agencies, nonprofit organizations, and port authorities. DERA can provide funding for both freight and non-freight projects at ports. We identified 25 grants to port authorities totaling over \$14 million in funding from fiscal year 2010 through fiscal year 2020 for non-freight port projects such as installing shore power and replacing engines for ferries. Shore power allows ships to plug into the local electricity grid and turn off auxiliary engines while at-dock. In total DERA has awarded almost \$440 million in grants under its national and tribal DERA programs including over \$78 million to port authorities for port projects.³⁵

EPA's Brownfields Program provides grants and technical assistance to assess, safely clean up, and sustainably reuse contaminated properties. Port authorities, state and local governments, and non-

³³This total does not include funding for projects intended to improve the environmental resilience of the port generally but not linked to a specific non-freight use, projects that could benefit non-freight uses but are predominately freight projects, or port projects where the recipient was not a port authority.

³⁴These port projects were funded through EDA's Public Works and Economic Adjustment Assistance programs, identified by Commerce officials as the main EDA grant programs available to port authorities. Port authorities are also eligible for EDA's Planning and Local Technical Assistance program.

³⁵EPA also provides formula grant funding through its DERA State program. These grants are outside of the scope of this report. For the purposes of this report, we identified grants that went to port authorities for port projects. For EPA's full list of DERA grants awarded for port projects, including those awarded to non-port authority recipients, see Environmental Protection Agency (EPA), "Overview of DERA Grants Awarded for Port Projects", accessed October 15, 2021, <https://www.epa.gov/ports-initiative/overview-dera-grants-awarded-port-projects>.

profit organizations and others are eligible for grants. From fiscal year 2010 through fiscal year 2020, the Brownfields Program awarded at least \$16 million to port authorities out of almost \$867 million in total grant funding.³⁶ Port authorities received grants to, among other things, conduct environmental site assessments, develop area-wide plans and implementation strategies, and clean up hazardous substances.

Stakeholders Identified Challenges with Federal Grant Programs, Especially for Small Ports, and Differed on the Need for Additional Federal Assistance for Non-Freight Activities

Federal officials, officials at ports, and port industry associations identified challenges related to grant programs across the federal government that generally applied to both freight and non-freight projects:

- **Application Process.** Some survey respondents and many stakeholders we spoke with told us that the application process for DOT funding can be challenging for small ports. For example, small ports may not have the organizational capacity to complete these applications. While some large ports have sizable staffs and employ in-house grant writers, small ports may only have a few employees. These ports may need to hire a consultant to conduct the required benefit-cost analysis, a process that can be difficult for a smaller port.³⁷ MARAD officials acknowledged that some ports do not have the resources to compete for grants but said MARAD can offer technical assistance and help identify specific resources to assist those ports.

³⁶EPA Brownfields grant award data were not detailed enough for us to comprehensively assess how much funding has gone to port authorities or to determine how much specifically went to non-freight projects. We were able to identify some grants as having gone to port authorities based on recipient names that indicated they were a port authority: for example, the Port of New Orleans, Lorain Port Authority, and The Port Authority of St. Paul. In other cases, where the grant went to a city or state government that administers a port, we could not determine whether these grants were specifically awarded to the port and did not count them in the above total.

³⁷INFRA and RAISE require a benefit-cost analysis as part of the application. PIDP does not require a benefit-cost analysis for applications for small projects at small ports in accordance with 46 U.S.C. § 50302(d); however, PIDP does require a benefit-cost analysis for all other applications.

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- **Competition.** Stakeholders identified the competitiveness of federal grant programs as a challenge for ports. Federal officials and many port stakeholders told us that demand for RAISE, the Passenger Ferry Grant Program, EDA, and DERA funding is consistently greater than available funding. For example, DOT officials told us that they receive about 700 applications for each round of RAISE funding. From fiscal year 2010 through fiscal year 2020, DOT selected an average of 57 projects for each round of RAISE funding. Furthermore, a few industry stakeholders—including officials at a port and a port industry association—said that larger freight projects tend to be more competitive for RAISE funding than non-freight projects. DOT officials told us that both freight and non-freight projects can be competitive for RAISE funding.

