



April 2021

PASSENGERS WITH DISABILITIES

Airport Accessibility Barriers and Practices and DOT's Oversight of Airlines' Disability- Related Training



A Century of Non-Partisan Fact-Based Work

GAO@100 Highlights

Highlights of [GAO-21-354](#), a report to congressional committees

Why GAO Did This Study

Approximately 43 million people in the United States have some type of disability, which may affect mobility, vision, hearing, and cognition. Without accessible airport facilities and accommodations—such as appropriate assistance from the check-in counter to the gate, or effective communication of flight information—air travel for people with disabilities can be extremely challenging.

The FAA Reauthorization Act of 2018 includes provisions for GAO to review leading airport accessibility practices for passengers with disabilities, as well as required training for airline and contract service personnel who assist these passengers within the airport. This report examines, among other objectives: stakeholder-identified barriers that passengers with disabilities face when accessing airport facilities, accessibility practices to assist passengers with disabilities, as well as how DOT has overseen airlines' disability-related training.

GAO reviewed relevant federal laws, regulations, DOT documents, literature, as well as information describing disability training provided by selected airlines and contractors. GAO interviewed a non-generalizable sample of stakeholders, including those at 16 U.S. airports selected based on size and geography, eight large and low-cost domestic airlines selected based on the greatest number of disability-related passenger complaints and enplanements, and six aviation service contractors working for those airlines. GAO also conducted interviews with DOT officials and 10 disability advocacy organizations, among others.

View [GAO-21-354](#). For more information, contact Heather Krause at (202) 512-2834 or krauseh@gao.gov.

April 2021

PASSENGERS WITH DISABILITIES

Airport Accessibility Barriers and Practices and DOT's Oversight of Airlines' Disability-Related Training

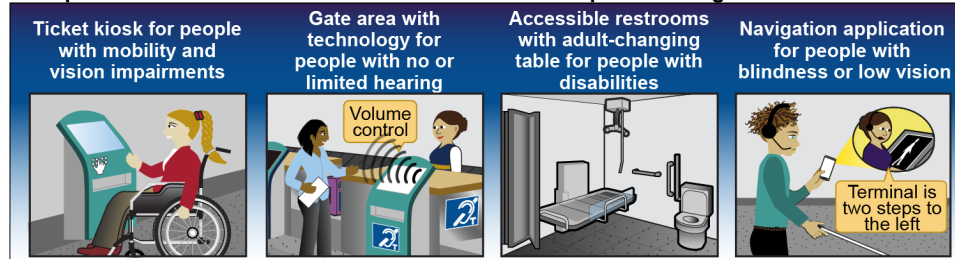
What GAO Found

Passengers with disabilities face infrastructure, information, and customer service barriers at U.S. airports, according to representatives of selected airports, disability advocacy organizations, as well as a review of relevant literature.

- Infrastructure barriers can include complex terminal layouts and long distances between gates and can be difficult for some to navigate.
- Essential travel information is not always available in a format accessible to all. For example, a person with hearing loss could miss crucial gate information that is solely provided over a loudspeaker.
- A passenger might not receive appropriately sensitive service, such as wheelchair assistance, at the airport, although the service provided is required by the Air Carrier Access Act of 1986 (ACAA) regulations.

According to stakeholders, while no solution meets all needs, a number of practices can help reduce or eliminate some of these barriers to equal access at airports. For example, some selected airports use external disability community and passenger groups to proactively engage in identifying barriers and develop solutions. Other airports have implemented technology-based solutions, such as mobile phone applications to make airport navigation easier.

Examples of Stakeholder-Identified Features to Assist Airport Passengers with Disabilities



Source: GAO. | GAO-21-354

The Office of Aviation Consumer Protection within the Department of Transportation (DOT) is responsible for oversight of airlines' compliance with the ACAA. In 2008, DOT updated its entire ACAA regulation, including adding new training requirements for airline personnel, such as requiring training to be recurrent. Following this update, DOT conducted outreach to domestic and foreign airlines on the changes and reviewed airlines' disability training sessions and materials. Agency officials said that in recent years, DOT has conducted reviews of airlines' training only when passengers' complaints indicate a possible problem, as officials' analyses have not shown training generally to be a significant cause of service violations. DOT officials and stakeholders said other factors, such as limited availability of staff to assist passengers with disabilities, at times may affect the service passengers with disabilities receive. DOT is assessing some of these factors through the statutorily mandated ACAA Advisory Committee, formed in late 2019 to make recommendations to improve accessibility to air travel. The committee met in 2020, established three subcommittees, and plans to reconvene by summer 2021.

Contents

Letter		1
	Background	6
	Stakeholders Said Passengers with Disabilities Continue to Face Barriers, and Variation in Airports' Accessibility Adds to Difficulties	15
	Stakeholders Identified Some Approaches to Help Passengers with Disabilities at Airports, but No Solution Meets All Needs	23
	Selected Airlines Said They Design Disability-Related Training to Address Requirements, but Other Factors Also Affect Service	29
	DOT's Disability-Related Training Oversight Has Included Outreach, Reviews of Materials, and Passenger Complaint Analyses	35
	Agency Comments	44
Appendix I	Department of Transportation's Key Disability Training Requirements	45
Appendix II	Selected Characteristics of Disability-Related Training for Public-Facing Airline and Contractor Employees at Airports	47
Appendix III	GAO Contact and Staff Acknowledgments	48
Tables		
	Table 1: The Department of Transportation's (DOT) Oversight Roles and Responsibilities Related to Disability	14
	Table 2: Selected Characteristics of Disability-Related Training for Public-Facing Employees at Airports Described by Selected Airlines and Service Contractors	47
Figures		
	Figure 1: Example of Disability-Related Training Content Tailored for Selected Airline or Contract Personnel Roles at Airports	13
	Figure 2: Disability-Related Complaints Submitted to Airlines and Reported to DOT from 2010 through 2018	20

Figure 3: Selection of Airport Accessibility Features to Help
Passengers with Disabilities Access and Navigate
Airports, as Identified by Stakeholders

27

Abbreviations

ACAA	Air Carrier Access Act
ACAA Advisory Committee	Air Carrier Access Act Advisory Committee
ACRP	Airport Cooperative Research Program
ADA	Americans with Disabilities Act
COVID-19	Coronavirus Disease 2019
CRO	Complaints Resolution Officials
DOT	Department of Transportation
FAA	Federal Aviation Administration
OJT	on-the-job training
OST	Office of the Secretary
TRB	Transportation Research Board
TSA	Transportation Security Administration
WCAG	Web Content Accessibility Guidelines

This is a work of the U.S. government and is not subject to copyright protection in the United States. The published product may be reproduced and distributed in its entirety without further permission from GAO. However, because this work may contain copyrighted images or other material, permission from the copyright holder may be necessary if you wish to reproduce this material separately.

April 14, 2021

The Honorable Maria Cantwell
Chair
The Honorable Roger Wicker
Ranking Member
Committee on Commerce, Science, and Transportation
United States Senate

The Honorable Peter A. DeFazio
Chairman
The Honorable Sam Graves
Ranking Member
Committee on Transportation and Infrastructure
House of Representatives

Prior to the Coronavirus Disease 2019 (COVID-19) pandemic, passenger traffic at U.S. airports had grown steadily since 2009, causing airports to become more crowded and noisy. In addition, terminal expansions and renovations have increased the size and complexity of many of the nation's largest airports. These conditions can make travel stressful for all passengers, but even more so for those with disabilities and older travelers. The Census Bureau estimates that over 42.6 million people in the United States (or 13 percent) have some type of disability, which may affect mobility, vision, hearing, or cognition, among other things.¹ Also, according to the U.S. Census Bureau, older adults are more likely to have a disability, and their numbers have grown rapidly and continue to rise, both absolutely and as a share of the U.S. population. Furthermore, as air travel has become more affordable, older adults and people with disabilities are travelling in greater numbers. However, without accommodations—such as appropriate assistance from the check-in counter to the gate, or effective communication of flight information through technologies or other means—air travel for people with disabilities can be extremely challenging.

In general, airports and airlines are required to provide accessible facilities and reasonable accommodations through federal statutes such

¹Based on 2018 American Community Survey (data.census.gov) disability data.

as the Americans with Disabilities Act (ADA) of 1990, as amended,² the Air Carrier Access Act (ACAA) of 1986, as amended,³ and their related regulations. The ACAA regulations also require airlines to provide some disability-related training for employees and contractors who deal with the traveling public such as reservation agents, gate agents, and wheelchair agents, though some disability groups have questioned whether the training airlines provide could be improved given that service problems persist. At the federal level, the Department of Transportation (DOT) oversees airlines' and airports' compliance with these statutes and regulations through the Federal Aviation Administration's (FAA) Office of Civil Rights and the Office of the Secretary's (OST) Office of Aviation Consumer Protection.

The FAA Reauthorization Act of 2018 includes provisions for us to examine best practices in airport accessibility and airlines' training programs related to properly assisting passengers with disabilities within the airport environment.⁴ This report examines: (1) stakeholder-identified barriers that passengers with disabilities face when accessing airport facilities, information, and services; (2) stakeholder-identified airport accessibility approaches that help improve passengers with disabilities' access to and navigation of airports; (3) selected airlines' approaches to disability-related training requirements and other factors that may affect the provision of services to passengers with disabilities in airports; and (4) how DOT has overseen airlines' disability-related training.

The scope of this report focuses on the airport travel experience for passengers with disabilities. The ACAA's implementing regulations define an individual with a disability as any individual who has a physical or mental impairment that, on a permanent or temporary basis, substantially limits one or more major life activities, has a record of such an impairment, or is regarded as having such an impairment.⁵ For our purposes, airport travel includes passengers' experiences at the departure airport from the point they arrive at that airport, move through the airport terminal—including their use of facilities such as restrooms

²Pub. L. No. 101-336, 104 Stat. 327 (codified as amended at 42 U.S.C. §§ 12101-12213).

³Pub. L. No. 99-435, 100 Stat. 1080 (codified as amended at 49 U.S.C. § 41705).

⁴Pub. L. No. 115-254, § 431, 132 Stat. 3186, 3342. In statute and regulation, airlines are generally referred to as "air carriers"; we refer to them as "airlines" for the purpose of this report.

⁵14 C.F.R. § 382.3.

and concessions—and reach the aircraft gate and begin the boarding process. It does not include passengers’ experiences onboard the aircraft. Also in our scope of passengers’ airport travel experience is their travel from the destination airport’s arrival gate to baggage claim and ultimately to ground transportation. Excluded from our scope is the security-screening process conducted by the Transportation Security Administration (TSA), accessibility services onboard the aircraft, or handling and stowage of wheelchairs and other assistive devices. Previous GAO reports have explored some of those topics in more detail.⁶

To determine stakeholders’ views on barriers passengers with disabilities may face when accessing airport facilities, services, and information as well as accessibility practices airports are using to improve access and navigation, we interviewed officials from the FAA’s Office of Civil Rights and OST’s Office of Aviation Consumer Protection, 16 U.S. airports, and four aviation industry associations.⁷ We also interviewed representatives from 10 organizations advocating for people with various types of disabilities, including those affecting mobility, vision, hearing, and cognitive function.⁸ We selected a non-generalizable sample of 16 U.S. airports to identify practices to assist passengers with disabilities access and navigate airport facilities, information, and services. Our selection was designed to obtain a mix of small, medium, and large hub airport perspectives, as well as geographic representation, and considered recommendations from the disability advocacy organizations. The organizations were selected to represent a diverse range of disabilities,

⁶See, for example, GAO, *Aviation Security: Basic Training Program for Transportation Security Officers Would Benefit from Performance Goals and Measures*, [GAO-18-552](#) (Washington, D.C.: July 26, 2018); and GAO, *Aviation Consumer Protection: Few U.S. Aircraft Have Lavatories Designed to Accommodate Passengers with Reduced Mobility*, [GAO-20-258](#) (Washington, D.C.: Jan. 7, 2020).

⁷Selected airports included: Dallas Fort Worth (DFW), Dallas Love Field (DAL), Fort Lauderdale-Hollywood (FLL), Hartsfield-Jackson Atlanta (ATL), John F. Kennedy (JFK), Kansas City (MCI), LaGuardia (LGA), Memphis (MEM), Minneapolis-St. Paul (MSP), Newark Liberty (EWR), Norman Y. Mineta San José (SJC), Oakland (OAK), Phoenix Sky Harbor (PHX), San Francisco (SFO), Seattle-Tacoma (SEA), and Spokane (GEG). Aviation industry associations included: American Association of Airport Executives, Airports Council International- North America, Airlines for America, and the Regional Airline Association.

⁸Disability advocacy organizations included: AARP, the American Council of the Blind, Arc of King County, National Council on Disability, National Association of the Deaf, National Disability Rights Network, National Federation of the Blind, Open Doors Organization, Paralyzed Veterans of America, and the U.S. Access Board.

and based on involvement in advocacy and outreach activities such as testifying to Congress or publishing articles on subjects relevant to airport accessibility.

