National Transportation Safety Board

Fiscal Year 2027 Budget Request

National Transportation Safety Board

Office of the Chairwoman

Washington, DC 20594

April 3, 2026

The Honorable JD Vance
President
United States Senate
Washington, DC 20510

The Honorable Mike Johnson
Speaker
United States House of Representatives
Washington, DC 20515

Dear Mr. President and Mr. Speaker:

On behalf of the National Transportation Safety Board (NTSB) and in compliance with Office of Management and Budget (OMB) guidance, please find enclosed the budget submission of the National Transportation Safety Board (NTSB) for fiscal year (FY) 2027. We are grateful to President Trump, the Administration, and Congress for their steadfast support of the NTSB's critical safety mission. The budget submission reflects the President's request of $187 million: $145 million in authorized appropriations to fund 445 full-time equivalents and 450 positions for FY 2027, as well as $42 million in one-time, directed funding for relocation of NTSB headquarters.

As stated, our FY 2027 submission includes a one-time funding request of $42 million for necessary expenses related to relocating NTSB headquarters, including physical labor and any costs to move or replace furniture, fixtures, and equipment, and will remain available until September 30, 2031. This funding will support the design, construction, and relocation costs associated with replacing the Washington, DC, headquarters (470/490 L'Enfant Plaza SW) and public investigative hearing/Board meeting center (429 L'Enfant Plaza) leases. The following costs associated with the lease recompete and relocation include the following:

- $30.4 million for design and construction;
- $10.7 million for relocation expenses, including information technology (IT)/telecommunications, furniture, furnishings and equipment, and security infrastructure; and
- $0.9 million for the Government Services Administration administrative fee (3 percent).

Absent the one-time funding for this critical requirement, the agency would be compelled to significantly reduce safety-related staffing levels, adversely affecting our ability to carry out our statutory public safety mission.

The requested funding reflects the agency's current staffing requirements, as retirements and other departures, combined with the federal civilian hiring freeze enacted in FY 2025, have reduced staffing levels from a high of 445 employees in FY 2024 to 416 employees as of September 30, 2025, with more departures anticipated in FY 2026.

As you will see, the vast majority of the agency's budget is devoted to our workforce. We rely on a workforce of highly skilled individuals in transportation safety to carry out mission-critical work (24 hours a day, 7 days a week) to deliver comprehensive, timely, and concise investigation outcomes and safety recommendations to protect life and property and prevent future transportation-related accidents, incidents, and injuries. Our requested resources will also allow us to sustain human capital investments and retain our highly technical and professional staff.

The NTSB is an independent federal agency charged by Congress with investigating every civil aviation accident in the United States and significant events in the other modes of transportation: railroad, transit, highway, marine, pipeline, and commercial space. We determine the probable causes of the accidents and events we investigate, and issue safety recommendations aimed at preventing future occurrences. In addition, we conduct transportation safety research studies and offer information and other assistance to family members and survivors for each accident or event we investigate. We also serve as the appellate authority for enforcement actions involving aviation and mariner certificates issued by the FAA and the US Coast Guard and adjudicate appeals of civil penalty actions taken by the FAA.

This submission highlights our agency's mission accomplishments in the past year, as well as initiatives that will continue to improve our processes and products well into the future. The NTSB has already taken myriad actions to improve service for the American people and streamline our operations. This request will allow us to continue to modernize our IT systems to improve the efficiency, timeliness, and accuracy of our investigations, enabling us to achieve more effective outcomes and support mandated cybersecurity enhancements that will protect our systems against increasingly sophisticated cyber threats and ensure compliance with federal standards.

We are grateful to have the opportunity to invest our resources in people and processes that help make transportation safer for the public. As we submit this budget for your consideration, there is no shortage of work for the NTSB. We continue to lead and support the investigations of over 1,300 new domestic transportation accidents and incidents, including the ongoing investigations of the midair collision of an Army Black Hawk helicopter and PSA Airlines flight 5342 in Washington, DC, on January 29, 2025, and the UPS MD-11 crash during takeoff in Louisville, Kentucky, on November 4, 2025. We remain committed to delivering transportation disaster assistance to over 3,600 accident survivors, family members of

fatally injured passengers, and family contacts associated with our investigations, and to lead and support over 450 new foreign accident and incident investigations as an accredited representative. Full FY 2027 funding at the requested level of $145 million, as well as the one-time funding of $42 million, will ensure sustained support for this critical mission and cover the costs of replacing the Washington, DC, headquarters and the public investigative hearing/Board meeting center leases.

Sincerely,

Jennifer L. Homendy
Chairwoman

Enclosures

cc: The Honorable Steve Womack
Chair
Subcommittee on Transportation, Housing and Urban Development, and Related Agencies
Committee on Appropriations
US House of Representatives

The Honorable James Clyburn
Ranking Member
Subcommittee on Transportation, Housing and Urban Development, and Related Agencies
Committee on Appropriations
US House of Representatives

The Honorable Cindy Hyde-Smith
Chair
Subcommittee on Transportation, Housing and Urban Development, and Related Agencies
Committee on Appropriations
US Senate

The Honorable Kristen Gillibrand
Ranking Member
Subcommittee on Transportation, Housing and Urban Development, and Related Agencies
Committee on Appropriations
US Senate

National Transportation Safety Board

Fiscal Year 2027
Budget Request

National Transportation Safety Board
490 L'Enfant Plaza, SW
Washington, DC 20594
www.ntsb.gov

CONTENTS

ABBREVIATIONS, ACRONYMS, AND INITIALISMS

ADS–B	automatic dependent surveillance–broadcast
AI	artificial intelligence
API	Application Programming Interface
ATC	air traffic control
BNSF	BNSF Railway
CAF	Case Appeals Filing System
CAROL	Case Analysis and Reporting Online
CDO	chief data officer
CDS	chief data scientist
CFR	*Code of Federal Regulations*
CIDER	Crash Investigation Data Extraction and Readout
CSX	CSX Transportation
CTA	Chicago Transit Authority
CVR	cockpit voice recorder
DCA	Ronald Reagan Washington National Airport
DOT	US Department of Transportation
DREAM	Data Recorders, Electronics, and Analysis Management
EO	executive order
EEO	equal employment opportunity
Evidence Act	Foundations for Evidence-Based Policymaking Act of 2018
FAA	Federal Aviation Administration
FDR	flight data recorder

FISMA	Federal Information Security Management Act
FMCSA	Federal Motor Carrier Safety Administration
FOIA	Freedom of Information Act
FRA	Federal Railroad Administration
FTE	full-time equivalent
FY	fiscal year
GSA	General Services Administration
HCT	Office of Human Capital Management and Training
HRRC	Housatonic Railroad Company
ICAO	International Civil Aviation Organization
IIC	investigator-in-charge
IT	information technology
LMS	learning management system
LRD	load reduction device
MED	mid exit door
MEDICS	Medical Information Catalog System
NARA	National Archives and Records Administration
NHTSA	National Highway Traffic Safety Administration
NS	Norfolk Southern Railway
NTSB	National Transportation Safety Board
OMB	Office of Management and Budget
PBE	protective breathing equipment
Pub. L.	Public Law
PMA	Product Management Application

PREVIEW	Protected Recording Viewer
RAPT-R	Rome Audio Processing Tool-Revision
RWIC	roadway worker-in-charge
SAFTI	System for Analysis of Federal Transportation Investigations
SES	Senior Executive Service
SEPTA	Southeastern Pennsylvania Transportation Authority
SL	senior level
SLC	Salt Lake City International Airport
SSA	Safe Skies for Africa
ST	scientific and professional
SUV	sport utility vehicle
TMF	Technology Modernization Fund
UAS	unmanned aircraft system (drone)
UGI	UGI Corporation
UP	Union Pacific Railroad
US	United States
U.S.C.	*United States Code*
Vne	never exceed speed

EXECUTIVE SUMMARY

The National Transportation Safety Board (NTSB) is an independent federal agency charged by Congress with investigating every civil aviation accident in the United States and significant events in the other modes of transportation—railroad, transit, highway, marine, pipeline, and commercial space. We determine the probable causes of the accidents and events we investigate and issue safety recommendations aimed at preventing future occurrences. In addition, we conduct transportation safety research studies and offer information and other assistance to family members and survivors for each accident or event we investigate. We also serve as the appellate authority for enforcement actions involving aviation and mariner certificates issued by the Federal Aviation Administration (FAA) and US Coast Guard, and we adjudicate appeals of civil penalty actions taken by the FAA.

The enclosed budget submission reflects the president's request of $187 million and funds 445 full-time equivalents (FTEs) and 450 positions for fiscal year (FY) 2027. This funding level reflects a $42 million increase from the FY 2026 Annualized Continuing Resolution amount of $145 million and an increase of $36 million from the amount authorized for the NTSB in the FAA Reauthorization Act of 2024 (Public Law [Pub. L.] 118-63) amount of $151 million. Our FY 2027 request includes $42 million of one-time funding for necessary expenses related to the relocation of NTSB Headquarters facilities including any related furniture, fixtures, equipment, and physical move and shall remain available until September 30, 2031.