Another concern specific to RAISE is that there is a cap on the amount of funding that can go to any one state. For the fiscal year 2021 RAISE program, no more than 10 percent of RAISE funds could go to projects in a single state. Because of this stipulation, ports may be competing against other local projects for limited funding, and according to many stakeholders, state and local policymakers may elect to advocate for a transit or road project over a port project. Some industry stakeholders we spoke with said that support from state and local policymakers is an important part of successful RAISE applications. Further, DOT's applicant toolkit mentions that relationships with state entities can be critically important to an application's success.³⁸ DOT officials acknowledged that the geographic requirements of the RAISE program could pose challenges for port applicants.

- **Minimum Award Size.** Some stakeholders identified challenges related to minimum award sizes for DOT grant programs. For example, the fiscal year 2021 RAISE program had a minimum award size of \$1 million for projects in rural areas and a minimum award size of \$5 million for projects in non-rural areas. According to some stakeholders, smaller ports cannot apply to RAISE because they do not have a project that meets that threshold although they have smaller projects that they cannot fund on their own. One port industry association official told us this situation is an issue as projects that cost less than \$1 million can have a community benefit that far outweighs the cost.

³⁸DOT, *R.O.U.T.E.S. Rural Opportunities to Use Transportation for Economic Success: Applicant Toolkit for Competitive Funding Programs at USDOT* (Washington, D.C.: July 27, 2020).

As previously mentioned, ports fund their non-freight activities using a variety of sources other than federal funds, including port revenues and, local, state, and private funding. Port stakeholders and survey respondents differed on the need for additional federal funding for non-freight activities.

Many survey respondents and port stakeholders we spoke with said there is a compelling need for additional federal funding for non-freight activities.

- Survey respondents cited a range of reasons why additional federal funding for non-freight activities is needed, including the difficulties that smaller ports and ports without freight have obtaining funding, the ability of federal funding to spur economic development, and the need for ports to diversify their activities to remain competitive. Some survey respondents said additional funding could be useful for projects such as environmental and tourism projects.
- Many port stakeholders we spoke with said that additional funding is needed, as the role of ports is expanding beyond just moving freight, and that traditional funding sources—such as RAISE and INFRA—are not a great fit for non-freight projects. Further, officials at one port said federal funding can (1) foster non-freight development that may not have otherwise happened because of lack of return on investment or (2) accelerate non-freight projects already underway.

However, officials at a few ports reporting a need for additional federal funding for non-freight activities also said that freight projects should be prioritized and the additional funding for non-freight activities should not come at the expense of freight funding.

In contrast, a few survey respondents and many other stakeholders we spoke with told us there is not a compelling need for additional federal assistance for non-freight activities. These survey respondents said that funding for non-freight projects distracts from freight funding and non-freight projects can and should be financed by the private sector. Similarly, many stakeholders we spoke with—including officials at ports, port industry associations, a freight industry association, and an economist from an economic and transportation consulting firm—said there is not a compelling need for additional federal assistance for non-

freight activities.³⁹ Most of these stakeholders stated that federal funding should focus on freight projects, as freight movement has clear national benefits and enables interstate commerce, as compared to non-freight projects, where national benefits may not be present. Stakeholders also cited the deteriorating condition of existing freight infrastructure as a reason federal funding should focus on freight projects. In addition, one stakeholder told us that developing a federal assistance program for non-freight activities focused on commercial development would be logistically difficult given the competing interests and would interfere with private sector investment.

Agency Comments

We provided a draft of this report to the Departments of Commerce, Defense, Homeland Security, and Transportation, and the Environmental Protection Agency for review and comment. The Department of Defense provided us with technical comments, which we incorporated as appropriate. The Departments of Commerce, Homeland Security, and Transportation, and the Environmental Protection Agency informed us that they had no comments.