To obtain additional context on these issues, we reviewed FAA documents and relevant literature. For example, we reviewed a sample of eight FAA compliance reviews provided by FAA's Office of Civil Rights and selected airports from the 33 reviews FAA told us they completed from fiscal year 2016 through 2019 to identify any accessibility barriers and leading practices. We also reviewed literature such as reports from the National Academies of Sciences' Airport Cooperative Research Program (ACRP), in addition to reports that we obtained from a comprehensive literature search including scholarly and legal articles, government reports, and association or nonprofit reports that were published in the United States within the previous 5 years.⁹ We also interviewed officials from TSA about their perspectives on the airport experience for passengers with disabilities, but we did not ultimately discuss specific TSA initiatives in this report.

Also, to obtain additional perspectives on barriers passengers with disabilities may face, we analyzed two sets of the most recently available airline passenger complaint data related to disability:

- complaints submitted by passengers directly to the Office of Aviation Consumer Protection from 2009 through 2019, and
- complaints submitted directly to U.S. and foreign airlines, and reported by the airlines to DOT from 2009 through 2018 as required by regulation.¹⁰

To assess the reliability of DOT's data, we reviewed DOT documentation related to the data and agency officials' written responses to our questions about the reliability of the data. We also manually tested the

⁹The team searched ProQuest, EBSCO, Dialog, Scopus, Transportation Research Board (TRB), and Westlaw databases.

¹⁰Airlines are to annually submit to DOT a report summarizing the disability-related complaints received during the prior calendar year. 14 C.F.R. § 382.157(d). In general, passengers can submit written disability-related complaints directly to airlines, and airlines must respond to each such complaint. Additionally or alternatively, passengers can submit formal or informal disability-related complaints directly to DOT and DOT must investigate each complaint alleging discrimination against an individual with a qualified disability. 49 U.S.C. § 41705(c). Passengers may submit complaints to DOT via the agency website, by mail, or through a telephone hotline.

data for outliers or obvious errors, and reviewed recent data reliability documentation from prior GAO work using data from the same source. We determined that the data were sufficiently reliable for the purpose of providing background and context on barriers that passengers with disabilities may face at airports.

To address selected airlines' approaches to disability-related training requirements and other factors that may affect service, we reviewed relevant federal statutes, regulations, and guidance related to airlines' training for public-facing personnel who provide customer service and deal with the traveling public.¹¹ The scope of this work did not include airline training related to non-customer-facing personnel. We also reviewed information describing disability-related training provided to us by selected airlines and selected companies that contract with airlines to provide wheelchair assistance and other passenger services—which we refer to as aviation service contractors—to identify similarities and differences in how these entities sought to address training requirements.¹² We requested airlines and contractors provide us with training materials; nearly all airlines and one contractor submitted either excerpts or high-level summaries. We interviewed or obtained written responses from representatives¹³ from eight domestic airlines, including four network and four low-cost airlines: we selected airlines based on those that received the largest number of complaints and were among those that boarded the most passengers in 2018.¹⁴ We also interviewed representatives from six aviation service contractors, selected to include a mix of small and large-sized companies, and to ensure representation of the interests of employees of airlines we interviewed, we interviewed a

¹¹We did not review airport-provided disability-related training issues. While some airport authorities are subject to certain ADA (e.g., 49 C.F.R. § 37.173) or Section 504 (e.g. 49 C.F.R. § 27.72(g)) provisions requiring certain airport personnel to receive specific types of disability-related training, airport authorities are not subject to the same type of broadly scoped disability-related training provisions for their personnel as are required of airlines under ACAA regulations (14 C.F.R. § 382.141). These ACAA disability training regulations are set out in more detail in appendix I.

¹²We did not review airline employee and contractor training records to verify that staff were in compliance with the required training schedules.

¹³We requested interviews with eight airlines, six airlines granted our request for interviews and two airlines provided written responses instead of an interview.

¹⁴Network airlines support large, complex hub-and-spoke operations, which provide service at various fare levels to many destinations. Low cost airlines generally operate less costly point-to-point service using fewer types of aircraft. The following eight airlines were selected: Alaska, Allegiant, American, Delta, JetBlue, Southwest, Spirit, and United.

labor union representing employees of aviation service contractors and three service employees.¹⁵

To determine how the Office of Aviation Consumer Protection within DOT has overseen airline disability-related training we interviewed DOT officials and reviewed DOT documents, such as guidance on relevant federal statutes and regulations, and disability-related consent orders that DOT issued from 2008 through 2019 to address complaints alleging airlines' violations of requirements to assist passengers. We also reviewed materials related to DOT's Air Carrier Access Act Advisory Committee, which is addressing issues related to the air travel needs of passengers with disabilities, and our prior work on aviation consumer issues.¹⁶

We conducted this performance audit from October 2019 to April 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.

Background

Passengers with different types of disabilities may encounter different obstacles when accessing services and navigating through an airport. For example, passengers with blindness and low vision may have difficulty using the information systems—known as wayfinding—that guide people through the airport, those with mobility impairments may have difficulty

¹⁵We met with service contractor representatives from Prospect Airport Services, Superior Aircraft Services, PrimeFlight Aviation Services, G2 Secure Staff, ABM Aviation Solutions, and Eulen America. The representatives told us they each provided passenger support services at between 5 and 85 U.S. airports. Industry-wide, these service contractors generally provide a range of airport-based services for airlines beyond passenger support services, including janitorial, baggage handling, and security services. To identify service employees to interview, we consulted with representatives from the Service Employees International Union, a labor union that represents these workers. The service employees we interviewed worked for three of the contractor companies we selected.

¹⁶See, for example, GAO, *Passengers with Disabilities: Air Carriers' Disability-Training Programs and the Department of Transportation's Oversight* [GAO-17-541R](#) (Washington, D.C.: May 31, 2017); GAO, *Airline Consumer Protections: Additional Actions Could Enhance DOT's Compliance and Education Efforts*, [GAO-19-76](#) (Washington D.C.: Nov. 20, 2018); and GAO, *Aviation Consumer Protection: Increased Transparency Could Help Build Confidence in DOT's Enforcement Approach*, [GAO-21-109](#) (Washington, D.C.: Oct. 13, 2020).

walking long distances, and those with cognitive disabilities may have difficulty navigating through unfamiliar airport facilities that may be complex and overwhelming.¹⁷ In addition, different passengers with the same disability may also have different needs or types of preferred assistance. For example, some passengers with mobility impairments might use their own wheelchair in an airport, others might ride an electric cart generally used to transport groups of travelers together, while others might request a wheelchair at the airport as well as wheelchair assistance. Passengers may also have multiple disabilities. According to ACRP research, it is typically older adults who develop multiple disabilities, which can be a natural result of aging.¹⁸

The responsibility of ensuring access through different points in a public use airport depend on the agreements in place between the airport owner or operator and tenants or leaseholders; agreements can vary. Public use airports in the U.S. are generally owned by a variety of public entities including states, municipalities, or other authorities. Airlines are tenants and leaseholders at airports paying for the use of gates, ticket counters and other facilities at these airports, but may also own or manage certain assets such as terminals.

Federal Accessibility Framework at U.S. Airports

Various federal statutory and regulatory requirements are designed to help ensure that U.S. airports are accessible. The purpose of these requirements can be grouped into the following two categories:

- **Prohibitions against discrimination.** Since 1977, most U.S. airports have been subject to the implementing regulations of Section 504 of the Rehabilitation Act of 1973¹⁹ (Section 504), which prohibits discrimination against any qualified individual solely on the basis of

¹⁷Wayfinding refers to navigating from point to point and to information systems that help guide people through a physical environment and enhance their understanding and experience of the space. See ACRP Research Report 177, *Enhancing Airport Wayfinding for Aging Travelers and Persons with Disabilities* (Washington, D.C.: 2017).

¹⁸ACRP Research Report 177, *Enhancing Airport Wayfinding for Aging Travelers and Persons with Disabilities* (Washington, D.C.: 2017).

¹⁹Pub. L. No. 93-112, § 504, 87 Stat. 355, 394 (codified as amended at 29 U.S.C. § 794).

the individual's disability by recipients of federal financial assistance.²⁰ In addition, Section 504, as amended, incorporates certain requirements of the ADA, as amended, such as the prohibition on discrimination against people²¹ with disabilities²² by public entities.²³ In the case of air travel, Title II of the ADA and its implementing regulations are applicable to public entities, including state and local authorities that operate airports, but not airlines. Instead, the ACAA, as amended, prohibits airlines from discriminating when providing air transportation on the basis of disability. The ACAA implementing regulations cover airport terminal facilities owned, leased, or controlled by airlines at U.S. airports.²⁴

- **Accessibility design standards.** Two separate acts and their respective implementing provisions lay out building accessibility standards and requirements: (1) the act commonly known as the Architectural Barriers Act of 1968²⁵, as amended, and (2) Section 504 of the Rehabilitation Act. Specifically, the Architectural Barriers Act is applicable to buildings and facilities, such as U.S. airports, that are

²⁰In general, the Rehabilitation Act of 1973, as amended, defines "individual with a disability" to mean any individual who (1) has a physical or mental impairment which for such individual constitutes or results in a substantial impediment to employment, and (2) can benefit in terms of employment outcome from certain specified vocational rehabilitation services. 29 U.S.C. § 705(20) as adopted by § 794.

²¹More specifically, the ADA prohibits such discrimination against a qualified individual with a disability and defines the phrase "qualified individual with a disability" to mean an individual with a disability who, with or without reasonable modifications to rules, policies, or practices, the removal of architectural, communication, or transportation barriers, or the provision of auxiliary aids and services, meets the essential eligibility requirements for the receipt of services or the participation in programs or activities provided by a public entity. 42 U.S.C. § 12111(8).

²²In general, the ADA defines the term "disability" to include a physical or mental impairment that substantially limits one or more major life activities of such individual, or a record of such impairment, or being regarded as having such an impairment. 42 U.S.C. § 12102(1).

²³Under the ADA, the term "public entity" is defined to include (1) any State or local government, and (2) any department, agency, special purpose district, or other instrumentality of a State or States or local government. 42 U.S.C. § 12131(1).

²⁴The ACAA prohibits discrimination on the basis of disability in air travel, whereas the ADA, among other things, prohibits discrimination and ensures equal opportunity and access for persons with disabilities in public accommodations, commercial facilities and transportation by bus, rail, or any other conveyance, other than by aircraft.

²⁵Pub. L. No. 90-480, 82 Stat. 718 (1968) (codified as amended at 42 U.S.C. §§ 4151-4156).

recipients of federal financial assistance and requires such buildings and facilities to meet minimum design standards to ensure access to the built environment for people with physical disabilities. Also, provisions in Section 504 of the Rehabilitation Act incorporate certain ADA requirements, such as DOT's ADA regulations regarding transportation services for individuals with disabilities. Thus, to comply with Section 504 of the Rehabilitation Act, airport operators receiving federal financial assistance must comply with certain applicable ADA regulations requiring them to ensure that terminal facilities and terminal services are readily accessible to and usable by individuals with disabilities, including individuals using wheelchairs.²⁶ In addition, the ADA's implementing regulations, including the ADA Standards for Accessible Design most recently updated in 2010, require that new airports and expansions of and renovations to existing airports that are recipients of federal financial assistance meet minimum accessibility standards.²⁷ For example, minimum accessibility standards include ensuring at least one accessible passenger-loading zone is provided in each public curbside loading area at the airport terminal.

Accessibility Framework for Airlines

Airlines are also subject to certain federal statutory and regulatory requirements that are designed to help ensure that passengers with disabilities are not discriminated against and receive necessary accommodations for safe travel, both within the airport as well as on the aircraft. Specifically, the ACAA, as amended, prohibits domestic airlines regardless of where their operations take place and foreign airlines for flights to or from the United States from discriminating against people with

²⁶See 29 U.S.C. § 794(d). See also DOT Rehabilitation Act regulations at 49 C.F.R. § 27.71(b). In general, 49 C.F.R. § 27.71 focuses on airport facilities and applies to all terminal facilities and services owned, leased, or operated on any basis by a recipient of DOT financial assistance at a commercial service airport, including parking and ground transportation facilities, and provides that airport operators will be deemed to be in compliance with Rehabilitation Act Section 504 obligations if they meet specified ADA standards.

²⁷The applicable ADA accessibility standards can depend on, for example, the date of construction or alteration of the building. See 28 C.F.R. § 35.151(c) for details about the different standards that apply to different construction/alteration dates.

disabilities on the basis of their disability.²⁸ In 1990, DOT promulgated implementing regulations, which have been amended a number of times, including a comprehensive update in 2008.²⁹ Within the airport environment, the ACAA and its implementing regulations cover certain airline-controlled spaces and issues related to the provision of services, such as passenger assistance, service animals, and other accommodations. The ACAA regulations also require disability-related training for personnel and contractors of covered airlines who deal with the traveling public.³⁰

Passenger Assistance

In general, airlines must provide or ensure the provision of assistance to passengers with disabilities at the airport when requested, including wheelchair and other guided assistance. More specifically, assistance must be provided from the airport curb or terminal entrance to the departure gate, between gates to connecting flights, and from the arrival gate to the terminal exit. Airlines are also required to provide or ensure the provision of assistance to passengers in accessing key areas of the terminal, such as ticket counters and baggage claims, as well as making a stop at a restroom if requested and time permits and if the restroom is available on the route to the destination, among other obligations. In addition, airlines must help transport passengers' gate-checked or carry-on luggage if passengers are unable to carry their luggage because of a disability and provide adequate assistance to service-animal relief areas, in cooperation with the airport operator.³¹

²⁸Pub. L. No. 99-435, 100 Stat. 1080 (codified as amended at 49 U.S.C. § 41705). ACAA implementing regulations prohibit discrimination on the basis of disability in air travel, except under limited circumstances, such as safety. For example, airlines are prohibited from excluding any passenger with a disability from any seat or requiring that a passenger with a disability sit in any particular seat, on the basis of disability, except to comply with FAA or applicable foreign government safety requirements. 14 C.F.R. § 382.87(a).