We have seen, and public safety has benefited from, an increase to our annual appropriations from $129.3 million in FY 2023 to $145 million in FY 2025. As a result of these funding increases and exemptions from the hiring freeze, the agency has been able to make much needed and meaningful progress in addressing staffing needs in our investigative offices. As an agency, we rely on a workforce of highly skilled individuals with technical expertise in the areas of aerospace, electrical, and mechanical engineering; chemistry; metallurgy; human performance; and other specialized fields to conduct accident investigations and identify life-saving safety improvements. However, to be able to carry out our mission-critical work, we must have a fully staffed and trained workforce in our investigative and operational offices ready to respond to more than 1,300 new domestic and approximately 450 new foreign accidents and incidents per year, 24 hours a day, 7 days a week, and deliver comprehensive, timely, and concise investigation outcomes and safety recommendations to protect life and property and prevent future transportation-related accidents, incidents, and injuries from occurring.

We greatly appreciate the funding provided in the FY 2025 Continuing Appropriations and Extensions Act, which supplied us with the resources necessary to fill essential staffing vacancies of investigators and other key staff vital to fully performing the NTSB's mission. Over the past two decades, the transportation industry has undergone a profound technological transformation, introducing increasingly more complex systems such as those using advanced automation, electrification, artificial intelligence, and data analytics. These innovations, while promising improved safety and efficiency, have also introduced new investigative challenges. To uphold our role as the world's leading transportation safety agency, we must continue to invest in the personnel, tools, and training necessary to understand and assess these evolving technologies. Timely and thorough investigations are critical to issuing recommendations that prevent future accidents and drive safety improvements across all modes of transportation. Continued funding will ensure we are equipped to meet the demands of tomorrow's transportation landscape without compromising our mission or delaying safety outcomes.

In support of President Trump's commitment to maximize the efficient use of government resources, the NTSB has taken myriad actions intended to improve service for the American people, increase productivity, and reduce spending on contracts and other purchases. The agency reviewed all positions to ensure they are necessary to efficiently and effectively carry out our public safety mission and has reduced spending through rescoping, renegotiating, or terminating contracts. These reforms aim to optimize agency operations, streamline processes, and use federal resources efficiently.

To keep pace with rapidly advancing transportation technologies, we will continue to train our personnel and develop their expertise, ensuring our workforce is well equipped to address evolving safety and operational challenges. Our requested resources will also allow us to sustain human capital investments and retain our highly technical and professional staff who specialize in transportation safety. We will continue to modernize our internal information technology (IT) systems to improve the efficiency, timeliness, and accuracy of our investigations, enabling better use of resources and more effective outcomes. This funding will also support mandated cybersecurity enhancements to protect our internal systems against increasingly sophisticated cyber threats and ensure compliance with federal cybersecurity standards.

This budget request highlights the accomplishments of all our offices in supporting the agency's work as we continue to be a global leader in promoting transportation safety across the world. We appreciate the support of this administration and the resources provided to us, and we are eager to meet the challenges of continuing to serve as a worldwide leader in promoting

transportation safety. Funding at the full request level of $187 million supports our important mission now and in the future.

MISSION AND ORGANIZATION OVERVIEW

Since its creation in 1967 as an accident investigation agency within the newly created US Department of Transportation (DOT), the NTSB's mission has been to determine the probable causes of transportation accidents and incidents and to formulate safety recommendations to improve transportation safety. Our authority currently extends to the following types of accidents:

- All US civil aviation accidents and certain public aircraft accidents.
- Select highway crashes and highway–rail grade-crossing collisions.
- Railroad accidents involving passenger trains and accidents involving freight trains that result in fatalities or significant property damage.
- Major marine casualty accidents and any marine accident involving both a public and a nonpublic vessel.
- Pipeline accidents involving fatalities, substantial property damage, or significant environmental damage.
- Select accidents resulting in the release of hazardous materials in any mode of transportation.
- Select transportation accidents that involve problems of a recurring nature or that are catastrophic, including defined commercial space mishaps.

In 1974, Congress passed the Independent Safety Board Act, which severed the NTSB's ties to the DOT and authorized the agency to take the following additional actions:

- Evaluate the effectiveness of government agencies involved in transportation safety.
- Evaluate the safeguards used in the transportation of hazardous materials.
- Evaluate the effectiveness of emergency responses to hazardous materials accidents.
- Conduct special studies on transportation safety problems.
- Maintain an official US census of aviation accidents and incidents.
- Review appeals from individuals and entities who have been assessed civil penalties by the FAA.
- Decide on appeals of enforcement actions by the FAA and US Coast Guard and certificate denials by the FAA.

The NTSB also leads US teams assisting in international aviation accident investigations conducted by foreign authorities under the provisions of the International Civil Aviation Organization (ICAO). In 1996, the Aviation Disaster Family Assistance Act assigned the NTSB the additional responsibility of coordinating federal government resources to support local and state governments, disaster relief organizations, and transportation carriers to address the concerns of accident survivors and family members following air carrier accidents that have occurred in the United States or its territories resulting in a loss of life (Title 49 *United States Code* [*U.S.C.*] section 1136). The rail passenger disaster family assistance provisions of the Rail Safety Improvement Act of 2008 assigned the NTSB similar responsibilities for rail passenger disasters resulting in a loss of life (Title 49 *U.S.C.* section 1139). In 2018, our reauthorization expanded our family assistance responsibilities, obligating the agency, to the maximum extent practicable, to provide information regarding NTSB investigative processes and products to the families of individuals involved in any accidents we investigate before we provide this information to the media (Title 49 *U.S.C.* section 1140).

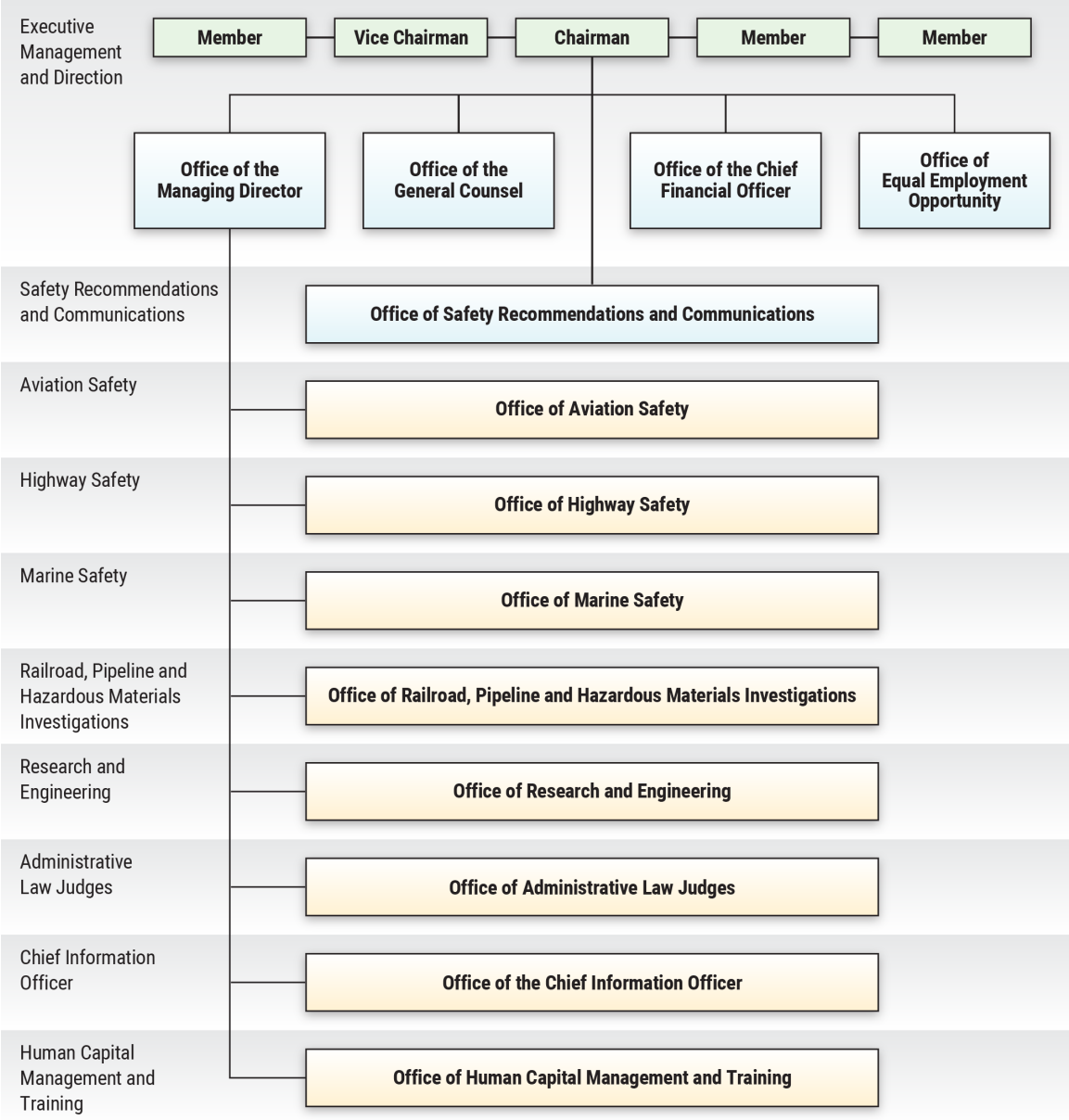
As of September 30, 2025, the NTSB has investigated about 153,000 aviation accidents and incidents in the United States, assisted on more than 8,600 foreign aviation events, and investigated thousands of surface transportation accidents. On call 24 hours a day, 365 days a year, our investigators have traveled throughout the United States and to every corner of the world to do their work. Because of this dedication, we are recognized as the world's leading accident investigation agency. We have issued 15,682 safety recommendations derived from the findings of NTSB investigations to more than 2,500 recipients in all transportation modes.