We are sending copies of this report to the appropriate congressional committees, the Secretaries of the Departments of Commerce, Defense, Homeland Security, and Transportation, and the Administrator of the Environmental Protection Agency, and other interested parties. In addition, the report is available at no charge on the GAO website at <http://www.gao.gov>.

If you or your staff have questions about this report, please contact me at (202) 512-2834 or vonaha@gao.gov. Contact points for our Offices of Congressional Relations and Public Affairs may be found on the last page

³⁹A few stakeholders that did not believe there was a compelling need for additional federal funding for non-freight activities clarified that their response did not apply to cruise or ferry projects.

of this report. GAO staff who made key contributions to this report are listed in appendix IV.

A handwritten signature in black ink, appearing to read 'Andrew Von Ah', with a stylized, cursive script.

Andrew Von Ah
Director, Physical Infrastructure Issues

Appendix I: Objectives, Scope, and Methodology

House Report 116-452 accompanying a bill for the Department of Transportation, and Housing and Urban Development, and Related Agencies appropriations, 2021 includes a provision for GAO to examine ports' non-freight activities.¹ This report describes

- what is known about the nature of and funding for non-freight activities at public ports, and
- the extent to which federal discretionary grant programs have provided funding to public ports for non-freight and freight projects, and stakeholders' views on this federal assistance.

For both objectives, we conducted a non-generalizable survey of ports to obtain information on the non-freight activities occurring at their ports, funding for these activities, and the impact of these activities. We received responses to our survey from 80 ports located across the contiguous U.S., Alaska, and Hawaii, including coastal ports, inland ports, and Great Lakes ports.² (For more information on our survey, see app. II)

We also interviewed officials at 29 non-federal entities, including 15 ports, 13 associations representing ports either nationally or in particular regions, engineers, or the commercial fishing, freight, or cruise industries, and an economist from an economic and transportation consulting firm who has conducted economic impact studies of the port industry. We selected our non-generalizable sample of ports based on the amount of non-freight activity at the port, geographic location, level of freight traffic, and whether the port has applied for U.S. Department of Transportation (DOT) funding. We selected ports that vary in terms of level of non-freight activity (i.e., ports heavily involved in non-freight activity; ports with a mix of freight and non-freight, and ports without non-freight activity); freight traffic, geographic location (i.e., coastal, inland, and Great Lakes ports);

¹H. R. Rep. No. 116-452 at 88-89 (2020).

²In this report, we refer to "a few" survey respondents if two to three of the 80 survey respondents expressed this view, "some" if four to six of the 80 survey respondents expressed the view, and "many" if from seven or more of the 80 survey respondents expressed the view.

and whether a port has applied for DOT funding.³ The views presented in our report provide perspectives of a range of ports but are not generalizable to all ports. Industry associations were selected based on geographic location, their membership, recommendations from other interviewees, and previous GAO work.

In this report, out of 29 non-federal entities, we refer to “a few” stakeholders if representatives from two to three expressed this view, “some” if representatives from four to six expressed the view, and “many” if representatives from seven or more expressed the view. We also interviewed officials within DOT and the Department of Commerce (Commerce), the Department of Defense (DOD), and the Department of Homeland Security (DHS), and the Environmental Protection Agency (EPA).

To describe what is known about the nature of and funding for non-freight activities at ports, we also reviewed port documentation for our selected ports including planning documents and economic impact studies. In addition, we also conducted a literature search for peer-reviewed studies, conference papers, working papers, government reports, think tank studies, and trade and industry articles related to non-freight activities at ports over the past 10 years.⁴ We did not identify any comprehensive studies of non-freight activities at ports through this search.

To identify federal discretionary grant programs available to ports and the extent to which they have supported non-freight and freight activities, we reviewed the U.S. Committee on the Marine Transportation System’s Federal Funding Handbook for Marine Transportation System Infrastructure and interviewed the previously mentioned port officials as well as industry and federal stakeholders to identify relevant discretionary grant programs.⁵

³To identify the freight traffic at our selected ports we used U.S. Army Corps of Engineers’ *The U.S. Coastal and Inland Navigation System: 2019 Transportation Facts & Information*.