²⁹The ACAA implementing regulations were most recently updated in 2020 with specific changes related to service animals. See *Traveling by Air With Service Animals*; Final Rule, 85 Fed. Reg. 79742 (Dec. 10, 2020).

³⁰Under ACAA's implementing regulations, the disability-related training requirements apply to airlines that operate aircraft with 19 or more passenger seats. The ACAA regulations also require airlines to take specific actions to fulfill the ACAA's broad nondiscrimination requirement, such as conforming to specified aircraft accessibility requirements and onboard stowage of certain specified types of assistive devices. As previously noted, passengers' onboard experiences are outside the scope of this report.

³¹14 C.F.R. § 382.91 (c)-(d).

Personnel providing navigation assistance to passengers with disabilities are generally referred to as “passenger support agents.” While DOT officials stated that the total amount of assistance requested and provided to passengers with disabilities is unknown, DOT has listed a proposed rulemaking that would consider a requirement for airlines to submit this data in the future.³² Three selected airlines reported to us that they each generally received between 2.25- and 3.25-million advance wheelchair requests per year prior to the COVID-19 pandemic—a figure that stakeholders we interviewed said had been steadily rising.

Assistance can be requested by or on behalf of a passenger with a disability either before or upon arrival at the airport. As noted above, upon a passengers’ request, airlines must promptly provide assistance or ensure the provision of prompt assistance, either directly or through contractors.³³ Generally, when there is a request for assistance, a special service request code is added to the passenger’s ticketing record, specifying the type of assistance requested. Special service request codes can be added to a ticket by a ticketing agent (airline or third-party company employee) when a ticket is purchased, by an airline employee prior to arrival at the airport, or by an airline employee or contractor at the airport. Upon arrival to the airport, it is incumbent upon passengers to alert an airline employee that they have arrived in order to receive assistance. At some airports, certain airlines have designated seating areas where passengers can wait to receive their requested service.

According to literature we reviewed, since the early 2000s, airlines have largely outsourced passenger support services to private contractors as a method to control costs amid financial pressures and growing competition.³⁴ All eight selected airlines told us they rely on contract personnel for passenger support services, with some contracting with as many as 36 such contractors. Generally, airlines manage contracts at the

³²DOT listed a planned rulemaking as a long-term action in the Office of Information and Regulatory Affairs’ Fall 2020 Unified Agenda of Regulatory and Deregulatory Actions, as an item for which the agency expects its next regulatory action to take place more than 12 months after the publication of the agenda, that would consider whether to require airlines to report to DOT annually data on the number of requests for disability assistance they receive.

³³14 C.F.R. § 382.91.

³⁴For example, according to analysis of Bureau of Labor Statistics data conducted by the Service Employees International Union, approximately 98 percent of passenger support agents worked for contractors in 2019.

airport level, between the airline and the service provider. Five of the selected service contractors we interviewed held separate contracts with multiple airlines at the same airport. In some cases, airlines might join a consortium to collectively contract with one company, typically for service within the same terminal of an airport.

Airline Training Requirements

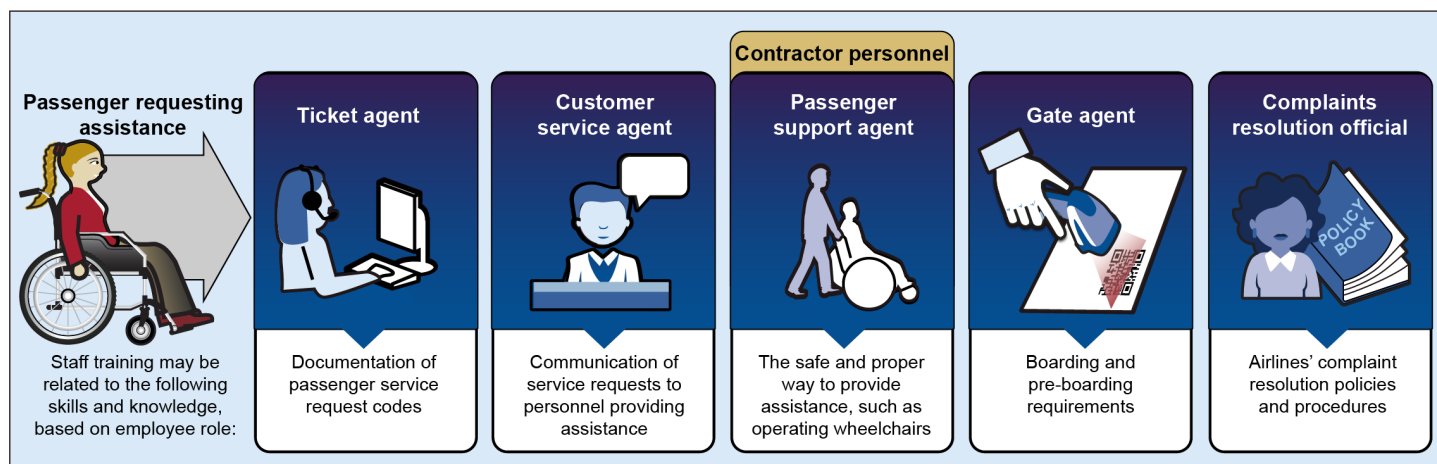
Airlines are required to provide training to public-facing employees (e.g., gate agents). That training is to cover a number of disability-related topics with specified frequency, as appropriate to the duties of each employee (see app. I for list of the ACAA's key regulatory training requirements).³⁵ For example, airlines must train employees on disability awareness and common methods that are readily available for communicating with people who are hearing or vision impaired, and are required to provide specific content and more frequent training to their designated Complaints Resolution Officials.³⁶ Airlines are also required to provide, or ensure that contractors provide, training to contractors' public-facing employees, such as passenger support agents. Thus, airline and contractor personnel may receive different training content tailored for their specific role's responsibilities, as illustrated in figure 1. In 2017, we found that a selection of domestic and foreign airlines generally addressed ACAA regulatory training requirements.³⁷

³⁵14 C.F.R. § 382.141. As we have previously reported, DOT has generally not established training requirements for airlines on consumer protections, except for disability issues.

³⁶U.S. airlines providing service using aircraft with 19 or more passenger seats must make a Complaints Resolution Official (CRO) available at each airport they serve while they are operating at that airport, either in person or via telephone. Foreign airlines operating such aircraft must make such CROs available at each airport serving their flights that begin or end at a U.S. airport. If a customer complains or raises a concern with airline personnel about discrimination, accommodations, or services with respect to passengers with a disability and requests access to a CRO, the CRO is to take certain specified dispositive actions in a prompt manner. See 14 C.F.R. §§ 382.151, 382.153.

³⁷[GAO-17-541R](#).

Figure 1: Example of Disability-Related Training Content Tailored for Selected Airline or Contract Personnel Roles at Airports



Source: GAO analysis of regulations and information from DOT, selected airlines, and contractors. | GAO-21-354

In addition, airlines must ensure that employees and contractors are trained to proficiency, relative to their job duties, concerning three topics: (a) the ACAA's regulatory requirements and other relevant regulations affecting the provision of air travel to passengers with a disability, (b) airline procedures concerning the provision of air travel to passengers with a disability, including the proper and safe operation of equipment to accommodate passengers, and (c) for those involved as part of their role, how to provide boarding and deplaning assistance per airline procedures.

Agency Roles and Responsibilities

Two different offices in DOT oversee airports and airlines on disability-related issues (see table 1). FAA's Office of Civil Rights provides oversight, technical assistance and guidance to airports on issues of discrimination and barriers under ADA and other relevant legislation. Within OST, the Office of Aviation Consumer Protection oversees and enforces laws and regulations designed to protect consumers with regard to airlines, such as the ACAA and its implementing regulations which prohibit discrimination against individuals based on a disability.³⁸ In 2017, we reported that this office used a variety of oversight methods to ensure ACAA compliance by airlines, including ensuring airlines address disability-related training requirements.³⁹

³⁸GAO-21-109.

³⁹GAO-17-541R.

Table 1: The Department of Transportation’s (DOT) Oversight Roles and Responsibilities Related to Disability

Agency and office	Disability-related laws and regulations	Entities overseen and responsibilities
FAA Office of Civil Rights	Americans with Disabilities Act of 1990, as amended (28 C.F.R. Parts 35 and 36 and 49 C.F.R. Parts 27, 37, and 38) Section 504 of the Rehabilitation Act of 1973, as amended	Oversight of: U.S. airports <ul style="list-style-type: none"> Conduct compliance reviews and investigate disability-related complaints against airports. Share best practices and guidance with U.S. airports via training, technical assistance, and the FAA Civil Rights Connect web-based information-sharing system. Develop guidance laying out key accessibility-related roles and legal responsibilities for airports and airlines.
Office of the Secretary’s Office of Aviation Consumer Protection	Air Carrier Access Act of 1986, as amended ACAA Regulations final rule (14 C.F.R. Part 382)	Oversight of: U.S. airlines and foreign airlines providing service to a U.S. airport <ul style="list-style-type: none"> Conduct airline inspections and investigate disability-related complaints against airlines. Promote awareness and understanding of consumer rights through passenger education efforts. Review data on disability-related consumer complaints submitted to airlines for trends. Assess the need for and draft aviation consumer protection and civil right regulations.

Source: GAO analysis of agency documents and interviews. | GAO-21-354

According to DOT officials, relative to other types of air travel service complaints, DOT has more statutory responsibility for disability-related issues. For example, while DOT is required to investigate each complaint it receives against airlines alleging discrimination on the basis of disability in air transportation,⁴⁰ it does not have a similar obligation for other air travel service complaints. The agency is also required to review annual disability complaint data submitted from passengers directly to the airlines, and DOT officials said personnel from the Office of Aviation Consumer Protection review the data and prepare reports to Congress.⁴¹

⁴⁰49 U.S.C. § 41705(c)(1). DOT’s Office of Aviation Consumer Protection publishes data about consumer complaints it receives, including the type of complaint and respondent, monthly in its Air Travel Consumer Report.

⁴¹In general, the Secretary is required to regularly review all complaints received by airlines alleging discrimination on the basis of disability and report annually to Congress on the results of such review. 49 U.S.C. § 41705(c)(3).

Stakeholders Said Passengers with Disabilities Continue to Face Barriers, and Variation in Airports' Accessibility Adds to Difficulties

Passengers with Disabilities Face Infrastructure, Information, and Customer Service Barriers at Airports

Literature we reviewed and stakeholders we interviewed identified a range of barriers that passengers with different disabilities continue to face at U.S. airports, even with statutory and regulatory requirements and improvements in accessibility. Disability advocacy group representatives viewed airports as presenting ongoing—and frequently encountered—accessibility challenges. Also, according to ACRP, all airports have gaps in their accessibility services and facilities, even those that have invested in accommodations that go beyond what is required by federal regulations.⁴² The barriers identified by selected stakeholders—which included representatives from 10 disability advocacy organizations, 16 selected airports, and 6 aviation service contractors—generally fell into three categories: infrastructure, information, and customer service barriers.

Infrastructure

According to representatives from the majority of our selected airports and industry associations, the physical infrastructure at some airports, which includes terminal buildings and related facilities used by passengers, does not provide equal access to people with different types of disabilities. These representatives stated that infrastructure-related barriers to access exist despite airports making investments designed to meet ADA standards. In the national airport system, there are approximately 500 commercial service airports, which all receive scheduled passenger service but vary in ways that may affect

⁴²See, for example, ACRP Research Report 210, *Innovative Solutions to Facilitate Accessibility for Airport Travelers with Disabilities* (Washington, D.C.: 2020); ACRP Research Report 201, *Airport Emergency Communications for People with Disabilities and Others with Access and Functional Needs* (Washington, D.C.: 2019); and ACRP Research Report 177, *Enhancing Airport Wayfinding for Aging Travelers and Persons with Disabilities* (Washington, D.C.: 2017).

accessibility such as size, age, and the state of renovations of their terminal buildings. As we have previously reported, the aviation industry has for many years been investing heavily in large capital projects to expand and renovate airport facilities.⁴³ These investments include, among other things, projects intended to address accessibility barriers. For example, one airport representative said that the airport is building a new terminal building that will incorporate design features to promote accessibility for all passengers, as it is easier to include accessibility projects as part of a broader construction project than to complete these projects individually.⁴⁴

With or without recent renovations, according to disability advocacy organizations we met with, infrastructure-related barriers may be more pronounced at large complex airports, as large airports tend to have longer distances to travel between gates, and airports with complex layouts can require more cognitive effort to navigate. For example, according to a representative from one large hub airport, the size and complexity of the airport has posed difficulties for passengers with neurological disabilities such as dementia. On multiple occasions, passengers with cognitive disabilities who were traveling independently have become lost in the terminal, and airport personnel had to help concerned family members locate them, according to the representative. A representative of an aviation service contractor also remarked on the challenge presented by the size of this airport, stating that one of the airlines operates connecting flights out of two terminals that are 2.5-miles apart, and limited elevator capacity creates bottlenecks that negatively affect passengers with mobility disabilities. Furthermore, some airports were built before current accessibility regulations were promulgated, so accessibility improvements are generally made as part of a renovation. For example, representatives from three selected airports noted that older terminals might have steep ramps or narrow spaces that could pose barriers to people who use wheelchairs or have other mobility-related disabilities.