We are not authorized to regulate transportation equipment, personnel, or operations, or to initiate enforcement action. However, because of our reputation for objectivity and thoroughness, many safety features currently incorporated into airplanes, helicopters, automobiles, commercial motor vehicles, trains, pipelines, marine vessels, and space vehicles, in addition to numerous operational safety measures and the design and inspection of our nation's infrastructure, had their genesis in NTSB safety recommendations. Additional information about the status of our safety recommendations is provided in Appendix B.

Our five-member Board comprises appointees nominated by the president and confirmed by the Senate. A chairman (one of the five members, nominated to this position by the president and confirmed by the Senate) serves as the chief executive officer and chief administrative officer of the NTSB. The president designates another member as vice chairman.

The NTSB is headquartered in Washington, DC. We also have staff stationed at offices in Aurora, Colorado; Anchorage, Alaska; and Federal Way, Washington; as well as other locations throughout the country.

Program Activity and Organization Structure



RESOURCE REQUIREMENTS

Appropriations Language

Salaries and Expenses – 424-2026-2026-0310

"For necessary expenses of the National Transportation Safety Board, including hire of passenger motor vehicles and aircraft; services as authorized by 5 *U.S.C.* 3109, but at rates for individuals not to exceed the per diem rate equivalent to the rate for a GS-15; uniforms or allowances therefore, as authorized by law (5 *U.S.C.* 5901-5902), *$187,000,000* [$145,000,000]*, of which, $42,000,000 is for necessary expenses related to the relocation of NTSB Headquarters facilities including any related furniture, fixtures, equipment, and physical move and shall remain available until September 30, 2031, and* of which not to exceed $1,000 may be used for official reception and representation expenses."

Appropriations Language for Emergency Fund

Emergency Fund – 424-X-0311

No new funding is being requested for the Emergency Fund in fiscal year (FY) 2027.

NATIONAL TRANSPORTATION SAFETY BOARD
SALARIES AND EXPENSES

Obligations by Object Classification ($000s)

Personnel Compensation & Benefits	FY 2025	FY 2026	FY 2027
11.1: Permanent Positions	65,992	70,651	71,232
11.3: Positions Other Than Permanent	2,482	2,979	3,003
11.5: Other Personnel Compensation	3,725	3,975	4,005
Total Personnel Compensation	72,199	77,605	78,240
12.1: Personnel Benefits	26,599	28,432	28,932
Subtotal, Personnel Compensation & Benefits	**98,798**	**106,037**	**107,172**

Other Than Personnel Compensation & Benefits	FY 2025	FY 2026	FY 2027
21.0: Travel & Transportation of Persons	3,270	3,450	3,519
22.0: Transportation of Things	104	107	109
23.1: Rental Payments to General Services Administration	10,619	11,154	11,477
23.2: Rental Payments to Others	214	218	222
23.3: Communications, Utilities, & Miscellaneous Charges	880	943	961
24.0: Printing & Reproduction	87	89	91
25.0: Other Contractual Services	24,654	19,531	21,400
26.0: Supplies & Materials	763	825	841
31.0: Equipment	4,166	2,646	9,883
32.1: Lands and Structures	289	-	31,325
Subtotal, Other Than Personnel Compensation & Benefits	**45,046**	**38,963**	**79,828**
99.9: Total Obligations	**143,844**	**145,000**	**187,000**

Personnel Summary:	FY 2025	FY 2026	FY 2027
Full-Time Equivalents	421	445	445
Positions	450	450	450

NATIONAL TRANSPORTATION SAFETY BOARD
SALARIES AND EXPENSES

Obligations by Program Activity ($000s)

Program Activities	FY 2025	FY 2026	FY 2027
Executive Management and Direction	26,109	26,238	26,221
Safety Recommendations & Communications	10,399	10,446	9,967
Aviation Safety	39,747	39,962	39,932
Information Technology & Services	9,813	9,855	9,849
Research & Engineering	16,401	16,911	16,999
Administrative Law Judges	3,104	3,115	3,586
Highway Safety	11,001	11,060	11,052
Marine Safety	6,887	6,925	6,920
Railroad, Pipeline & Hazardous Materials Investigations	15,245	15,326	15,315
Human Capital Management & Training	5,138	5,162	5,159
NTSB Headquarters Facilities Relocation	-	-	42,000
Total	**143,844**	**145,000**	**187,000**

NATIONAL TRANSPORTATION SAFETY BOARD
SALARIES AND EXPENSES

FTEs and Positions by Program Activity

	FY 2025		FY 2026		FY 2027	
Program Activities	**FTEs**	**Pos.**	**FTEs**	**Pos.**	**FTEs**	**Pos.**
Executive Management and Direction	76	80	80	80	80	80
Chairman, Vice Chairman, Board Members	*14*	*17*	*17*	*17*	*17*	*17*
Office of the Managing Director	*34*	*34*	*34*	*34*	*34*	*34*
Office of the General Counsel	*10*	*10*	*10*	*10*	*10*	*10*
Office of the Chief Financial Officer	*17*	*18*	*18*	*18*	*18*	*18*
Office of Equal Employment Opportunity	*1*	*1*	*1*	*1*	*1*	*1*
Safety Recommendations & Communications	32	29	29	29	27	27
Aviation Safety	118	133	132	133	132	133
Information Technology & Services	26	26	26	26	26	26
Research and Engineering	45	49	48	49	48	49
Administrative Law Judges	10	7	7	7	9	9
Highway Safety	33	37	36	37	36	37
Marine Safety	22	24	23	24	23	24
Railroad, Pipeline & Hazardous Materials Investigations	45	50	49	50	49	50
Human Capital Management & Training	14	15	15	15	15	15
NTSB Headquarters Facilities Relocation	-	-	-	-	-	-
Total	**421**	**450**	**445**	**450**	**445**	**450**

NATIONAL TRANSPORTATION SAFETY BOARD
SALARIES AND EXPENSES

Analysis of Changes – FY 2026 to FY 2027 ($000s)

$ 567 Staffing Changes

The requested funding level accounts for promotions and within-grade increases and provides for an FTE level of 445, which is consistent with the FTE level supported by the FY 2026 President's Budget Request funding level.

$ 249 Pay Increase

Funds to cover the prorated impact of the 2026 1-percent pay raise that went into effect January 1, 2026 and assumes no pay raise in FY 2027.

$ 319 Other Personnel Compensation Increase

Funds to cover other personnel-related compensation, including the FY 2027 increase to employee health benefits contributions.

$ 469 Nonpay Inflation

Inflationary factor of 2 percent is used for nonpay inflation based on economic assumptions for discretionary programs.

$ (1,604) Operational Decrease

Increases in GSA lease expenses offset by a reduction in contractual services, IT system modernization, and investigative equipment expenses.

$ 42,000 NTSB Headquarters Facilities Relocation

Request is for necessary expenses related to the relocation of NTSB Headquarters facilities including any related furniture, fixtures, equipment, and physical move.

$ 42,000 Total

Summary of Changes

$ 145,000	FY 2026 Level (supports 445 FTEs/450 positions)
$ 42,000	Total Increase/Decrease
$ 187,000	FY 2027 Level (supports 445 FTEs/450 positions)

NATIONAL TRANSPORTATION SAFETY BOARD
SALARIES AND EXPENSES

Non-Senior Executive Service/Senior Level/Scientific and Professional Awards

The following information outlines estimated non-Senior Executive Service/senior level/scientific and professional (non-SES/SL/ST) awards spending as a percentage of non-SES/SL/ST salary spending for FY 2025, FY 2026, and FY 2027.

Fiscal Year	Non-SES/SL/ST Salary Spending ($000s)	Awards
FY 2025 Actual	$62,338	2.3%
FY 2026 Request	$67,414	2.3%
FY 2027 Request	$67,999	2.3%

NTSB HEADQUARTERS FACILITIES RELOCATION

Fiscal Year	($000s)	FTEs	Pos.
FY 2026 Estimate	-	-	-
FY 2027 Request	$42,000	-	-
Increase/Decrease	$42,000	-	-

Overview of the Request

The NTSB requests one-time funding of $42 million to fund the lease recompete process required by the GSA for the agency's new headquarters. The new lease will provide space for agency personnel offices and workstations, forensic laboratories, and facilities to support public investigative hearings/board meetings, and training operations. This action will replace the agency's current headquarters lease at 470/490 L'Enfant Plaza, SW and the public investigative hearing/board meeting center at 429 L'Enfant Plaza, SW.

The requested funding supports all costs associated with the lease recompete and relocation. These costs include $30.4 million for design and construction; $10.7 million for relocation expenses, including IT/telecommunications, furniture, furnishings and equipment, and security infrastructure; and $0.9 million for the GSA administrative fee (3 percent). Cost estimates are based on a micro program-of-requirements study conducted by GSA.