⁴Keywords used in our search included port, seaport, cruise, recreation, tourist, tourism, parks, commercial, market, real estate, ferry, ferries, marina, and waterfront development among others.

⁵Ports can also receive funding through federal formula grant programs such as DOT’s Congestion Mitigation and Air Quality Improvement Program (CMAQ) and Surface Transportation Block Grant Program. However, formula grant programs are outside of the scope of this report.

We also analyzed DOT, Commerce, and EPA grant award data from fiscal year 2010 through fiscal year 2020 (the most recent available year) for programs identified as relevant to describe the total amount of funding awarded as well as funding awarded to port authorities for port projects generally and for non-freight projects specifically.⁶ We chose this period because it included the entirety of the previous decade as well as the most recent year of data available and allowed us to assess the extent to which these programs have awarded funding to ports. For programs that first awarded funding after 2010, we reviewed grant award data from when the program first awarded funding through 2020.⁷ Because of limitations in the data provided to us for EPA's Brownfields grant program, we were unable to comprehensively assess the amount of funding these programs have provided to port authorities or to non-freight projects, but we were able to determine some funding that this program provided to port authorities.⁸

To assess the reliability of grant award data, we compared the data provided by the agencies to award announcements and other available agency data. We also discussed the data with relevant agency officials. We determined the data were sufficiently reliable to describe the amount of funding that relevant discretionary grant programs have awarded as well as the funding they have awarded to port authorities (except for the limitations described above for EPA's Brownfields program). For DOT data on RAISE, INFRA, PIDP, and the Passenger Ferry Grant Program we determined that the data were sufficiently reliable to describe the amount of funding that has gone to non-freight projects. Similarly, for

⁶To be included in our funding total, a port authority must be the recipient of a grant. Projects where a port authority partnered with the recipient were not included in our funding total.

⁷Within DOT we reviewed grant award data for Rebuilding American Infrastructure with Sustainability and Equity (RAISE) program (fiscal year 2010 through 2020); the Passenger Ferry Grant Program (fiscal year 2013 through 2020); Infrastructure for Rebuilding America (INFRA) (fiscal year 2016 through 2020); and the Port Infrastructure Development Program (fiscal year 2019 through 2020). Within Commerce, we reviewed grant award data for the Economic Development Administration's grant programs (fiscal year 2010 through 2020). Within EPA, we reviewed grant award data for the Diesel Emissions Reduction Act (DERA) (fiscal year 2010 through 2020) and Brownfields (fiscal year 2010 through 2020) programs.

⁸We were able to identify some grants as having gone to port authorities based on recipient names that indicated that they were a port authority; for example, the Port of New Orleans, Lorain Port Authority, and The Port Authority of Saint Paul. In some cases, where the grant went to a city or state government that administers a port, we could not determine whether these grants were specifically awarded to the port and did not include them in our funding analysis.

Commerce's Economic Development Administration and EPA's DERA grant award data, we determined that the data were sufficiently reliable to describe the amount of funding to non-freight projects. To describe the purpose of the programs and eligible recipients we reviewed relevant documentation, such as authorizing legislation, the most recent Notices of Funding Opportunity, and agency outreach materials, and talked to relevant agency officials.

We conducted this performance audit from November 2020 to December 2021 in accordance with generally accepted government auditing standards. Those standards require that we plan and perform the audit to obtain sufficient, appropriate evidence to provide a reasonable basis for our findings and conclusions based on our audit objectives. We believe that the evidence obtained provides a reasonable basis for our findings and conclusions based on our audit objectives.