⁴³GAO, *Airport Infrastructure: Information on Funding and Financing for Planned Projects* [GAO-20-298](#) (Washington, D.C.: Feb. 13, 2020).

⁴⁴Due to reduced revenue resulting from steep declines in passenger traffic during the COVID-19 pandemic, some airports may ultimately reconsider the timing or feasibility of previously planned construction and renovation projects. Similarly, the extent to which social distancing requirements at airports may ultimately lead to changes in airport terminals is uncertain at this time.

Information

Representatives of a few disability advocacy organizations (four) and airports (two) told us that information essential to traveling through an airport is not always available in a manner accessible to all passengers including those who are deaf, blind, or have cognitive or mobility disabilities. Key information can include flight and boarding status, emergency response instructions, and how to navigate from point to point in the airport (i.e., wayfinding). While airlines are required to provide accessible information to passengers who are blind or deaf,⁴⁵ representatives of one advocacy organization we met with noted that some methods for providing information can pose a barrier. For example, representatives from two disability advocacy organizations told us that a person with hearing loss may miss crucial information provided over a loudspeaker, and according to ACRP, a person with cognitive disabilities or low vision may find it difficult to decipher signage that is cluttered, unintuitive, or includes lettering with low contrast.⁴⁶ Passengers who use wheelchairs may also find overhead signage difficult to see or read, depending on the installation height and lighting conditions, according to a representative of one airport. Also, important information, such as flight status and gate changes, are communicated to passengers on screens throughout airport terminals and at gates. According to a disability advocacy organization's representative, providing only visual information can make it difficult for passengers who are blind or have low vision to become aware of boarding times or gate changes, for example. Passengers in this situation may need to depend upon other others to help them, a situation that can be frustrating, or they may miss their flight.

Customer Service

Many disability advocacy organizations (seven) and airports (nine) cited barriers that stem from the failure to provide adequate or sensitively delivered customer service in airports. While passengers with disabilities often rely on assistance from airline employees or airline contractor personnel during their airport journey—such as the wheelchair assistance discussed later in this report—some noted these personnel might be difficult to locate, unavailable where needed, or might not provide assistance with the appropriate level of sensitivity. For example, according to representatives from an organization representing people

⁴⁵Airlines are required to ensure that passengers with a disability who identify themselves as persons needing visual or hearing assistance have prompt access to the same information provided to passengers at each gate, ticketing area, and customer service desk that the airline owns, leases, or controls, to the extent it does not interfere with the employees' safety and security duties. 14 C.F.R. § 382.53(a).

⁴⁶See ACRP Research Report 52, *Wayfinding and Signing Guidelines for Airport Terminals and Landside* (Washington, D.C.: 2011).

who are deaf and hard of hearing, if a ticket agent lacks flexibility in the way they communicate, a person who is deaf may encounter difficulty getting the service they require. Representatives from that organization described a challenging situation that led to a complaint in which a passenger requested to communicate by writing on a pad of paper, but the gate agent would only speak more loudly, and the interaction escalated. Examples such as these underscore the importance of training customer-facing airline employees to recognize and respond to requests for communication accommodations.

In addition, the Centers for Disease Control and Prevention order requiring people to wear masks while traveling on an airplane or in an airport in response to the COVID-19 pandemic highlights the importance of providing customer service with sensitivity.⁴⁷ For instance, one disability advocacy organization's representative told us that passengers with hearing loss may have greater difficulty understanding an agent who is speaking while wearing a mask, either because the sound is muffled or they need to see facial expressions and lips moving in order to understand the words being spoken. According to this representative, wearing clear masks can help facilitate communication. DOT has also issued guidance advising airport and airline personnel to consider using clear face masks to communicate with people who are deaf or hearing impaired, and to consider writing on a pad of paper that can be shown without contact.⁴⁸

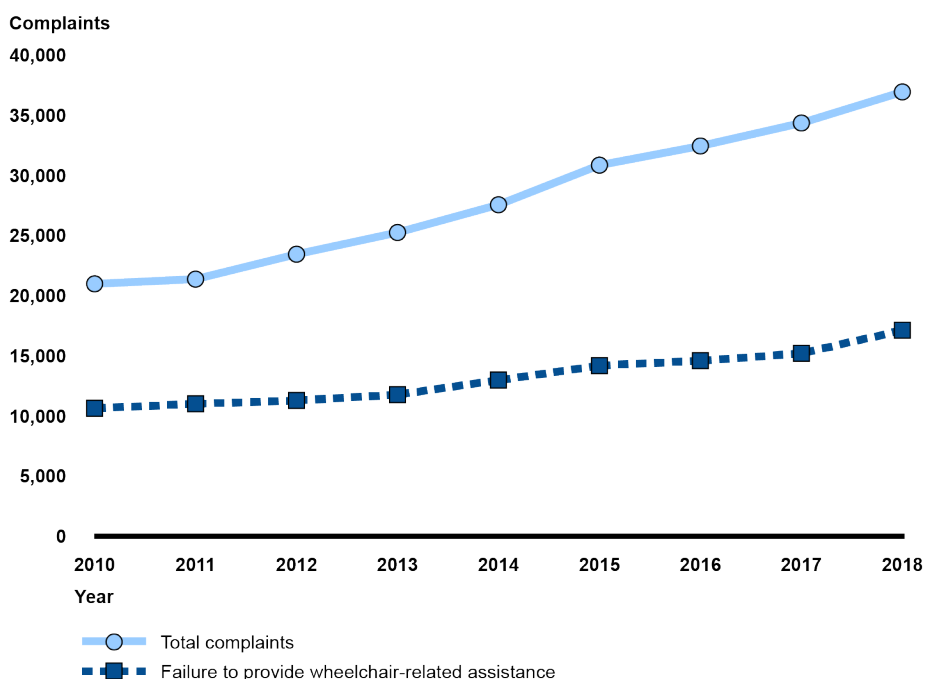
⁴⁷Centers for Disease Control Order: *Requirement for Persons to Wear Masks While on Conveyances and at Transportation Hubs*, 86 Fed. Reg. 8025 (Jan. 29, 2021). Effective February 1, 2021, in general, the order requires a person to wear a mask over the mouth and nose when traveling on any conveyance (e.g., airplanes, trains, subways, buses, taxis, ride-shares, ferries, ships, trolleys, and cable cars) into or within the United States, or departing from the United States until the conveyance reaches its foreign destination. The order also requires a person to wear a mask while at any transportation hub within the United States (e.g., airport, bus terminal, marina, train station, seaport, or other port, subway station, or any other area that provides transportation within the United States). In addition, the Centers for Disease Control and Prevention has provided that clear masks or cloth masks with a clear plastic panel may be used to facilitate communication with people who are hearing impaired or others who need to see a speaker's mouth to understand speech. For the same purposes, TSA recently issued guidance allowing for such use of clear masks or cloth masks with a clear plastic panel to be used by TSA employees and contractors.

⁴⁸*Runway to Recovery: The United States Framework for Airlines and Airports to Mitigate the Public Health Risks of Coronavirus*, Guidance Jointly Issued by the U.S. Departments of Transportation, Homeland Security, and Health and Human Services, Version 1.1, December 2020.

DOT's passenger complaint data confirm stakeholders' stated views that many passengers face barriers, such as when seeking or receiving wheelchair service or other guided assistance. According to stakeholders, if service is not provided in a timely or professional manner, or is unavailable, it can at a minimum inconvenience the passengers or even cause them to miss flights. As shown in figure 2, approximately half of all disability-related complaints to airlines from 2010 through 2018 were categorized as a failure to provide assistance related to wheelchairs, making it the category with the largest number of complaints received over those years.⁴⁹ Complaints in this category cover a wide range of assistance-related issues, according to DOT. For example, complaints could include not receiving the requested assistance, or reports that the wheelchair attendant refused to make a stop at the lavatory, food concessions, or a service animal relief area. From 2010 through 2018, total complaints and failure to provide assistance related to wheelchairs complaints both increased, with total complaints increasing at a slightly faster rate. According to DOT officials, the increase in complaints may not necessarily mean that service is getting worse, as it could also indicate that passengers are more aware of how to file a complaint with airlines and DOT.

⁴⁹After failure to provide assistance related to wheelchairs, the other primary categories of complaints submitted to airlines included: seating accommodations, service animal problems, and storage and delay of assistive devices.

Figure 2: Disability-Related Complaints Submitted to Airlines and Reported to DOT from 2010 through 2018



Source: GAO analysis of Department of Transportation (DOT) data. | GAO-21-354

Variations in Accessibility across Airports Make It Difficult for Passengers to Plan Travel and Contribute to Unpredictable Travel Experiences

According to representatives of one disability advocacy organization, the lack of predictability in the travel experience, and the range of needs that passengers with different disabilities have make it difficult for passengers to plan their travel to ensure as seamless a journey as possible. Airport representatives we met with described unique circumstances and characteristics of their airports, including characteristics related to their physical features such as size and age, or differences within airports such as different accessibility features between terminals. These unique characteristics can make it more difficult for passengers to predict their experience each time they travel, according to representatives of disability advocacy organizations.

Airport representatives and disability advocacy organizations told us that airports vary in their specific accessibility limitations—such as service gaps—and features, and some airports may provide services beyond what is required. For example, the ACAA regulations require airlines to provide service to passengers who request it between the entrance to the

terminal and the departure or arrival gate.⁵⁰ Because airlines are not generally required to provide such assistance to locations beyond the terminal entrance—including parking lots, ground transportation options, and rental car facilities—five airports and two disability groups we met with said that passengers with disabilities can essentially experience a service gap in arriving at or leaving the airport terminal.⁵¹

Furthermore, some airports might have certain accessibility features in some, but not all, locations within an airport. For example, a given airport might have hearing loop technology to assist passengers who are deaf, but that technology might only be installed in one terminal, possibly throughout the terminal, or only at specified locations such as information desks, or at one or two gates.⁵² Passengers who may benefit from using a hearing loop would not be able to plan their trip and ensure their airlines' gate happened to be near the hearing loop, even if they were aware that their departure airport had one available. Without the availability of a hearing loop, the passenger may need more assistance from the airline personnel they interact with, or a way to receive announcements broadcast over the loudspeaker delivered visually or from an individual.

Representatives from a couple of the disability advocacy organizations we met with said that the accessibility-related information available on

⁵⁰14 C.F.R. § 382.91.

⁵¹DOT regulations do, however, require airport operators receiving federal financial assistance to ensure that terminal facilities and services (including parking and ground transportation facilities) that they own, lease, or operate at a commercial service airport be readily accessible to and usable by individuals with disabilities, including individuals who use a wheelchair. See 49 C.F.R. § 27.71.

⁵²A hearing loop is a technology system that sends an audio signal directly to compatible hearing aids or implants, making it easier to hear announcements and people speaking.

airport websites varies in amount and quality.⁵³ According to ACRP, airport websites can be an important source of information for passengers planning their journeys, especially those who may require accommodations due to a disability. On their websites, some selected airports, for example, provided more information than required, including details about accessibility features such as the location of adult changing tables, hearing loops, and assistance through the terminal. A representative of an organization for people who are blind and have low vision described concerns about the accessibility of airport websites and said that in general, websites are not consistently accessible to people who are blind or have low vision, potentially because website developers may try to incorporate website accessibility standards without adequate testing. While there are guidelines that serve as a standard for website accessibility, there is no explicit requirement for airports to ensure that their public-facing websites conform to such guidelines.⁵⁴

⁵³Regarding accessibility information, applicable regulations require airport operators to make available the name and contact information of the airport's employee(s) responsible for the airport's compliance with applicable ADA requirements (also known as an ADA coordinator), in addition to publishing information about the passenger complaint process. 49 C.F.R. §§ 27.71(b), (d), 27.13; 28 C.F.R. § 35.107. DOT also requires airlines to make available their mailing address and email or web address of the designated department in the airline with which to file a complaint about its scheduled service. 14 C.F.R. § 259.7(b). In addition, DOT regulations require recipients of Federal financial assistance from DOT, including airports, to take appropriate initial and continuing steps to notify participants, beneficiaries, applicants, and employees that it does not discriminate on the basis of disability. 49 C.F.R. § 27.15.

⁵⁴Web Content Accessibility Guidelines (WCAG) 2.0 are the current standard for website accessibility, covering a wide range of recommendations for making web content more accessible to a wide range of people with disabilities, including blindness and low vision, deafness and hearing loss, learning disabilities, cognitive limitations, limited movement, speech disabilities, photosensitivity and combinations of these. Under ACAA regulations, airlines that operate at least one aircraft with a designed seating capacity of more than 60 passengers and that own or control a primary website that markets passenger air transportation are required to ensure that their public-facing pages on the primary website conform to WCAG 2.0 guidelines.