The costs associated with replacing the agency's headquarters and public investigative hearing/ board meeting center would represent more than 29 percent of the FY 2026 annualized Continuing Resolution amount of $145.0 million. As a small, mission-focused agency, approximately 74 percent of the NTSB's annual budget supports employee compensation. Absent one-time funding for this critical requirement, the agency would be compelled to significantly reduce safety-related staffing levels, adversely affecting its ability to carry out its statutory public safety mission.

EXECUTIVE MANAGEMENT AND DIRECTION

Fiscal Year	($000s)	FTEs	Pos.
FY 2026 Estimate	$26,238	80	80
FY 2027 Request	$26,221	80	80
Increase/Decrease	($17)	-	-

Overview of the Request

The requested funding level assumes no pay raise in FY 2027 and incorporates modest, targeted reductions in operational expenses, with a focus on internal efficiencies, to partially offset a projected 2-percent increase in nonpay inflationary costs. These adjustments are designed to preserve core mission capabilities and sustain priority activities while limiting growth in administrative support costs.

Program Description

The executive management and direction program resources fund the Offices of the Chairman, Vice Chairman, and Members of the Board, as well as the Offices of the Managing Director, General Counsel, Chief Financial Officer, and Equal Employment Opportunity. Collectively, these offices provide overall leadership, management, and direction for the NTSB.

Chairman, Vice Chairman, and Board Members

The chairman serves as the chief executive officer and chief administrative officer for the agency. The chairman, vice chairman, and Board members participate in NTSB Board meetings; review and approve NTSB reports, special studies, and safety recommendations; provide appellate review of FAA certificate and certain civil penalty actions, as well as US Coast Guard license actions; and act as spokespersons at accident scenes. They also advocate for specific safety recommendations with the transportation community, other federal agencies, state and local governments, and the public.

Office of the Managing Director

The Office of the Managing Director assists the chairman in managing the day-to-day operations of the agency and performs the agency's executive, investigative, and administrative functions to ensure maximum operational effectiveness. The office coordinates staff activities, develops operational procedures, and establishes plans to achieve program objectives. In addition,

the office develops and oversees the implementation of agency-level performance and operating plans, including initiatives to improve agency processes and accountability. As the agency's chief operating officer, the managing director is responsible for the overall leadership, direction, and performance of the agency. In this capacity, the managing director oversees the following:

- Strategic planning, performance management, and data programs (through the chief data officer [CDO])
- The Occupational Safety and Health program
- The Office of Administrative Law Judges
- Operations and administrative programs (through the principal deputy managing director for management and operations)
- Transportation investigations and functions (through the deputy managing director for investigations)

Consistent with the Foundations for Evidence-Based Policymaking Act of 2018 (Evidence Act), the Office of the Managing Director (through the CDO) spearheads strategic planning efforts and uses data to ensure that the agency's objectives and performance outcomes are driven and measured by accurate and timely information. Additionally, the CDO evaluates agency programs, administers the agency's enterprise risk management program, and provides recommendations to the managing director and the chairman to improve organizational efficiency, effectiveness, and procedural compliance. The CDO promotes a data-driven culture by facilitating data sharing, informed decision-making, and data literacy among employees. The NTSB maintains a Data Governance Body (DGB), consistent with the Evidence Act and OMB's memorandum M-25-21, to provide enterprise guidance and direction for achieving data analytics and artificial intelligence (AI) management objectives. As chairman of the Data Governance Board, the CDO advances data science techniques, including machine learning and AI, to anticipate and address emerging transportation safety trends and agency business needs.

The chief data scientist (CDS) reports to the CDO and supports agencywide efforts to better use data for strategic decision-making. The CDS is also the agency's chief AI officer and is responsible for applying machine learning, AI, and advanced data science methods and techniques to support agency investigations and research; analyzing and reporting emerging transportation safety trends; and monitoring agency operational performance.

The Occupational Safety and Health Division ensures agency compliance with the Occupational Safety and Health Act of 1970 and other occupational federal, state, and local statutory and regulatory mandates,

guidelines, standards, and procedures, and ensures safe working conditions for NTSB employees (both in the office and on scene during investigations). This includes planning, implementing, and evaluating the agency's safety and health program to reduce the potential for human and economic losses associated with our work on incident and accident scenes. The division chief tri-chairs the agency's Safety and Security Committee and directs the implementation and oversight of multiple programs to minimize agency safety risks, including the agency's on-site risk assessment, peer support, employee wellness, and launch clinician programs.

The principal deputy managing director for management and operations manages and oversees the agency's operations and administrative programs, including the agency's real property leases for the NTSB headquarters and regional offices as well as the following offices and divisions:

- Executive Secretariat Division
- Administrative Operations and Security Division
- Transportation Disaster Assistance Division
- Office of the Chief Information Officer
- Office of Human Capital Management and Training

The Executive Secretariat Division coordinates all official written material sent to and created by the agency. The division is responsible for the following:

- Managing Board voting processes in accordance with the Government in the Sunshine Act and agency directives.
- Issuing *Federal Register* notices.
- Coordinating executive-level reviews of Board products, such as investigation reports, operational procedures, and agency strategy documents.
- Controlling, monitoring, processing, and distributing all official agency correspondence.
- Standardizing and providing procedural guidance to Board members, the managing director, office directors, and their staff.
- Archiving official agency records related to Board actions.
- Writing and editing correspondence, agency reports, and other documents for the Board, the managing director, and agency offices.

The Administrative Operations and Security Division manages the NTSB's facilities and building management program, including physical and personnel security, property and space management, facilities maintenance, mail services, and fleet vehicle transportation. The division also operates and maintains the NTSB's Boardroom, which is used to conduct the agency's Government in the Sunshine Act meetings and other Board-related events in an open forum for public attendance.

The Transportation Disaster Assistance Division ensures that the agency meets its statutory obligations under Title 49 *U.S.C.* sections 1136, 1139, and 1140. The division coordinates federal government resources to support local and state governments, disaster relief organizations, and transportation carriers to offer services and information to family members and survivors following major aviation and rail accidents. Division staff serve as the primary source of investigative information for family members and survivors for any accident investigated by the NTSB. The division provides direct investigative support to the modal offices by interfacing with survivors, family members, public safety agencies, medicolegal authorities, and healthcare systems for the collection and receipt of investigative evidence and information. Division staff also serve as a subject matter resource to the agency's employee assistance program. Additional information on division activities is provided in Appendix C.

The deputy managing director for investigations oversees the agency's transportation investigations and functions, including the following offices and division:

- Office of Aviation Safety
- Office of Highway Safety
- Office of Marine Safety
- Office of Railroad, Pipeline and Hazardous Materials Investigations
- Office of Research and Engineering
- Special Operations Division, which is responsible for the following:
    - Serving as the primary interagency liaison with the Federal Bureau of Investigation; federal, state, and local emergency response organizations; and other pertinent first responder agencies.
    - Helping public safety agencies better prepare their response to transportation disasters.
    - Overseeing the Response Operations Center, which provides support 24 hours a day, 365 days a year for agencywide operational requirements, including accident launches and

collecting and disseminating information related to transportation accidents and incidents.

- Coordinating and managing the agency's Evidence Management Program and the Unmanned Aircraft Systems (UAS) Program to support accident scene documentation.
- Coordinating the NTSB's Official Passport Program and ensuring the agency follows all Department of State protocols and processes for obtaining and maintaining official passports.
- Managing the agency's continuity of operations plans and interfacing with the Federal Emergency Management Agency to ensure readiness and compliance.

Office of the General Counsel

The General Counsel serves as the agency's chief legal officer, ensuring the NTSB's statutory responsibilities are implemented and acting as the Designated Agency Ethics Official (DAEO). The Office of the General Counsel advises NTSB officials on legal and operational issues arising under the NTSB's governing legislation and regulations, as well as on other related legal matters. The office is also responsible for the following:

- Providing legal support to all NTSB modal offices and corresponding safety investigations, programs, and activities to ensure the effective and efficient operation of the NTSB.
- Issuing subpoenas on behalf of the chairman, to gather the appropriate evidence needed in NTSB safety investigations.
- Coordinating with other federal and state agencies that have parallel investigative roles related to accidents that the Board investigates to ensure that the NTSB maintains its lead federal agency role, as set forth in 49 *U.S.C.* section 1131 and applicable regulations.
- Providing the Board with legal and drafting support as it issues opinions and orders related to reviews on appeal of enforcement actions by the FAA and US Coast Guard and certificate denials by the FAA.
- Administering the agency's Ethics Program, including annual financial disclosure programs for General Schedule and SES employees and the Annual Ethics Training Program, and providing highly technical advice and assistance to Board members.
- Providing support related to Board governance, including public Board meeting compliance with the Sunshine Act as well as open

meetings and nonpublic collaborative discussions of the Board consistent with 49 *U.S.C.* section 1111(k).