Appendix II: GAO Survey of Non-Freight Activities at U.S. Public Ports

To identify ports of interest for our work and to enhance our understanding of the nature and extent of non-freight activities at U.S. public ports, GAO conducted a survey of ports for this report. We did so through a questionnaire, created by GAO and distributed, at GAO request, by two national port associations, representing coastal and inland river ports, and seven regional port associations, covering most areas of the country. Working with GAO, the port associations distributed to members a link to a GAO-operated website, where individual ports could complete a survey form with questions about their ports, their non-freight activities, and knowledge of non-freight activities at other ports. We drafted our survey after research to identify relevant issue areas and potential questions. In preparing the survey, we conducted two pre-tests of our survey instrument, to ensure questions were understandable, answer choices were appropriate, and the survey was not burdensome. We pre-tested our survey by telephone with an east coast ocean port and an inland port along a major U.S. river, and revised the survey instrument as appropriate based on those pre-tests. Following distribution of the survey, we regularly followed-up with the port associations assisting us, to encourage responses from their members.

Our survey was not intended to produce results generalizable to the entire population of ports. The survey was intended, however, to capture a range of port experiences, including level of freight traffic; port type (for example, coastal vs. inland); geographic region of the country; and extent of non-freight activities (generally a mix of freight and non-freight activities, but ranging from having no non-freight activities to having only non-freight activities).

We received 80 responses to our survey from ports located across the contiguous U.S., Alaska, and Hawaii, including coastal ports, inland ports, and Great Lakes ports. Selected results follow. Not all respondents answered each question. In some cases, based on survey design and responses provided, some questions were not applicable to certain respondents. Applicants may also have chosen not to answer some questions.

In figure 1 of the main text of this report, we provided a summary of ports' non-freight activities, noting that the results did not appear in rank order. Table 3 of this appendix provides that rank ordering, based on the number of ports citing the indicated non-freight activity.

Table 3: Non-Freight Activities Cited in GAO Ports Survey, in Rank Order

Rank	Number of Ports Citing	Non-Freight Activity
1	54	Commercial development
2	50	Environmental improvement or remediation
3	49	Recreational (e.g., trails, waterfront access)
4	45	Boating/marina facilities
5	36	Mixed-use development
6	34	Cruise ship facilities
7	33	Educational (e.g., career services, job retraining, campuses of local schools/universities)
8	31	Fishing or fish processing
9	30	Cultural/historical (e.g., museum, art)
10	24	Hotel/motel
11	23	Public marketplace
12	20	Other
13	19	Passenger ferry service
14	13	Residential development
15	2	Arena/stadium

Source: GAO survey of U.S. public ports. | GAO-22-104630

Note: For this table, respondents were asked whether their port has pursued any of the indicated non-freight activities, and could select as many activities as applicable.

We found some differences in ports' most-frequently-cited non-freight activities, based on port type or level of involvement in non-freight activities.

- **Port type.** Commercial development was the most frequently cited non-freight activity for coastal/deepwater and river/inland ports, while Great Lakes ports most frequently cited environmental improvement/remediation.
- **Level of involvement in non-freight activities.** For the ports most involved in non-freight activities—that is, those reporting a majority of their revenues as non-freight-related—respondents' most frequently cited activities were commercial development, environmental improvement/remediation, and recreational development. As one west

coast port summarized to us, non-freight activities are vital to many ports' survival, but they are arguably much more important to smaller ports that do not operate a large freight/cargo base.

Tables 4 through 11 provide tallied responses to the survey's individual questions.

Table 4: Which of the following best describes your port?

Response	Number of Responses
Coastal/deepwater	35
River/inland	32
Great Lakes	10
Other	2
No answer	1

Source: GAO survey of U.S. public ports. | GAO-22-104630

Table 5: Does your port have freight activities (e.g., move liquid, dry bulk, or containerized cargo)?

Response	Number of Responses
Yes	64
No	15
Unsure	1

Source: GAO survey of U.S. public ports. | GAO-22-104630

Table 6: During the past 10 years, has your port pursued or engaged in any non-freight activities?