Stakeholders Identified Some Approaches to Help Passengers with Disabilities at Airports, but No Solution Meets All Needs

Stakeholders we interviewed and ACRP identified a number of approaches and practices to help passengers with disabilities access and navigate through airports.⁵⁵ Representatives from most of the disability organizations we met with also said these types of efforts can help passengers with different kinds of disabilities travel more easily or independently. However, ACRP research and some disability advocacy organizations noted that no single solution would address all needs. We grouped these approaches and practices into the following five broad categories: (1) proactively involve and respond to disability community, (2) proactively identify service gaps or accessibility barriers and develop solutions, (3) implement technology-based solutions, (4) provide supplemental disability training for airport employees, and (5) leverage partner and stakeholder resources.

- **Proactively involve and respond to disability community.** Representatives we interviewed at most of the selected airports described approaches to involve individuals with different types of disabilities in key airport decision-making and to get feedback related to airport infrastructure, among other things. For example, representatives from some (four) selected airports have established standing committees that include external disability community and passenger representatives. According to ACRP, these committees provide airport planners, architects, and designers a group to consult with on questions of regulatory compliance and inclusive design, can offer firsthand experience on inefficiencies, and provide insight into how people with different disabilities interact with the airport. In addition, a couple (two) airport representatives we met with periodically tour airport facilities with passengers with disabilities to obtain their input on accessibility barriers and potential solutions. According to representatives at one airport, accessibility is not a “box to check,” as meeting the needs of passengers with disabilities requires continuous engagement with the disability community, planners, designers, and others.

Most (10) of the selected airports we reviewed offer familiarization programs for passengers with autism or cognitive disabilities and their

⁵⁵As discussed above, selected stakeholders include representatives from 10 disability advocacy organizations and 16 U.S. airports. See, for example, *ACRP Research Report 210: Innovative Solutions to Facilitate Accessibility for Airport Travelers with Disabilities*, (Washington, D.C.: 2020); and *ACRP Research Report 177: Enhancing Airport Wayfinding for Aging Travelers and Persons with Disabilities*, (Washington, D.C.: 2017).

families.⁵⁶ According to airport representatives we met with, these programs help passengers with disabilities, including children and families, better prepare for the airport travel experience, and have the added benefit of providing airport and airline staff with experience assisting passengers with cognitive disabilities. According to ACRP, these types of programs are in place across the country. The most well-known of these programs—Wings for Autism or Wings for All—organized by one of the disability groups we met with, held 130 events in almost 60 U.S. airports from 2014 to 2018.

Finally, three of our selected airports have joined the Hidden Disabilities Sunflower program, a global initiative that allows passengers to self-identify to airport and airlines staff as someone with a hidden disability.⁵⁷ By wearing a sunflower lanyard or another item, the passenger signals to staff that they may require additional assistance or patience.

- **Proactively identify service gaps or accessibility barriers and develop solutions.** Representatives at several airports we met with described other approaches to identifying accessibility issues. For example, some airports (six) conduct service quality checks or “secret shopper” audits of ground transportation providers to help identify potential gaps in wheelchair service and service contractor compliance such as ensuring airports have ramps or lifts to meet the needs of passengers with mobility disabilities. While airports are required to include FAA provisions concerning compliance with accessibility rules in all their contracts for services provided to the public, officials said that airports can also add contract provisions, such as requiring specific training, monitoring, or processes to better ensure compliance. According to FAA officials, having clear contract requirements and strong oversight practices is an effective tool for ensuring compliance for contractor-provided ground transportation service.

Similarly, a few airlines have conducted audits and spot checks of the services their contractors provide to passengers with disabilities within airports. In addition, disability groups have advocated for the

⁵⁶Programs such as Wings for Autism, Wings for All, or similar airport-specific programs for passengers with cognitive or sensory disabilities such as autism, take participants through the airport and the security area, and then board an out-of-service plane, practicing social skills at each step in the process.

⁵⁷Hidden disabilities can include low vision or hearing loss, autism, anxiety disorders, epilepsy, learning disabilities, post-traumatic stress disorder, and many other impairments or chronic illnesses.

principles of universal design—the principle that buildings, products, and services meet the needs of all users, with and without disabilities—to guide the design of airports. Universal design principles can allow passengers with disabilities to be as self-reliant as possible and have a much broader scope than the minimum accessibility standards referenced under the ADA.

Representatives from a few airports we met with highlighted approaches they have taken to address accessibility-related issues that passengers complain about at their airports or that better meet the needs of certain passengers by exceeding accessibility requirements. Some airports have taken steps intended to exceed the minimum ACAA or ADA requirements related to certain services or infrastructure, according to the representatives. For example, to mitigate passenger complaints related to the provision of wheelchair assistance, one airport we met with developed service standards for airline contractors that provide wheelchair assistance within the airport with the goal of improving their airports' passenger experience.⁵⁸

These standards dictate acceptable passenger wait times at this airport (e.g., a contractor should meet the passenger within 30 minutes if not prearranged, and within 20 minutes if the wheelchair service was requested in advance). According to representatives at this airport, wheelchair-related complaints dropped significantly after these standards were implemented. Airlines are required to promptly provide assistance or ensure the provision of prompt assistance to passengers; given the wide variety of situations in different airports and flights, DOT officials said they determine whether prompt assistance is provided using the totality of the circumstances rather than a specific timeframe.

In addition, five selected airports told us that they have voluntarily installed adult changing tables within accessible restrooms. These restrooms are designed to provide a safe, clean space for passengers with intellectual or physical disabilities to use the restroom with family members or caretakers. According to ACRP research, U.S. airports are beginning to see the value in building fully accessible restroom facilities that meet the needs of these passengers.⁵⁹

- **Implement technology-based solutions.** Representatives we met with from several airports reported having implemented technology-

⁵⁸These standards are included in the airport's Rules and Regulations and govern the general conduct of the public, tenants, employees, and commercial users of the airport.

⁵⁹ACRP Research Report 210, *Innovative Solutions to Facilitate Accessibility for Airport Travelers with Disabilities* (Washington, D.C.: 2020).

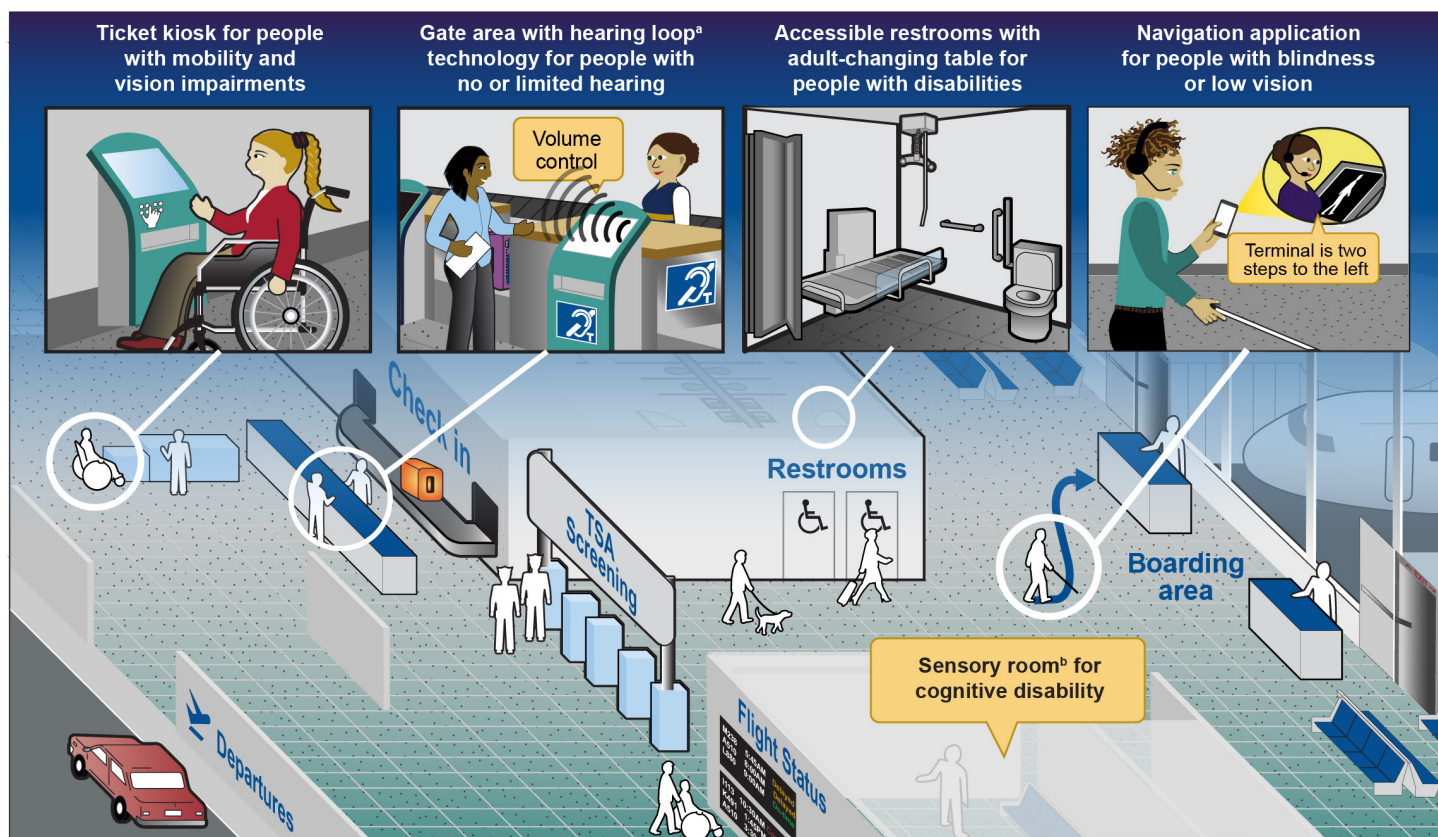
based solutions to assist passengers with various types of disabilities. Figure 3 provides cited examples. For example, representatives from some (four) selected airports reported developing mobile-friendly navigation applications or websites that can help passengers to better plan their journey through the airport (known as wayfinding). In addition, representatives from most (nine) selected airports told us they had subscribed to Aira, a technology-based wayfinding solution that uses a mobile app or smart glasses to link passengers with blindness and low vision with remote agents to help them navigate the airport.⁶⁰ Representatives at one of the airports we met with described this relatively new technology as easy to implement and a “win-win” for both passengers and airports.

According to representatives of airports and advocacy organizations we met with, some technologies that can benefit passengers with disabilities are more complex to implement than others or still under development. For example, five selected airports have installed hearing loop technology. However, some airport representatives noted that installation is complicated and easier to incorporate during major infrastructure projects, because it requires wiring to be installed in floors and walls.

Finally, new, more advanced solutions—such as autonomous wheelchairs—have been reported by ACRP as being piloted at certain airports but are not yet widely available for use. According to representatives at one airport, autonomous wheelchairs are a promising solution that could offer additional benefits. For example, the technology could benefit operations at the airport’s international arrivals terminal—which has long walking distances and large number of wheelchair requests—as well as potential benefits in a post-COVID airport environment, as autonomous wheelchairs may provide opportunities for no-contact or increased socially distanced assistance. However, DOT officials noted that agency civil rights experts have raised concerns about using technologies such as these, which takes humans out of the service interaction in a way that might be unacceptable to some wheelchair users.

⁶⁰Airports can purchase minutes on this service and may offer the service to airport passengers at no cost to the passenger.

Figure 3: Selection of Airport Accessibility Features to Help Passengers with Disabilities Access and Navigate Airports, as Identified by Stakeholders



Source: GAO. | GAO-21-354

^aA hearing loop is a technology system that sends an audio signal directly to compatible hearing aids or implants, making it easier to hear announcements and people speaking.

^bSensory rooms are designed to provide passengers with a break from the busy, noisy, and crowded airport environment.

- **Provide supplemental disability training for airport employees.** Disability advocacy organizations we met with and ACRP research noted that accessibility is an inherently human issue that requires a human response.⁶¹ As such, these sources highlighted the value of disability awareness, sensitivity, or communication training for employees who interact with passengers. Representatives at most (10

⁶¹ACRP Research Report 210, *Innovative Solutions to Facilitate Accessibility for Airport Travelers with Disabilities* (Washington, D.C.: 2020).

of 16) airports we met told us they provide some form of disability-related training to airport employees or tenants not covered by ACAA regulatory training requirements.⁶² Some airports noted this type of training can be valuable for airport and other employees, because it can help staff better understand passengers with disabilities' experiences. For example, airport representatives said they provided disability training, focused on awareness of different types of disabilities in a session on "a day in the life" of people with disabilities for front line employees working at the airport.