- Launching in support of complex on-scene accident investigations and providing internal legal assistance and guidance on all other aspects of NTSB accident and incident investigations, such as hearings, witness appearances, acquiring evidence by subpoena and other means, and taking depositions.
- Making determinations about the release of official information for use in litigation not involving the United States and coordinating with the Department of Justice (DOJ) and assistant US attorneys across the United States to intervene in civil litigation as necessary to protect NTSB investigative information.
- Ensuring compliance with statutes concerning public access to information through publication of NTSB decisions and releases under the Freedom of Information Act (FOIA).
- Representing the NTSB (or assisting the Department of Justice) in administrative and judicial forums, including the US Equal Employment Opportunity Commission, the Merit Systems Protection Board, and US district courts in personnel matters and litigation arising from the agency's accident investigations, and in other matters and litigation in which the agency has an interest.
- Reviewing contracts and acquisition documents and files and providing fiscal law support to enable proper use of appropriated funds and compliance with the Anti-Deficiency Act (31 *U.S.C.* 1341).
- Supporting the Board's use of its "Other Transactions" authority under 49 *U.S.C.* (b)(1)(B) and its other statutory authorities within 49 *U.S.C.* 1113(B) – Additional Powers. This includes assisting the Office of the Chief Financial Officer with obtaining and processing reimbursement from third parties for the provision of facilities, accident-related and technical services, or training as authorized by 49 *U.S.C.* 1113(b)(1)((I).
- Reviewing and dispositioning, in coordination with Department of Justice as appropriate, claims made against the agency under the Federal Tort Claims Act.

Office of the Chief Financial Officer

The Office of the Chief Financial Officer manages the NTSB's financial resources, develops the agency's budget requests for submission to the OMB and Congress, and executes the budget for resources Congress appropriates to the NTSB. The office is also responsible for the following:

- Preparing the agency's financial statements, as required by the Accountability of Tax Dollars Act.
- Overseeing property- and inventory-control programs and the NTSB's travel and purchase card programs.
- Managing agency accounting and financial practices.
- Overseeing internal controls to comply with the requirements of the Federal Managers' Financial Integrity Act.
- Managing the NTSB acquisition program.
- Awarding and administering contracts and agreements.
- Awarding real property leases for the NTSB headquarters and regional offices.
- Providing internal customers with acquisition guidance and training.

Office of Equal Employment Opportunity

The Office of Equal Employment Opportunity (EEO) advises and assists the chairman and NTSB office directors in carrying out their responsibilities related to Title VII of the Civil Rights Act of 1964, as amended, and other laws, executive orders (EOs), EEO complaint processing, and reasonable-accommodation requests. These services are provided to agency managers, employees, and job applicants. To maintain the integrity and impartiality of the EEO complaints resolution program, the agency contracts with external EEO counselors and investigators to help employees and job applicants who file formal or informal complaints of alleged discrimination. In addition, the office manages the agency's alternative dispute resolution and American Sign Language interpretation programs and provides required educational compliance training to NTSB staff.

SAFETY RECOMMENDATIONS AND COMMUNICATIONS

Fiscal Year	($000s)	FTEs	Pos.
FY 2026 Estimate	$10,446	29	29
FY 2027 Request	$9,967	27	27
Increase/Decrease	($479)	(2)	(2)

Overview of the Request

The requested funding level assumes no pay raise in FY 2027 and incorporates modest, targeted reductions in operational expenses, with a focus on internal efficiencies, to partially offset a projected 2-percent increase in nonpay inflationary costs. These adjustments are designed to preserve core mission capabilities and sustain priority activities while limiting growth in administrative support costs. In addition, through normal attrition, the request reflects a reduction of two FTEs/positions that will be transferred to the Office of Administrative Law Judges to address operational needs within their office.

Program Description

The Office of Safety Recommendations and Communications comprise of four divisions: Media Relations, Government and Industry Affairs, Safety Recommendations, and Investigative Support Services. The office ensures that information regarding NTSB investigations, activities, and safety recommendations is accurately and effectively communicated to a range of stakeholders, including elected officials and their staff at the federal, state, and local levels; industry representatives; media; and the public. The office's mission begins at the scene of an accident, continues through the NTSB accident investigation and the resulting issuance of safety recommendations, and is maintained through outreach efforts to secure favorable action on safety recommendations from the public and private sectors.

Media Relations Division

The Media Relations Division is responsible for the following:

- Serving as the primary point of contact for the release of investigative and other agency information to the public through the media.
- Providing on-scene media relations support to investigators and Board members during and after major accident launches.
- Responding to media inquiries, including facilitating interviews with NTSB subject matter experts.

- Providing formal media relations training for Board members and investigators.
- Providing support for Board meetings, forums, meetings, roundtables, and other special investigative events.
- Fulfilling the responsibilities of the NTSB party agreement for investigations, which states only the NTSB can release investigative information.
- Supporting the Safety Recommendations and Government and Industry Affairs Divisions and the agency's modal offices.

Government and Industry Affairs Division

The Government and Industry Affairs Division is responsible for the following:

- Informing Congress, other federal agencies, and state and local governments about NTSB activities and advising the chairman, vice chairman, Board members, and staff on congressional and legislative matters.
- Coordinating responses to requests for information and assistance from Congress, the White House, the Government Accountability Office, other federal agencies, and state and local governments through correspondence and briefings.
- Supporting the chairman, vice chairman, Board members, and staff with legislative testimony.
- Providing accident launch support to the chairman, vice chairman, Board members, and investigators.
- Monitoring federal and state legislative activity related to NTSB safety recommendations.
- Coordinating the development of NTSB legislative proposals and providing technical assistance to Congress and states drafting legislation.
- Supporting modal offices in planning and executing forums and roundtables.
- Working with Board members and NTSB staff to promote private and public sector action on safety recommendations.
- Developing and maintaining contact with industry and stakeholder organizations and providing information on NTSB activities and safety recommendations as part of the division's outreach efforts.

- Helping staff identify appropriate resources in state and local government to support investigations and other projects.
- Coordinating with the Safety Recommendation Division and modal offices to engage and educate state and local officials on the importance of implementing safety recommendations.

Safety Recommendations Division

The Safety Recommendations Division is responsible for the following:

- Evaluating responses from safety recommendation recipients and drafting classification response letters for Board member review and approval.
- Working with modal offices to develop safety recommendations that are actionable, effective, and measurable, based on the findings of accident investigations and special studies.
- Supporting and tracking safety recommendation implementation.
- Maintaining the safety recommendations database, which includes information on recommendation recipients, status, adoption, and implementation.
- Analyzing safety recommendation status and implementation and generating summary reports.
- Coordinating with the Government and Industry Affairs Division and modal offices to engage and educate federal, state, and local officials on the importance of implementing safety recommendations.

Investigative Support Services Division

The Investigative Support Services Division is responsible for the following:

- Providing on-scene photography and videography support for major investigations, including real-time live streaming of investigative press conferences and mission-critical operations, to ensure comprehensive visual documentation and public communication.
- Producing videos and animations, providing photography support, developing original graphics, and editing images in support of agency activities such as accident launches, investigative product development, and recommendations outreach, among others.

- Support in-person investigative Board meetings and hearings by developing graphics and providing videography and photography support.
- Implementing digital strategies to highlight the NTSB's investigative messages.
- Managing digital communications programs and platforms (website, social media, and visual media) to ensure consistent messaging across various digital channels and agency compliance with digital government policies and orders.
- Providing leadership and guidance regarding digital technology adoption for agency communications programs.

Accomplishments and Ongoing Efforts

Media Relations Division

Between October 1, 2024, and September 30, 2025, the Media Relations Division published 46 news releases and 8 media advisories, which resulted in more than 1.6 million page views on NTSB.gov and more than 684,952 separate news articles or television and radio segments. These mentions included information on major NTSB investigations, such as the midair collision between a passenger flight and a military helicopter near Ronald Reagan Washington National Airport and the crash of an air tour helicopter in Jersey City, New Jersey. Staff also made more than 700 posts on X during this period, gathering more than 22 million views.

The division provided training on media relations and response communications to 70 NTSB staff and delivered 90-minute webinars on NTSB postaccident communications and media relations to more than 100 people at Air Arabia Group and JetBlue Airlines. Singapore Airlines also interviewed a member of the division on the NTSB's mission and processes for an internal podcast that was made available to over a thousand of the airline's employees.

Government and Industry Affairs Division

From October 1, 2024, through September 30, 2025, the Government and Industry Affairs Division supported major accident launches and general aviation regional investigations. The team continued to provide investigative updates to Congress and state and local officials, serving as the main point of contact for additional outreach and inquiries. The division prepared Chairwoman Homendy to testify at two congressional hearings and multiple

briefings regarding the January 29, 2025, midair collision at Washington Reagan National Airport and other major investigations.

The division supported Board member and staff testimony and legislative outreach on impairment in California, Connecticut, Hawaii, North Carolina, Pennsylvania, and Washington; motorcycle helmet use in Maryland; speeding in California, Nevada, New York, and Washington; distracted driving in Pennsylvania; child passenger safety and distracted driving in Montana; commercial vehicle passenger safety in New York; and school bus safety in Illinois, Maryland, Massachusetts, Texas, and Vermont.