Response	Number of Responses
Yes	67
No	11
Unsure	2

Source: GAO survey of U.S. public ports. | GAO-22-104630

Table 7: What is the estimated percentage of your port's revenues derived from non-freight sources?

Response	Number of Responses
0 to 25 percent	26
26 to 50 percent	5
51 to 75 percent	13
More than 75 percent	21
Unsure	2

**Appendix II: GAO Survey of Non-Freight
Activities at U.S. Public Ports**

Response	Number of Responses
No answer	13

Source: GAO survey of U.S. public ports. | GAO-22-104630

Table 8: Based on your experience, which of the following do you think would have a larger overall economic impact on the local community; that is, better economic “bang for the buck”?

Response	Number of Responses
Development of freight activities	18
Development of non-freight activities	18
Development of freight and non-freight activities equally	30
None of the above	1
Unsure	0
No answer	13

Source: GAO survey of U.S. public ports. | GAO-22-104630

Table 9: During the last 10 years, has your port applied for federal funding (such as a grant or loan) or other federal assistance (such as technical assistance) for either freight-related or non-freight-related activities?

Response	Number of Responses
Yes	68
No	7
Unsure	3
No answer	2

Source: GAO survey of U.S. public ports. | GAO-22-104630

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Table 10: Has your port applied for federal funding or other federal assistance offered by any of the following federal agencies during the last 10 years?

Agency	Yes	No	Unsure	No Answer
U.S. Department of Commerce (which includes the National Oceanic and Atmospheric Administration and the Economic Development Administration)	31	27	6	16
U.S. Department of Homeland Security (which includes the Federal Emergency Management Agency)	47	15	4	14
U.S. Environmental Protection Agency	20	32	8	20
U.S. Department of Transportation (which includes the Maritime Administration)	51	10	5	14
Other	13	18	14	35

Source: GAO survey of U.S. public ports. | GAO-22-104630

Table 11: Thinking about all sources and opportunities for funding, how compelling is the need for additional federal funding specifically for non-freight activities at U.S. public ports?

Response	Number of Responses
Extremely compelling	46
Moderately compelling	21
Slightly compelling	7
Not compelling at all	3
Unsure	1
No answer	2

Source: GAO survey of U.S. public ports. | GAO-22-104630

Appendix III: “Other” Types of Non-Freight Activities at U.S. Public Ports

In figure 1 of the main text of this report, we presented an abbreviated list of “Other” types of non-freight activities we identified. Table 12 presents the complete list we compiled.

**Appendix III: “Other” Types of Non-Freight
Activities at U.S. Public Ports**

Table 12: Complete List of “Other” Non-Freight Activities GAO Identified at U.S. Public Ports

Non-Freight Activity Category	Activities
Other	<ul style="list-style-type: none">• Aerospace• Agriculture• Aquaculture• Arena/stadium• Broadband communications• Business/innovation incubator• Campground• Casino• Citizen volunteers to assist with port security• Community meeting place• Disaster response• Dog park• Dry-dock• Festivals• Field trips for local community• Foreign trade zone• General aviation• Golf course• Government facility• Low-cost apartment for law enforcement personnel• Military transport• Movie filming location• Parks• Projects to address climate change/resiliency• Providing financing for local development• Public health (COVID-19 testing/vaccination, protective equipment)• Recreational vehicle park• Sports facility• Tourism• Workforce development/training

Source: GAO survey of U.S. public ports; GAO interviews with ports, regional port associations, and others. | GAO-22-104630

Appendix IV: GAO Contact and Staff Acknowledgments

GAO Contact

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Staff Acknowledgments

In addition to the contact above, Alwynne Wilbur (Assistant Director); Travis Schwartz (Analyst-In-Charge); Geoffrey Hamilton; Amy Higgins; Gina Hoover; Thomas James; Schuyler Janzen; Dan Luo; Heather Macleod; Diane Raynes; A. Maurice Robinson; Amy Rosewarne; Christopher H. Schmitt; Pam Snedden; and John Stambaugh made key contributions to this report.

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