- **Leverage partner and stakeholder resources.** Representatives at several airports we met with said they seek information on accessibility best practices from other airports or industries, or guidance from FAA's Office of Civil Rights. For example, representatives at one airport said they consulted with and visited other airports to learn more about accessibility options and leveraged certain customer service practices from the hotel and hospitality industries that could be translated to the airport environment. With respect to FAA, agency officials told us they share information on leading accessibility practices—such as those identified during the course of the airport compliance reviews they conduct each year—with airports during the annual Airports Civil Rights conference, and publishes these presentations online.⁶³ The agency has also developed and published some accessibility-related guidance on its website (e.g., 2019 guidance on emergency evacuation plans).⁶⁴ Seven airports we met with said they have benefitted from FAA's conference presentations and guidance.

⁶²While some airport authorities are subject to certain ADA (e.g., 49 C.F.R. § 37.173) or Section 504 (e.g. 49 C.F.R. § 27.72(g)) provisions requiring certain airport personnel to receive specific types of disability-related training, airport authorities are not subject to the same type of broadly scoped disability-related training provisions for their personnel as are required of airlines under ACAA regulations (14 C.F.R. § 382.141). These ACAA disability-related training regulations are set out in more detail in appendix I.

⁶³FAA conducts approximately eight airport compliance reviews each year, primarily focused on identifying accessibility issues, ensuring airports meet regulatory requirements and standards, and to some extent also providing an opportunity to identify best practices at selected airports.

⁶⁴FAA has held 11 annual National Civil Rights Training Conferences for Airports, as a way to provide airport sponsors with training related to the Disadvantaged Business Enterprise/Airport Concessions Disadvantaged Business Enterprise program, Title VI of the Civil Rights Act of 1964, Limited English Proficiency, Environmental Justice, ADA, Section 504, and other civil rights policies and regulations.

Selected Airlines Said They Design Disability-Related Training to Address Requirements, but Other Factors Also Affect Service

Most Selected Airlines Train Their Employees and Rely on Contractors to Train Contractor Staff

Based on interviews with airline representatives, we found that airlines take a similar approach to address disability-training requirements for their own employees but vary in their approach for training for contracted passenger support staff.⁶⁵ Specifically, representatives from all eight selected airlines told us they directly train their own employees who assist passengers with disabilities within the airport terminal, with the majority (seven) using training curriculum developed in-house.⁶⁶ In contrast, only two selected airlines reported that they directly train contract passenger support agents; the other six airlines generally rely on contractors to train their own personnel using their own curriculum. Similarly, five of the six contractors we spoke to—each of whom had contracts with one or more airlines in our selection at the time of our audit work—reported that they had developed their own curriculum, and all said they directly train their own staff in most cases. All airlines and contractors told us that they designed their disability-training programs to meet or exceed the ACAA's regulatory training requirements (see app. I for list of the ACAA's key

⁶⁵This review focused on disability-related training for public-facing employee roles within the airport environment, such as gate agents. It did not include training for those with minimal or no interaction with passengers (e.g., baggage handlers) or those with responsibilities primarily on board the aircraft (e.g., flight attendants).

⁶⁶Customer-facing personnel of regional airlines might receive disability-related training from their regional airlines or from their mainline partner. For example, according to representatives from a regional airline association, two member regional airlines reported training their own employees, whereas one selected airline told us they train all mainline and regional employees. However, according to regional airlines representatives, regional airlines do not have a role in training service contractor personnel, because service contracts are handled by their mainline partners.

regulatory training requirements).⁶⁷ Later in this report, we discuss DOT's approach for overseeing compliance with these requirements.

In general, airline representatives told us that their oversight of contractors focuses on service quality and identified service violations, if any. For example, two airlines told us they have terminated contracts with contractors when passenger support agents were unable to meet service level expectations. As it relates to training, representatives from all of the airlines that rely on contractors for training their own personnel said they have reviewed the training materials, generally prior to signing a contract. For example, one airline said that curriculum or contract changes are made if the contractor's training does not initially meet federal or airline requirements based on the airline's review. Selected contractors also told us that many airlines they work with will review and approve their training materials. In addition, five airlines reported that headquarters personnel have observed some of their contractors' training sessions, but reiterated that station managers (airport-level airline managers) generally have more direct oversight of contractors.

Airlines' and Contractors' Reported Training Varies; and Both are Taking Steps to Review and Update Disability-Related Training

Through interviews with airlines and contractors, and our review of the limited disability-related training materials provided to us, we also found some variation in certain training characteristics, such as length. As mentioned previously, ACAA regulations generally focus on requiring personnel to learn about certain topics at specified frequency, but do not prescribe specific methods or training length. According to DOT officials, ACAA implementing regulations related to training⁶⁸ are not overly prescriptive, providing airlines flexibility in how to approach training delivery. For example, selected airlines' disability-related training ranged from 1 to 8 hours, depending on an employee's role, with additional supplemental training information or on-the-job training. Contractors' disability-related training ranged from 6 to 40 hours followed by required on-the-job training components. See appendix II for a more comprehensive comparison of certain training characteristics from selected airlines and contractors.

⁶⁷Airline and contractor representatives generally summarized their training curriculum during interviews and in some cases provided training documents. With the exception of one, they did not provide comprehensive disability-related training materials for us to review because they said the documents are considered business proprietary.

⁶⁸14 C.F.R. §§ 382.141-145.

In addition, all selected airlines and contractors told us they are taking various steps to assess employee proficiency. Specifically, all selected airlines and most (four) contractors told us they include knowledge checks through their initial training or require employees to pass an exam at the end of training, which helps them assess whether employees are trained to proficiency on certain topics based on their role.⁶⁹ The other two contractors told us that passenger support agents gain proficiency on the job, so their approach to assess proficiency is to have managers provide on-the-job training or shadow employees while they assist passengers. In addition, most (six) airlines and all contractors described conducting audits of employees in which management observes and evaluates employees assisting passengers, sometimes through unannounced inspections. For example, according to one contractor, their management uses a checklist to determine whether employees can perform a specific skill, requiring retraining if an employee does not meet expectations.

To evaluate the effectiveness of their disability-related training, representatives from selected airlines told us that they consider a number of factors, including the results of the training knowledge checks and exams, employee performance, passenger complaints, and employee feedback on the curriculum. Contractors told us they generally consider employee performance to reflect the effectiveness of their training, such as transition time between assisting passengers. This data can be collected via the technology (e.g., tablets) contractors told us they use to manage service. Representatives from all selected airlines and contractors told us that they updated their curriculum based on trends in complaints or changes in internal policies, procedures, DOT guidance, or regulations. While some review content on an as needed basis, representatives from four selected airlines and two contractors said they review and update trainings at least annually.

⁶⁹Per ACAA implementing regulations, airlines are to ensure that employees be trained to proficiency on (a) the requirements laid out in the ACAA as well as other applicable federal disability-related regulations affecting the provision of air travel to passengers with a disability, (b) the airlines procedures, including how to operate equipment safely, and (c) how to assist passengers with enplaning and deplaning, including the use of equipment, to the extent to which an employee's role includes performing these duties. 14 C.F.R. § 382.141(a)(1).

Stakeholders Said Disability-Related Training Cannot Address All Service Issues

While there is general agreement that training is key to helping ensure passengers with disabilities receive non-discriminatory treatment, stakeholders across all groups we interviewed said that ensuring airlines and contractors meet training requirements, or an emphasis on improving that training, cannot address all service issues.⁷⁰ Most stakeholders we interviewed identified a range of other factors that can affect service, including some of the barriers discussed earlier. These factors that can affect all passengers with disabilities but were primarily cited as affecting those seeking wheelchair assistance. For example, even if service personnel are well trained and highly experienced, the number of working elevators can affect a passenger's time traveling through the airport, as generally only a few wheelchairs can fit in them at the same time. According to stakeholders, agency officials, and a 2020 internal analysis of passenger complaint data by DOT,⁷¹ factors affecting service include:

- **Requests for service.** Most airlines and contractors told us it is difficult to predict the number of passenger support agents needed to provide immediate service to passengers who request it because demand is unpredictable. However, this challenge may disproportionately affect larger airports, as some stakeholders noted small airports are generally easier to serve. As previously discussed, passengers are encouraged, but not required, to request service in advance of air travel, and airlines and their contractors are required to address all service requests, regardless of when the request was made and by whom. Contractors told us they try to account for some level of daily ad hoc requests—those made upon arrival at the airport rather than at the time of booking a flight, for example—when making staffing decisions. However, they estimated that ad hoc requests can vary widely, from between 10 and 40 percent of wheelchair requests on a given day.

In addition, many stakeholders told us some arriving flights, particularly those from certain international destinations, might have upwards of 50 to 80 wheelchair requests. Contractors, passenger support agents, and airport and airline representatives suggested that this occurs because some passengers hope to move more quickly

⁷⁰Selected stakeholders include representatives from airlines, service contractors, disability advocacy organizations, airports, a labor union, and aviation industry associations.

⁷¹Presentation materials from the March 2020 ACAA Advisory Committee meeting describe DOT's 2020 analysis of complaints the agency received to quantify the number of assistance-related violations and identify the root cause of each complaint, as discussed later in this report.

through customs or want to receive navigation assistance through an unfamiliar airport, even though they may be able-bodied. Most contractors and airlines said that it can be difficult to predict these peak periods of demand because some of these requests can be ad hoc and flights can be delayed due to a number of uncontrollable factors, such as weather. Further, passenger support agents, who all assist passengers at large and busy airports, said they often do not have enough personnel to serve all passengers well. As a result, there may not be sufficient resources necessary to serve all passengers with expediency.

- **Passenger expectations.** Many stakeholders across all groups we interviewed and agency officials noted that some passengers may have unrealistic expectations about the level of service an airline or contractor can or is required to provide. For example, while current regulations provide that airlines must promptly provide or ensure the provision of requested assistance to passengers with disabilities, a passenger might expect service to be one that arrives immediately upon request or upon arrival at an airport.⁷² In addition, some contractor wheelchairs may need additional time for cleaning in between passengers, according to passenger support agents we spoke to, a process that can increase the time it takes for an employee to transition between passengers.
- **Personnel turnover.** Employee turnover may further strain service quality, according to an airline, airports, contractors, disability advocates, labor representatives, and DOT officials we interviewed. Factors that influence this turnover include seasonality, low wages and limited benefits (e.g., no or limited sick leave), and the physical demands of assisting passengers. Some labor studies of airline-contracted personnel point to high employee turnover where wages are low. Contractors told us the passenger support agent role is typically an entry-level, minimum-wage job—one that is often used as a stepping-stone to other opportunities at the airport, according to a few stakeholders.
- **Communication issues.** Disability advocates and passenger support agents described communication challenges that can affect access to service as well as the quality of service. Some noted challenges include language barriers between passengers with disabilities and customer-facing airline and contractor personnel, differing

⁷²DOT has not adopted a specific time limit of what would be considered “prompt” assistance, and DOT officials noted their interpretation considers the totality of the circumstances presented. See Nondiscrimination on the Basis of Disability in Air Travel; Final Rule, 73 Fed. Reg. 27614, 27620 (May 13, 2008).

communication preferences, and experiences with faulty or broken technology, such as radios used to communicate service requests.

- **Airline flight logistics.** In addition to our review of the literature, some stakeholders, including contractors and disability advocates, told us that short flight connection times for some passengers (sometimes due to irregular operations) can place further demands on service providers, with the potential for missed flights if assistance is not immediately provided. This issue is exacerbated by those requesting assistance typically being the last passengers to disembark an aircraft.

Selected airlines reported taking steps to address some of these factors. In particular, to help address passenger expectations, some airlines are looking to better communicate key information to passengers who have requested service. For example, representatives from one airline said they are planning to enhance their confirmation emails to remind passengers both what specific services they requested and how they can request any additional assistance ahead of their travel to the airport. All selected airlines said that they have convened roundtables or held meetings with members from the disability community to help inform the airlines' efforts to provide better customer service. In addition, four selected airlines have set up or are planning to set up external accessibility advisory committees, which representatives say help them better address accessibility issues raised by passengers with disabilities. Airlines are also involved in a number of industry-led working groups intended to better service passengers with disabilities, including developing new training components that may help improve service. For example, an industry association and some airlines reported being part of groups that are developing guidance for passengers and a training manual for airlines to better support those who travel with personal wheelchairs.

DOT's Disability-Related Training Oversight Has Included Outreach, Reviews of Materials, and Passenger Complaint Analyses

DOT Conducted Airline Outreach and Reviewed Training Materials Following Changes to Requirements

Following the comprehensive update to the entire ACAA rule in 2008, DOT's Office of Aviation Consumer Protection engaged in a number of efforts to help ensure airlines understood and were complying with the disability training requirements. Providing compliance assistance following a change in regulations is in line with how DOT has sought to ensure airlines' compliance with other consumer protection requirements.⁷³ According to DOT officials, that assistance from 2008 through 2011 included one-on-one outreach and educational forums with both domestic and foreign airlines to explain the training requirements, such as airlines' required role to either train contractors or ensure contractors train their public-facing employees.

DOT has continued training-related compliance assistance efforts through communicating with airlines on an as needed basis, participating in training forums, and making instructional materials available on DOT's aviation consumer protection website. For example, in 2016, DOT published illustrative employee training materials that were informed by focus groups it had created to help address the most frequent passenger complaints, such as issues with wheelchair assistance. Airline representatives told us these materials were useful, and many have used them in their training sessions.