Staff helped develop, execute, and promote more than 58 advocacy and outreach activities related to the NTSB's safety priorities and critical safety recommendations. Major activities included hosting a Vulnerable Road User Safety Community meeting, developing and hosting a Teen Driver Safety Masterclass, promoting the Bike-to-School Day DC event, and supporting Board member engagements and presentations at national conferences and industry meetings, including the Transportation Research Board Annual Meeting and the Consumer Electronics Show.

The division amplified NTSB recommendations, safety priorities, and investigative outcomes and lessons learned to industry stakeholders. Staff sent 37 email notifications to more than 145,430 stakeholders and developed hundreds of social and digital media products promoting the agency's safety messages.

Safety Recommendations Division

From October 1, 2024, through September 30, 2025, the Safety Recommendations Division reviewed and analyzed 121 responses from recommendation recipients and developed recommendation classification responses for Board review and approval; participated in 60 outreach meetings to discuss open recommendations with federal, state, and local government agencies, industry organizations, and private companies; and completed 138 emails, and phone calls following up with recipients who had not responded to NTSB safety recommendations.

Staff also coordinated with the modal offices to develop and issue 127 new safety recommendations resulting from 18 investigation reports. In addition, the division developed numerous reports and data summaries on specific recommendation topics to support NTSB Board members, other agency staff, the media, and the public. Staff also participated in five NTSB Board meetings.

Investigative Support Services Division

From October 1, 2024, to September 30, 2025, the Investigative Support Services Division launched to eight major investigations, including the midair collision near Ronald Reagan Washington National Airport (DCA), providing on-scene photography and videography in support of the agency's ongoing communications about the investigations.

Division staff also supported over 150 investigations through updates to the agency's website and working closely with the investigative offices to ensure accurate and timely release of information. Staff also managed the public release of over 90 final investigation reports, coordinating the web posting process with internal stakeholders.

The division supported five Board meetings and three other NTSB events, including the 3-day investigative hearing into the DCA midair collision. Staff completed over 600 graphics and illustrations for use in investigative reports and other products; developed eight major print publications, including the 2024 *Safer Seas Digest*; produced over 60 videos and live video streams; and fulfilled more than 500 website update requests.

The division continues to focus on optimizing the NTSB website and customer service to comply with the requirements in EO 14338: "Improving Our Nation Through Better Design," the 21st Century Integrated Digital Experience Act (Pub. L. 115-336), and all other applicable directives. These improvements cover accessibility, content review, quality control, usability, and customer experience.

AVIATION SAFETY

Fiscal Year	($000s)	FTEs	Pos.
FY 2026 Estimate	$39,962	132	133
FY 2027 Request	$39,932	132	133
Increase/Decrease	($30)	-	-

Overview of the Request

The requested funding level assumes no pay raise in FY 2027 and incorporates modest, targeted reductions in operational expenses, with a focus on internal efficiencies, to partially offset a projected 2-percent increase in nonpay inflationary costs. These adjustments are designed to preserve core mission capabilities and sustain priority activities while limiting growth in administrative support costs.

Program Description

The mission of the Office of Aviation Safety includes the following:

- Investigate all air carrier, commuter, and air taxi accidents and certain serious incidents; fatal and nonfatal general aviation accidents and serious incidents; UAS, advanced air mobility, and public aircraft accidents and serious incidents; and commercial space launch/reentry accidents.
- Participate in the investigation of aircraft accidents that occur in foreign countries involving US carriers, US-manufactured or -designed equipment, or US-registered aircraft, to fulfill US obligations under ICAO.
- Investigate safety issues that extend beyond a single accident to examine specific aviation safety problems from a broader perspective.

The Office of Aviation Safety conducts investigative activities through five specialty divisions based in Washington, DC, and a regional investigation management structure comprising four regions. Investigators are located throughout the country. International aviation activities are coordinated from the Washington, DC, office.

As applicable for domestic accident and incident investigations, a specialist in operational factors, aviation engineering, human performance, survival factors, or other organizational specialty may act as a group chairman

on a major investigation to examine issues in their specialty area. Group chairmen lead their respective groups in a technical investigation of an accident under the direction of the investigator-in-charge (IIC) and produce a factual report that is placed in the agency's public docket. They also produce analytical reports that are used to develop the draft accident report and proposed safety recommendations. NTSB technical specialists may also assist through the US-accredited representative in foreign accident and incident investigations.

Regional Investigations

Regional aviation investigators conduct investigations that primarily involve personal or instructional flights, but also corporate operations, air charter flights, air tours, law enforcement and air medical flights, agricultural operations, and other types of nonpassenger-carrying commercial operations, as well as select incidents. The offices also support general aviation accident investigations that occur in other countries by providing accredited representatives. Regional investigations are often assigned to a single investigator who gathers detailed information and works with party representatives and applicable subject-matter specialists to determine the probable cause of the accident. During each investigation, these investigators consider ways to prevent similar accidents from occurring in the future through the agency's formal safety alert or safety recommendation process or through a more immediate and informal solution (known as a safety accomplishment). In addition, the investigators often support major accident investigations and may identify accidents that have broader safety issues to be addressed in a forum, at a Board meeting, or through a safety research report. Investigators are based throughout the United States and are supported by four regional offices located in Anchorage, Alaska; Federal Way, Washington; Aurora, Colorado; and Washington, DC. A map of the four regional offices is in Appendix D.

Air Carrier and Space Investigations Division

The Air Carrier and Space Investigations Division performs the following functions:

- Provides an IIC for air carrier domestic aircraft accident and incident investigations, certain public aircraft accidents and incidents, commercial space launch/reentry accidents, and UAS accident and incident investigations.
- Prepares comprehensive aviation accident and incident reports and manages aviation investigative hearings, forums, and conferences related to air carrier operations.

- Coordinates and supervises the efforts of NTSB group chairmen and external investigation participants provided by industry, other government agencies, and foreign authorities (for US investigations involving foreign-operated, -registered, -manufactured, or -designed aircraft).
- Provides accredited representatives to help investigate civil aviation accidents that occur in other countries. (The accredited representative informs domestic aviation interests of the progress of an investigation while providing needed technical expertise, as requested, to foreign accident investigation counterparts. The accredited representative also informs the FAA and US industry representatives of issues that may affect US aviation safety or the safety of aircraft or aircraft components manufactured in the United States.)
- Develops investigative techniques and strategies for emerging transportation industries to improve safety. Current areas of development include increasing proficiency in investigating accidents and incidents involving UAS operations, commercial space launch and reentry operations, and advanced air mobility vehicle operations in the US National Airspace System, as well as using small UAS technology to document accident scenes.

Operational Factors Division

The Operational Factors Division examines issues related to air traffic control (ATC), flight operations, and meteorology, such as the following:

- ATC facilities, procedures, and flight handling, including developing flight histories and animations from air route traffic control centers and terminal facility radar records.
- UAS operator or air carrier operations; flight crew or UAS and advanced air mobility pilot training, experience, and operational performance; and FAA surveillance of flight operations.
- Meteorological/environmental conditions that may have caused or contributed to an accident, and pertinent meteorological products, procedures, and services provided by government and industry.
- Commercial space crewmember training, experience, and operational performance.

Aviation Engineering Division

The Aviation Engineering Division examines issues related to powerplants (engines), structures, systems, system safety, and maintenance, such as the following:

- Powerplant components, including the airworthiness of aircraft engines and propellers.
- Integrity of aircraft structures and flight controls, including the adequacy of design and certification.
- Airworthiness of aircraft flight controls and electrical, pneumatic, hydraulic, and avionics systems.
- Hazards and associated safety risks introduced by aircraft equipment failures, including the adequacy of design and certification.
- Service history and maintenance of aircraft systems, structures, and powerplants.
- Airworthiness of helicopters, including powerplants, structures, and control systems.
- Commercial spacecraft engines, structure, and systems.

Human Performance and Survival Factors Division

Human performance specialists assess the knowledge, experience, training, and physical abilities of those whose actions may have caused or contributed to an accident or incident. They review the adequacy of established procedures, examine the work habit patterns and interrelationships among crewmembers and managers to assess organizational factors and safety culture, and investigate the ergonomics of equipment design and the potential effects of that design on operator performance. A human performance investigation may also assess sleep and rest cycles as well as alcohol and other drug use.

Survival factors specialists examine issues that affect accident survival, including the causes of injuries sustained by aircraft occupants or by others. They also examine safety procedures, search-and-rescue operations, crashworthiness, equipment design, emergency response and escape, crewmember emergency procedures training, and airport operations and certification.

Writing and Editing Division

The staff of the Writing and Editing Division manage the development of, write, and edit aviation investigation reports. Staff also write, analyze, and

edit safety alerts, responses to notices of proposed rulemaking, petitions for reconsideration, and general correspondence related to aviation.

Administrative Support Division

The Administrative Support Division is responsible for processing budget, travel, payroll, personnel, timekeeping, procurement, contracting, and purchase card actions for the office.

Accomplishments and Ongoing Efforts

Office accomplishments include issuing products related to transportation safety arising from completed and ongoing investigations. Products completed between October 1, 2024, and September 30, 2025, are highlighted below, along with information about other efforts and focus areas important to our mission.

Investigation Reports

Investigation reports are issued for accident and incident investigations and may contain a probable cause determination and safety recommendations, depending on the scope of the investigation and the safety issues identified. For select, larger scale investigations, the office launches an investigation team and presents a comprehensive investigation report to the Board. Investigations that are limited in scope are primarily intended to determine probable cause; the resultant report may be issued by the office director under delegated authority or may be adopted by the Board. Special investigation reports usually involve analysis of data from multiple accidents centered around a common safety issue and result in safety recommendations. A report containing only safety recommendations can be issued at any time during an investigation. If the Board determines that a recommended course of action requires immediate attention to avoid imminent loss of life from a similar accident, the safety recommendation is designated "urgent."

From October 1, 2024, through September 30, 2025, the Office of Aviation Safety issued a total of 1,182 investigation reports that solely determined probable cause. During this period, the office also published six investigation reports identifying safety issues that led to the issuance of 44 safety recommendations.

Below are summaries of some of the aviation investigation reports completed between October 1, 2024, and September 30, 2025, arranged by report date.

Address Fatigue Cracking in Hydraulic Landing Gear Actuators on Cessna 210 and 210B Airplanes

The NTSB issued a safety recommendation report to address safety issues identified in a selected number of previously completed investigations involving Cessna 210 and 210B landing gear-related events.

Those investigations found the potential for fatigue cracking in certain hydraulic landing gear actuators on Cessna 210 and 210B airplanes. Fatigue cracking in hydraulic landing gear actuators could result in landing gear collapse during critical phases of flight.

The safety issues identified were the lack of adequate inspection criteria, lack of overhaul intervals, and lack of life-limits to detect defects before the hydraulic landing gear actuators progress to fatigue failure.

As a result, the NTSB issued safety recommendations to the FAA and the airplane manufacturer, Textron Aviation.

Recommendations: 2 new
Report Date: September 18, 2025

Improve Wind Detection Capabilities at Salt Lake City International Airport
Salt Lake City, Utah
July 13, 2022

The NTSB issued a safety recommendation report to address issues identified in a previously completed investigation involving a Cessna 208B airplane that was substantially damaged when it was involved in an accident at Salt Lake City International Airport (SLC), Salt Lake City, Utah. The airplane was operated as a Title 14 *CFR* Part 135 cargo flight.

We found that the cargo pilot encountered a microburst during an attempted go-around that caused the airplane to descend and impact terrain. We determined that the ATC tower at the airport used only the center field/airport wind sensor information for wind information (to be distributed to pilots) and runway configuration. The ATC tower wind sensor did not report a wind gust above 25 knots near the accident time, and neither of the airport's windshear display systems indicated a microburst alert until about 10 minutes after the accident.

The safety issues identified were the inadequate amount of wind sensors and wind shear detection equipment used by the ATC tower to detect microburst activity at the airport. The inadequacies we identified could prevent SLC tower controllers from receiving timely information about hazardous wind

conditions and limit their ability to alert pilots before departure and arrival. Wind-sensing capabilities at other Title 14 *CFR* Part 139 airports may need to be enhanced to support tower controllers' ability to provide pilots with timely alerts about wind hazards.

As a result, the NTSB issued new safety recommendations to the FAA.

Recommendations: 2 new
Report Date: July 3, 2025

In-Flight Separation of Left Mid Exit Door Plug Alaska Airlines Flight 1282
Boeing 737-9, N704AL
Portland, Oregon
January 5, 2024

On January 5, 2024, Alaska Airlines flight 1282, a Boeing 737-9 airplane, experienced an in-flight separation of the left mid exit door (MED) plug and rapid depressurization during climb after takeoff from Portland International Airport in Oregon. The flight and cabin crew executed emergency procedures in response to the rapid depressurization, and the flight returned to the airport for a safe landing. One flight attendant and 7 passengers received minor injuries; the captain, the first officer, 3 flight attendants, and 164 passengers were uninjured; and the airplane sustained substantial damage.

Postaccident examination found a hole in the airplane's fuselage where the left MED plug had been installed. Components on the fuselage frame that surrounded the hole, including fittings and assemblies associated with the left MED plug installation, were damaged. The passenger seats and cabin interior located nearest the hole were also damaged, and a seatback tray table, two seat headrests, and cabin interior panels were missing. The airplane's left MED plug and some of the seat and interior pieces were located on the ground along the airplane's flight path and recovered. Multiple components associated with the left MED plug installation, including four bolts that would secure the left MED plug from moving upward vertically, were not located.

We determined that the probable cause of this accident was the in-flight separation of the left MED plug due to Boeing's failure to provide adequate training, guidance, and oversight to ensure that manufacturing personnel could consistently and correctly comply with its parts removal process, which was intended to document and ensure that the securing bolts and hardware that were removed to facilitate rework during the manufacturing process were properly reinstalled. Contributing to the accident was the FAA's ineffective compliance enforcement surveillance and audit planning activities, which failed to adequately identify and ensure that Boeing addressed the repetitive and systemic nonconformance issues associated with its parts removal process.

As a result of this investigation, the NTSB issued new safety recommendations to the FAA and Boeing and reiterated five previously issued safety recommendations.

Recommendations: 19 new, 5 reiterated
Report Date: June 24, 2025

Airbus A350-941 Turbulence Encounter
Atlanta, Georgia
August 29, 2023

On August 29, 2023, Delta Air Lines flight 175, an Airbus A350-941, encountered severe turbulence during descent into Hartsfield-Jackson Atlanta International Airport in Georgia. Two passengers and two flight attendants sustained serious injuries. The flight was an international scheduled passenger flight operated as a 14 *CFR* Part 121 flight from Milan Malpensa Airport in Ferno, Italy, to Atlanta.

Our investigation evaluated the flight crew's awareness of the rapidly building cell that caused severe turbulence during the flight. The flight crew was aware and monitoring the general convective weather in the area and showed intention to deviate around other potential convective cells; however, rapid cloud buildup and the lack of precipitation associated with it meant that the risk of turbulence was not apparent on the aircraft's weather radar nor on ATC scopes.

The NTSB determined the probable cause of the accident was the flight crew's unintentional encounter with rapidly developing cumulus clouds, which resulted in an encounter with severe convectively induced turbulence.

Recommendations: None
Report Date: June 19, 2025

Mitigations Concerning Load Reduction Device Activation in CFM International LEAP-1B Engines
Kenner, Louisiana
December 20, 2023

On December 20, 2023, Southwest Airlines flight 554, a Boeing 737-8, experienced a bird ingestion in the left engine shortly after takeoff from Louis Armstrong New Orleans International Airport in Kenner, Louisiana. Following the bird ingestion, the engine's load reduction device (LRD) activated, as designed, to reduce vibration severity transmitted from the damaged engine to the airframe; however, this activation damaged the engine oil system, allowing hot oil to enter the ventilation system and ultimately releasing acrid

smoke into the cockpit. The flight crew donned oxygen masks, executed emergency procedures, and returned to the airport for a safe landing without further incident.

Our investigation identified the potential for smoke to enter the cockpit or cabin after LRD activation on airplanes equipped with CFM International LEAP-1B engines as a safety issue. We expressed concern that, although Boeing has updated the applicable quick reference handbook and flight crew operations manual with procedures to mitigate smoke after LRD activation, some pilots may not be fully aware of this type of incident or the updated procedures. We further expressed concern that, while pilot action can reduce smoke, a software modification being developed by CFM International and Boeing would more effectively prevent or limit smoke released into the cockpit or cabin upon LRD activation by automatically closing the valve that allowed smoke to enter the cockpit during the incident, reducing flight crew workload during an already critical situation.

We issued safety recommendations to the FAA, the European Union Aviation Safety Agency, the Civil Aviation Administration of China, Boeing, and CFM International.

Recommendations: 5 new (1 urgent)
Report Date: June 18, 2025

Crash of Pilatus PC-12/45
Stagecoach, Nevada
February 24, 2023

On February 24, 2023, a Pilatus PC-12/45, N273SM, was involved in an accident near Stagecoach, Nevada. The pilot, flight paramedic, flight nurse, and two passengers were fatally injured, and the airplane was substantially damaged. The flight was operated by Guardian Flight, LLC doing business as Care Flight, under the provisions of 14 *CFR* Part 135.

Our investigation evaluated the potential for the pilot's spatial disorientation in night instrument meteorological conditions, the autopilot operation, the operator's risk-assessment and organizational oversight deficiencies, weather and environmental risk factors, and pilot and crew experience.

We determined the probable cause of the accident was the pilot's loss of control due to spatial disorientation while operating in night instrument meteorological conditions, which resulted in an in-flight breakup. Contributing to the accident was the disengagement of the autopilot for undetermined

reasons, as well as the operator's insufficient flight risk assessment process and lack of organizational oversight.

Recommendations: None
Report Date: June 4, 2025

Boeing 737-800 Landing Accident
Santa Ana, California
August 20, 2023

On August 20, 2023, Alaska Airlines flight 1288, a Boeing 737-800, N516AS, sustained substantial damage when the left main landing gear collapsed after landing at John Wayne-Orange County Airport in Santa Ana, California. The 106 passengers and 6 crewmembers evacuated the airplane via stairs onto a taxiway with no injuries reported. The flight was operating under the provisions of Part 121 as a scheduled domestic passenger flight from Seattle, Washington, to Santa Ana.

Our investigation evaluated the role of maintenance, component fatigue initiation, the limitation of inspection practices intended to detect wear, and the reliability of critical structural components during landing loads.