In addition, DOT officials said their personnel reviewed airline and contractor training materials and in some cases attended disability-training sessions, activities that representatives from a number of

⁷³We have previously reported that DOT conducts five key activities to help airlines understand and meet consumer protection requirements, as well as deter noncompliance: (1) providing compliance assistance to the industry, (2) processing consumer complaints, (3) inspecting airlines, (4) investigating potential violations, and (5) pursuing enforcement. See [GAO-21-109](#) and [GAO-19-76](#).

selected airlines confirmed. Agency officials also told us that they reviewed training records from a selected group of airlines and contractors to ensure that they provided refresher training to employees at the required frequency. DOT officials explained how they prioritized their review of certain airlines' training materials and classes from 2008 through 2011:

- **Foreign airlines.** Agency officials told us they prioritized outreach efforts for foreign airlines and their contractors, because neither had been required by ACAA regulations to provide disability-related training to their public-facing employees prior to 2009.
- **U.S.-based training organizations.** Officials said they provided feedback on curriculum developed by training organizations that were hired by some of the domestic airlines to develop or provide disability-related training. According to DOT officials, they prioritized these organizations because they were responsible at that time for training a large number of domestic airline employees.
- **Training for Complaints Resolution Officials (CRO).** DOT officials said they reviewed multiple airlines' training materials and attended trainings specific to the CRO role, as well as provided airlines with feedback. Officials explained that since CROs resolve passenger complaints on behalf of the airlines, they decided it was important to focus their resources on ensuring that airlines understand the specific CRO training requirements.

Generally until 2018, DOT also used two types of inspections of airline operations as further means to directly monitor and observe airlines' compliance with training requirements. For one, during airline headquarters inspections, DOT officials said they reviewed disability training materials, records, and policies, as well as a sample of disability complaints passengers submitted to the airline—materials DOT generally was only able to review during these types of inspections. From 2008 through 2016, based on previously reported data, DOT completed an average of three to four inspections at U.S. airlines' headquarters annually.⁷⁴ DOT also conducted unannounced inspections of airline operations at airports; such inspections, according to officials, sometimes provided them with an opportunity to observe a disability-related training session if one happened to be scheduled at the time of the inspection. For example, five selected airlines and one contractor told us that DOT personnel had observed a disability-related training session, most

⁷⁴[GAO-19-76](#).

recently in 2017. In addition to allowing DOT personnel to determine whether airlines and contractors are teaching training content consistent with ACAA regulatory training requirements, DOT officials said inspections enabled them to observe the performance of airline and contractor employees, providing insight into whether employees were being trained, as required, to proficiency.

We have also previously reported that DOT inspected 12 to 14 U.S. airlines annually at 51 domestic airports from 2015 through 2017, according to DOT data.⁷⁵ However, as with its observations of training sessions, officials told us that resource constraints due to other priorities, including implementing mandates in the FAA Reauthorization Act of 2018, have led DOT to substantially scale back the number of general inspections it conducts and its reviews of airline training materials are now based on whether a particular case raises concerns of a potential training deficiency. As we previously reported, DOT has not conducted airline headquarters compliance reviews since 2016.⁷⁶ Also, the agency has conducted fewer airline inspections at airports in recent years. For example, while DOT inspected 12 U.S. airlines at 18 domestic airports in 2017,⁷⁷ DOT personnel only conducted airline inspections at three airports, all in the Washington, D.C. area, in 2019.

DOT officials provided several reasons why their oversight approach now focuses on addressing training issues identified via complaint data. For one, DOT officials said they gained confidence the airlines could comply with the training requirements because those requirements have generally not changed since 2008 and are well understood throughout the industry. Second, officials said the Office of Aviation Consumer Protection has limited resources and a number of priorities to balance. For example, we recently reported that the office has about 30 staff to monitor compliance and investigate a broad range of potential consumer protection violations such as flight oversales and refunds, passenger discrimination, and tarmac delays.⁷⁸ In particular, DOT officials said they temporarily stopped conducting airline headquarters inspections due, in part, to a shift in focus to statutorily mandated priorities, which limited staff available to conduct inspections, and budget unpredictability, according to

⁷⁵[GAO-19-76](#).

⁷⁶[GAO-21-109](#).

⁷⁷[GAO-19-76](#).

⁷⁸[GAO-21-109](#).

officials. Finally, officials said that training issues have not been found to be a significant root cause of recent disability-related service violations, as discussed in more detail below. Therefore, while officials told us that training is important and can always be improved, they determined that conducting resource-intensive efforts to directly oversee airlines' implementation of training was not a prudent use of limited resources. Officials noted that they have continued to periodically review airlines' CRO materials, most recently in 2018, because of the importance of the CRO position. However, officials said they continue to rely on airlines to ensure that their contractors are providing the required disability training to public-facing contract personnel.

DOT Now Largely Focuses on Addressing Training Issues that It Identifies through Passenger Complaints

Similar to DOT's oversight of other consumer protection areas, the agency analyzes disability-related passenger complaints to help determine whether training issues are a significant cause of violations. Processing and investigating passenger complaints it receives are key actions DOT conducts as part of its approach to oversee the full range of consumer protection requirements. Agency personnel investigate passenger complaints submitted directly to DOT to determine whether a violation of the ACAA or its implementing regulations occurred, and if so, the cause of the violation, such as a potential training issue. As previously noted, DOT is required to investigate every complaint it receives alleging a violation of the ACAA. DOT officials said they also review disability-related passenger complaint data submitted annually from the airlines to DOT. Should they identify trends or changes in these data, DOT may pursue additional investigation.⁷⁹ Officials told us that further investigation of potential violations may then require agency personnel to review airlines' or contractors' training materials or records if the initial investigation indicates that training may be the root cause of the violation. Through these investigations, DOT can also review the manner in which service was provided, such as contractors' or airlines' assistance

⁷⁹Airlines are required to annually submit to DOT a report summarizing the disability-related complaints received during the prior calendar year. 14 C.F.R. § 382.157(d).

procedures and equipment used; such analyses may reveal that the cause of inadequate assistance was training, or unrelated to training.⁸⁰

DOT may pursue an enforcement action—such as through a warning letter or a consent order—when it identifies an individual violation of the disability training requirements.⁸¹ Generally, enforcement action is pursued where one or a few complaints describe particularly egregious conduct on the part of a carrier and those complaints are supported by adequate evidence or on the basis of a number of complaints on which the agency may infer a pattern or practice of discrimination, according to DOT officials. When a violation is found, DOT sends a warning letter to the relevant entity; this letter is intended to alert an entity of a finding of a violation and help violators achieve compliance, according to officials. According to agency officials, DOT has notified airlines via warning letters on occasions when it appeared that a lack of training contributed to disability-related violations, though the total number of these types of warning letters cannot easily be quantified in the agency’s database. We recently made a number of recommendations intended to enhance the transparency of DOT’s consumer protection enforcement process.⁸² These recommendations could also address disability-related issues. The agency can also take other enforcement actions intended to provide restitution to a harmed passenger and encourage future compliance through settlement, such as issuing consent orders, which can require

⁸⁰For example, in 2013 DOT issued a consent order to an airline after finding a “significant number of violations” including a number of “egregious violations” involving passengers at two airports missing connecting flights because of inadequate connecting assistance. In this case, DOT’s investigation revealed that the airlines’ service procedures necessitated many transfer points for passengers, often leading to unreasonable delays for those passengers. US Airways, Inc., DOT Consent Order 2013-11-4 (Nov. 4, 2013) (Docket No. DOT-OST-2013-0004).

⁸¹These training requirements outline certain training content to be delivered at specified frequencies, depending on an employee’s duties. See appendix I for a list of key ACAA regulatory training requirements.

⁸²In an effort to make public information about the results of its enforcement actions that do not result in a consent order and are instead corrected through other means, such as warning letters, we recently recommended that DOT take steps to provide transparency and additional clarity into the results of DOT’s enforcement of consumer protections, including disability issues. DOT concurred with this recommendation. See [GAO-21-109](#).

violators to pay civil fines and/or complete specified corrective actions.⁸³ We previously found that for all consumer protection requirements, DOT more typically issues a consent order when it identifies a systemic pattern or practice of violations.⁸⁴ However, related to disability issues, DOT can and has issued consent orders in instances where DOT has determined that an airline's actions were egregious based on only one or a few disability-related complaints, according to officials.⁸⁵

Officials told us that the results of their oversight of airlines' ACAA regulatory training requirements provide the agency with confidence that its compliance framework is working. Specifically, DOT officials said that they have rarely found training to be a contributing factor in the disability-related violations they have identified since the ACAA regulations were updated. According to officials, while 33 out of the 380 consent orders issued by DOT from 2008 through 2019 contained disability-related violations, only one consent order found a commercial airline was non-compliant with the ACAA training regulations. In this 2017 case, DOT found that the airline violated the ACAA regulatory requirement to train employees to proficiency based on their role because multiple airline employees improperly handled a passenger's request for seating accommodations with a service animal.⁸⁶ The consent order required the airline to take several corrective actions, including the provision of supplemental training to its reservation and gate agents regarding the proper handling of service animal requests.⁸⁷ Comparatively, we found

⁸³We also previously reported that about 25 percent of the disability-related enforcement cases DOT pursued from 2005-2015 included requiring airlines to take training-related corrective actions—even though none of these violations were for training noncompliance. For example, some airlines were required to establish a disability council to help improve their training programs. [GAO-17-541R](#).

⁸⁴We previously reported that DOT has not specifically defined what constitutes a "pattern or practice," but DOT documentation indicates that a practice generally requires more than one isolated incident, although a single incident could indicate a practice if it reflects company policy, training, or lack of training. [GAO-21-109](#).

⁸⁵Agency officials told us that ACAA's implementing regulations do not limit DOT's ability to issue consent orders in response to situations where DOT finds a pattern or practice of violations as is the case in other consumer protection areas.

⁸⁶*Crowell v. American Airlines, Inc.*, DOT Consent Order 2017-1-11 (Jan. 11, 2017) (Docket No. DOT-OST-2014-0146).

⁸⁷In December 2020, DOT issued a final rule amending the ACAA's regulation on the transport of service animals by air, defining that only dogs who are individually trained to do work or perform tasks for the benefit of a qualified individual with a disability are considered service animals, among other items. 85 Fed Reg. 79742 (Dec. 10, 2020).

that the largest category of violations cited in the 33 disability-related consent orders was related to airlines' disability reporting, such as not filing required annual reports to the Office of Aviation Consumer Protection on disability-related complaints.⁸⁸

In addition to finding that only one violation that resulted in a consent order in recent years was caused by a training deficiency, a 2020 DOT analysis found that a range of factors other than training are likely root causes of service violations. For this internal analysis that DOT conducted in response to a requirement in the FAA Reauthorization Act of 2018,⁸⁹ DOT analyzed over 1,300 disability-related passenger complaints it received, identifying that about 40 percent of the complaints (524) contained at least one issue regarding passenger assistance.⁹⁰ Of the 524 complaints analyzed, DOT determined that more than half of these complaints (276) described actual ACAA violations. DOT analyzed the causes of these violations and, based on responses from airlines and review of other relevant documents, determined that a number of factors other than training could have contributed to the violations. For example, DOT identified factors such as staffing shortages and inaccurate passenger service request codes on tickets, which can be done by third-party ticket agents.

DOT Is Also Using an Advisory Committee to Help Identify Ways to Improve Air Travel Accessibility, Including Disability-Related Training

As directed by the FAA Reauthorization Act of 2018,⁹¹ DOT has convened the Air Carrier Access Act Advisory Committee (ACAA Advisory Committee) to take a broad look at accessible air travel within the airport and on aircraft. The committee, comprised of representatives from airlines, airports, aircraft manufacturers, disability advocates, an aviation service contractor, and others—was established in September 2019 and first met in March 2020. The committee is charged with identifying and assessing barriers to accessible air travel, determining the

⁸⁸For example, airlines must make a dispositive written response to certain written disability complaints within 30 days of their receipt, and the response must specifically admit or deny that a violation of the ACAA regulations has occurred. 14 C.F.R. § 382.155(d).

⁸⁹Pub. L. No. 115-254, § 440, 132 Stat. 3186, 3347.

⁹⁰DOT's analysis looked at 1,321 complaints over the period of January 2017 through October 2018 sent to DOT from the top 10 U.S. marketing carriers and the top 5 foreign carriers by enplanements to and from the U.S. The results of this analysis were presented to the ACAA Advisory Committee in March 2020.

⁹¹Pub. L. No. 115-254, § 439, 132 Stat. 3186, 3345-48.

extent to which DOT is addressing those barriers, and recommending improvements.⁹² The committee formed three subcommittees in summer 2020 to address a number of topics, some statutorily required.⁹³ According to DOT officials, the committee and subcommittees are working together on topics such as:

- **Assistance at airports and related training.** A subcommittee is focused on improving assistance for passengers at airports and related training. DOT officials acknowledged that disability-related service issues continued to be a recurring problem. For example, several stakeholders told us that assistance could be improved if passengers provided advance notice of their service needs before arriving at their airport—although they all acknowledged that this notification is not a requirement. Many airline representatives we interviewed emphasized that while advance notice is helpful for planning purposes, there may be valid reasons passengers do not request assistance until they arrive at the airport. In addition, officials told us that they plan to use the committee as a vehicle to address a FAA Reauthorization Act of 2018 requirement to develop, if necessary, recommendations for hands-on training provided to employees who provide physical assistance to passengers.⁹⁴ Outside of the committee’s work and in response to an FAA Reauthorization Act of 2018 requirement, DOT recently listed a proposed rulemaking that would be designed to clarify airlines’ responsibilities under ACAA regulations to provide prompt assistance to passengers when moving within the airport (e.g., to connecting flights).⁹⁵
- **Ticketing issues and seating accommodations.** DOT’s 2020 complaint analysis found that airlines did not always properly receive or handle requests for assistance or accommodations, a problem that can occur through the ticketing process. Stakeholders told us that the special service request codes on tickets are not always accurate. For

⁹²*Id.* The committee is required to submit findings to both DOT and Congress and conclude its work by 2023.

⁹³One subcommittee was formed to address the FAA Reauthorization Act of 2018 requirement for DOT to study the stowage of assistive devices on aircraft, which is outside the scope of this report.

⁹⁴Pub. L. No. 115-254, § 440(a)(2)(B), 132 Stat. 3186, 3347.

⁹⁵*Id.* § 440, 132 Stat. 3186, 3347. DOT listed this proposed rulemaking as a planned item in the Office of Information and Regulatory Affairs’ Fall 2020 Unified Agenda of Federal Regulatory and Deregulatory Actions for which the agency expects its next regulatory action to take place within the next 12 months.

example, they may not be transferred properly to the airlines and service contractors from third-party ticket agents. A subcommittee was formed to discuss this issue, among others.

- **Passenger education.** Through their 2020 complaint analysis, DOT officials also found that complaints they categorized as non-violations often involved a disconnect between passenger expectations and regulatory requirements. DOT has drafted an “Airline Passengers with Disabilities Bill of Rights,” intended describe in plain language the basic protections and responsibilities of airlines and people with disabilities under the ACAA. DOT is seeking feedback on this document from the ACAA Advisory Committee.⁹⁶ In addition, DOT officials told us that each subcommittee is discussing the issue of passenger awareness and education as it relates to the subcommittee’s topic.⁹⁷

DOT officials told us that subcommittees within the ACAA Advisory Committee met regularly from July to December 2020 to discuss specific topics and that the entire committee will reconvene in spring or summer 2021 when subcommittees will report on the results of their work. DOT officials noted that the committee has been active and engaged, and that they expect thoughtful recommendations from the group as a result of its work. It is unclear whether the advisory committee will ultimately make any training-related recommendations to DOT. While several airlines and disability advocates we spoke to expressed optimism about the committee’s potential effects, others said they have been disappointed that other agency-led efforts in the past have not resulted in accessibility changes they see as priorities. In addition, some stakeholders told us that based on the committee’s work thus far, it may not address what they see as important issues, such as older adults with cognitive disabilities flying on their own. Since the committee’s work is ongoing, it is too early to tell the extent to which it will recommend DOT take action on training or other factors that affect the airport experience for passengers with disabilities.

⁹⁶DOT officials said the “Airline Passengers with Disabilities Bill of Rights” will not expand airlines’ legal obligations or establish new legal requirements.

⁹⁷In 2018, we found that DOT had solicited some input from stakeholder groups, including those representing passengers with disabilities, but had not solicited feedback directly from passengers to understand what they know about their rights. To inform DOT’s education efforts going forward, and to potentially narrow the expectations gap, we recommended that DOT directly capture passengers’ perspectives to ensure that its education efforts are meeting passengers’ needs. DOT concurred with the recommendation but as of December 2020, had not yet taken action to implement it. [GAO-19-76](#).

Agency Comments

We provided a draft of this report to DOT and DHS for review and comment. DOT and DHS provided technical comments, which we incorporated as appropriate.

We are sending copies of this report to the appropriate congressional committees, the Secretary of Transportation, the Secretary of Homeland Security, and other interested parties. In addition, the report is available at no charge on the GAO website at <https://www.gao.gov>.

If you or your staff have any questions about this report, please contact me at (202) 512-2834 or krauseh@gao.gov. Contact points for our Offices of Congressional Relations and Public Affairs may be found on the last page of this report. GAO staff who made key contributions to this report are listed in appendix III.

A handwritten signature in black ink that reads "Heather Krause". The signature is fluid and cursive, with the first name "Heather" and last name "Krause" clearly distinguishable.

Heather Krause
Director, Physical Infrastructure

Appendix I: Department of Transportation's Key Disability Training Requirements

In 1990, the Department of Transportation promulgated the Air Carrier Access Act of 1986's (ACAA) implementing regulations.¹ The regulations have been amended a number of times. Among other things, these regulations require covered airlines to provide disability-related training to their employees and to provide or ensure such training for contractor staff, who deal with the traveling public, including but not limited to, pilots, flight attendants, gate agents, reservation and ticket counter personnel, ramp and baggage-handling personnel, and passenger service personnel.² Key regulations outlining training content and programmatic requirements are as follows:

Training Content Requirements

Airlines must ensure training to proficiency for public-facing employees or contractors, or ensure contractors train contract personnel to proficiency, as appropriate to the duties of each employee concerning:

- The requirements of the Air Carrier Access Act's implementing regulations and other applicable federal disability-related regulations affecting the provision of air travel to passengers with a disability (14 C.F.R. § 382.141(a)(1)(i)).
- An airline's procedures for providing service to passengers with disabilities, including the proper and safe operation of equipment used for accommodation (14 C.F.R. § 382.141(a)(1)(ii)).
- For employees providing boarding and deplaning assistance, airline procedures to perform these duties, including the use of related equipment (14 C.F.R. § 382.141(a)(1)(iii)).

Airlines are also required to train public-facing employees or contractors, or ensure contractors train contract personnel, with respect to:

- Disability awareness, including how to distinguish among the different abilities of an individual with a disability (14 C.F.R. § 382.141(a)(2)).
- Appropriate communication responses to passengers with a disability, including people with physical, sensory, mental, and emotional disabilities (14 C.F.R. § 382.141(a)(2)).

¹55 Fed. Reg. 8008 (Mar. 6, 1990).

²Covered airlines refer to domestic airlines and foreign airlines with flights that begin or end at a U.S. airport and that operate aircraft with 19 or more passenger seats. 14 C.F.R. §§ 382.7, 382.141(a).

-
- How to recognize requests for communication accommodation from passengers whose hearing or vision is impaired, including individuals who are deaf-blind (14 C.F.R. § 382.141(a)(3)).
 - How to use the most common readily-available methods for communicating with passengers whose hearing or vision is impaired, including individuals who are deaf-blind (14 C.F.R. § 382.141(a)(3)).
 - How to perform the duties of a Complaints Resolution Official (CRO) if an employee is designated as one, in addition to all other training requirements (14 C.F.R. § 382.141(a)(7)).

Training Program Requirements

- Airlines must consult with organizations representing people with disabilities when developing training programs, policies, and procedures (14 C.F.R. § 382.141(a)(4)).
- Airlines are to ensure that personnel, including contractors, who are required to receive training, also receive refresher training, as appropriate to the duties of each employee and as needed to maintain proficiency, at least once every three years. (14 C.F.R. § 382.141(a)(5)).
- Airlines are to ensure that employees designated as CROs receive annual refresher training (14 C.F.R. § 382.143(a)(1)).
- Airlines must retain training and instructional manuals or other guidance for review by DOT if requested, as well as individual employee training records for three years (14 C.F.R. § 382.145).

Appendix II: Selected Characteristics of Disability-Related Training for Public-Facing Airline and Contractor Employees at Airports

Table 2: Selected Characteristics of Disability-Related Training for Public-Facing Employees at Airports Described by Selected Airlines and Service Contractors

	8 Selected airlines	6 Selected service contractors
Employee roles	Customer service, gate, and ticket agents	Passenger support agents
Training curriculum	<ul style="list-style-type: none"> 7 developed their own curriculum informed by disability advocate resources and DOT guidance. 1 purchased curriculum from a training organization. 	<ul style="list-style-type: none"> 5 developed their own curriculum, and 4 said curriculum was informed by disability advocate resources. 1 used airline-developed curriculum.
Training content	<ul style="list-style-type: none"> All 8 said their training content was designed to meet relevant regulations. 6 described additional content focused on customer service skills specific to passengers with disabilities. 	<ul style="list-style-type: none"> All 6 said their training content was designed to meet relevant regulations, and included additional customer service-focused content.
Initial training delivery method and length	<ul style="list-style-type: none"> 7 airlines said they conduct in-person training, mostly by dedicated trainers, and 1 airline said it only provides computer-based training. 2 said they provide additional elements via computer-based learning. Ranged from 1 to 8 hours, depending on the role^a 	<ul style="list-style-type: none"> All 6 contractors said they conduct training in-person, some of whom are dedicated trainers and others are airport-level leadership. 1 provides additional computer-based elements. Ranged from 6 to 40 hours.
Additional on-the-job training (OJT) components	<ul style="list-style-type: none"> 4 airlines reported having OJT at the airport level, and 4 said they shared supplemental training information to employees on an ad hoc basis. 	<ul style="list-style-type: none"> All 6 contractors said they require OJT following classroom training, such as shadowing or being shadowed by an experienced agent.
Assessment of employee proficiency	<ul style="list-style-type: none"> All 8 included knowledge checks during or exams after initial training. 	<ul style="list-style-type: none"> 4 included knowledge checks during or exams after initial training. 2 said they assess employee proficiency through job performance.
Refresher training, frequency and length	<ul style="list-style-type: none"> 6 required annual refresher training, some computer-based. Ranged from 45 minutes to 4 hours, depending on an employees' role^a 	<ul style="list-style-type: none"> 5 required annual refresher training. Ranged from 2 to 8 hours^a
Training evaluation and updates	<ul style="list-style-type: none"> All take holistic approach to evaluating training by considering many factors. 4 airlines reviewed updated training at least annually, and 4 did so on an "as needed" basis. 	<ul style="list-style-type: none"> 5 considered employee performance as reflection of training effectiveness. 2 reviewed training at least annually, while 4 reviewed it on an "as needed" basis.

Source: GAO analysis of interviews with representatives from selected airlines and contractors and training-related documents. | GAO-21-354

^aNot all selected entities provided complete information: 7 of 8 airlines reported initial training hours; 5 of 8 airlines and 2 of 6 contractors reported refresher training hours.

Appendix III: GAO Contact and Staff Acknowledgments

GAO Contact

Heather Krause, (202) 512-2834 or krauseh@gao.gov

Staff Acknowledgments

In addition to the contact named above, Jonathan Carver (Assistant Director); Danielle Ellington; Jim Geibel; Geoffrey Hamilton; Delwen Jones; Serena Lo; Malika Rice; Alexandra Rouse; Pam Snedden; Maria Wallace; and James Whitcomb made key contributions to this report.

GAO's Mission

The Government Accountability Office, the audit, evaluation, and investigative arm of Congress, exists to support Congress in meeting its constitutional responsibilities and to help improve the performance and accountability of the federal government for the American people. GAO examines the use of public funds; evaluates federal programs and policies; and provides analyses, recommendations, and other assistance to help Congress make informed oversight, policy, and funding decisions. GAO's commitment to good government is reflected in its core values of accountability, integrity, and reliability.

Obtaining Copies of GAO Reports and Testimony

The fastest and easiest way to obtain copies of GAO documents at no cost is through our website. Each weekday afternoon, GAO posts on its [website](#) newly released reports, testimony, and correspondence. You can also [subscribe](#) to GAO's email updates to receive notification of newly posted products.

Order by Phone

The price of each GAO publication reflects GAO's actual cost of production and distribution and depends on the number of pages in the publication and whether the publication is printed in color or black and white. Pricing and ordering information is posted on GAO's website, <https://www.gao.gov/ordering.htm>.

Place orders by calling (202) 512-6000, toll free (866) 801-7077, or TDD (202) 512-2537.

Orders may be paid for using American Express, Discover Card, MasterCard, Visa, check, or money order. Call for additional information.

Connect with GAO

Connect with GAO on [Facebook](#), [Flickr](#), [Twitter](#), and [YouTube](#).
Subscribe to our [RSS Feeds](#) or [Email Updates](#). Listen to our [Podcasts](#).
Visit GAO on the web at <https://www.gao.gov>.

To Report Fraud, Waste, and Abuse in Federal Programs

Contact FraudNet:

Website: <https://www.gao.gov/fraudnet/fraudnet.htm>

Automated answering system: (800) 424-5454 or (202) 512-7700

Congressional Relations

Orice Williams Brown, Managing Director, WilliamsO@gao.gov, (202) 512-4400,
U.S. Government Accountability Office, 441 G Street NW, Room 7125,
Washington, DC 20548

Public Affairs

Chuck Young, Managing Director, youngc1@gao.gov, (202) 512-4800
U.S. Government Accountability Office, 441 G Street NW, Room 7149
Washington, DC 20548

Strategic Planning and External Liaison

Stephen J. Sanford, Acting Managing Director, spel@gao.gov, (202) 512-4707
U.S. Government Accountability Office, 441 G Street NW, Room 7814,
Washington, DC 20548



Please Print on Recycled Paper.