We determined the probable cause of the accident was maintenance personnel's excessive grinding of the left main landing gear's aft trunnion pin during machining, which imparted heat damage to the base metal and led to the fatigue cracking that caused the pin to fracture during landing.

Recommendations: None
Report Date: May 22, 2025

Boeing 717-200 Nose Landing Gear Failure
Charlotte, North Carolina
June 28, 2023

On June 28, 2023, Delta Air Lines flight 1092, a Boeing 717-200, sustained substantial damage when the nose landing gear did not extend before landing at Charlotte Douglas International Airport in Charlotte, North Carolina. The 99 passengers and 5 crewmembers safely evacuated the airplane without injuries. The flight was operating as a Part 121 scheduled domestic passenger flight from Atlanta, Georgia, to Charlotte.

The investigation evaluated component fatigue from initial manufacturing and maintenance imperfections and lack of compliance with maintenance guidance in a service bulletin.

We determined the probable cause of the accident was a fatigue fracture of the upper lock link that initiated along scratch features on the lower surface at the parting line of the forged aluminum component. Contributing to the accident was the overhaul facility's noncompliance with Service Bulletin 717-32-002.

Recommendations: None
Report Date: May 22, 2025

Crash of Airbus Helicopters EC 130B4
Halloran Springs, California
February 9, 2024

On February 9, 2024, an Airbus Helicopters EC 130B4 helicopter, N130CZ, was involved in an accident near Halloran Springs, California. The two pilots and four passengers were fatally injured, and the helicopter was destroyed. The helicopter was operated by Orbic Air, LLC, as a Part 135 on-demand flight.

Our investigation evaluated operational decision-making and risk management, the potential for pilot spatial disorientation and loss of helicopter control, and terrain and environmental hazards during night operations.

We determined the probable cause of the accident was the pilot's decision to continue the visual flight rules flight into instrument meteorological conditions, which resulted in the pilot's spatial disorientation and loss of control. Contributing to the accident was the company's inadequate oversight of its safety management processes, including ensuring the pilots were accurately completing and updating the flight risk analysis, logging maintenance discrepancies, and ensuring the helicopter met Part 135 regulations before departure.

Recommendations: None
Report Date: May 6, 2025

Address Noncompliant Evacuation Slide Components on Boeing Airplanes
Chattanooga, Tennessee
October 4, 2023

On October 4, 2023, about 11:47 p.m. local time, the flight crew of FedEx flight 1376, a Boeing 757-236, received an engine indication and crew alerting system message indicating a failure of the left hydraulic system shortly after takeoff from Chattanooga Metropolitan Airport-Lovell Field in Chattanooga, Tennessee. The flight crew turned the airplane back to the airport

but was unable to lower the landing gear. After multiple attempts to extend the gear were unsuccessful, the crew declared an emergency and performed an emergency gear-up landing. After an initial attempt to open each door was unsuccessful, the R1 door was eventually opened and the slide successfully deployed. None of the airplane's occupants was injured, and the airplane sustained substantial damage.

In addition to evaluating the cause of the landing gear failure, our investigation evaluated the occupants' difficulties deploying the evacuation slides during the emergency. Postaccident examination of the R1 door found that the R1 bannis latch (which releases the slide pack when an armed door is opened) did not conform to the then-current configuration of the release cable assembly. This latch caused the slide pack to jam before the R1 door was forced open. A subsequent inspection of FedEx's Boeing 757 fleet found about 24 percent of doors had noncompliant bannis latches.

Our investigation identified a lack of consistent, accurate depictions of the approved configuration of the bannis latch assembly in Boeing 757 maintenance documentation. We also found potential for other Boeing models of airplanes that use the same bannis latch design to contain incorrectly configured bannis latch assemblies.

We determined the probable cause of this accident was the failure of the alternate gear extension system, which prevented the landing gear from being lowered. The cause of the system failure was a broken wire, due to tensile overload, between the alternate gear extend switch and the alternate extension power pack, preventing the alternate extension power pack from energizing and supplying hydraulic fluid to the door lock release actuators for the nose landing gear and main landing gear. Contributing to the accident was the loss of the left hydraulic system due to a ruptured left main gear door actuator hose from fatigue, which prevented normal landing gear operation.

We issued safety recommendations to the FAA and Boeing concerning noncompliant evacuation slide components on certain Boeing airplanes.

Recommendations: 7 new
Report Date: March 27, 2025

Deconflict Airplane and Helicopter Traffic in the Vicinity of Ronald Reagan Washington National Airport
Washington, DC
January 29, 2025

On January 29, 2025, about 8:48 p.m. local time, a Sikorsky UH-60L, operated by the US Army under the callsign PAT25, and PSA Airlines

flight 5342, an MHI RJ Aviation CL-600-2C10, N709PS, collided in flight about 0.5 nm southeast of runway 33 at DCA in Arlington, Virginia, and impacted the Potomac River in southwest Washington, DC. Just before the collision, PAT25 had transitioned from Helicopter Route 1 to Route 4, consistent with the filed visual flight rules flight plan, and flight 5342 was on approach to runway 33 at DCA.

Preliminary findings suggested that the separation distances between helicopter traffic operating on Route 4 and aircraft landing on runway 33 or departing runway 15 as they existed at the time of the accident were insufficient and posed an intolerable risk to aviation safety, which required urgent action.

As a result of this investigation, the NTSB issued urgent safety recommendations to the FAA.

Recommendations: 2 new (urgent)
Report Date: March 7, 2025

In-Flight Collision During Air Show Commemorative Air Force Boeing B-17G, N7227C, and Bell P-63F, N6763
Dallas, Texas
November 12, 2022

On November 12, 2022, about 1:22 p.m. local time, a Boeing B-17G airplane, N7227C, and a Bell P-63F airplane, N6763, collided in flight during a performance at the Commemorative Air Force's Wings Over Dallas air show at Dallas Executive Airport in Dallas, Texas. The pilot, copilot, flight engineer, and the two scanners on board the Boeing B-17G and the pilot of the Bell P-63F were fatally injured, and both airplanes were destroyed. No injuries to people on the ground were reported. Both accident airplanes (and six other historic, former military airplanes that were airborne as part of the same performance) were operated by the Commemorative Air Force under the provisions of Title 14 *CFR* Part 91 and a certificate of waiver for the air show.

The NTSB determined the probable cause of the accident was the air boss's and air show event organizer's lack of an adequate, prebriefed aircraft separation plan for the air show performance, relying instead on the air boss's real-time deconfliction directives and the see-and-avoid strategy for collision avoidance, which allowed for the loss of separation between the Boeing B-17G and the Bell P-63F airplanes. Also causal was the diminished ability of the accident pilots to see and avoid the other aircraft due to flight path geometry, out-the-window view obscuration by aircraft structures, attention demands associated with the air show performance, and the inherent limitations of human performance that can make it difficult to see another aircraft.

Contributing to the accident were the lack of FAA guidance for air bosses and air show event organizers on developing plans and performing risk assessments that ensure the separation of aircraft that are not part of an approved maneuvers package, and the lack of FAA requirements and guidance for recurrent evaluations of air bosses and direct surveillance of their performance.

During our investigation of this accident, we discovered the air boss did not communicate real-time directives clearly and that standard phrasing and guidance are needed for air show communications. We noted factors that limited the ability of the Boeing B-17G pilot and the Bell P-63F pilot to see and avoid each other's aircraft. The air boss's aircraft deconfliction strategy for the accident performance was ineffective. There was a lack of adequate air show safety oversight, including the requirements for the contents of the air show Participants Safety Briefing, the need for administrative controls and documented safety risk assessments, and the need for direct surveillance of air boss performances. In addition, we found air show safety culture issues, including evidence that Commemorative Air Force pilots did not report observed safety concerns and the limited ability of the International Council of Air Shows Inc. to influence culture in an industry comprised of various operators, individual performers, and individual air bosses.

As a result of this investigation, the NTSB issued safety recommendations to the FAA, International Council of Air Shows Inc., and the Commemorative Air Force.

Recommendations: 7 new
Report Date: December 4, 2024

Domestic Investigative Workload Summarized by State

The NTSB carefully considers the level of detail necessary for each investigation with the aim of concentrating resources on investigations that are most likely to enhance aviation safety while fulfilling our mandate to investigate all civil aviation accidents. Because many accidents have similar causes and may not provide new information that would result in further safety action, investigating these in detail may not be justified, given the agency's limited resources. Therefore, the investigation depth and final report for each event (accident or incident) is stratified into one of four classes.

The following table summarizes statistical information on domestic accident and incident investigations initiated between October 1, 2024, and September 30, 2025, by state, territory, or major body of water.

State	Total
Alabama	9
Alaska	91
Arizona	47
Arkansas	17
California	94
Colorado	40
Connecticut	4
Delaware	2
Florida	99
Georgia	29
Gulf of America	1
Hawaii	10
Idaho	23
Illinois	32
Indiana	12
Iowa	10
Kansas	12
Kentucky	18
Louisiana	18
Maine	10
Maryland	6
Massachusetts	9
Michigan	26
Minnesota	24
Mississippi	10
Missouri	20
Montana	22
Nebraska	13
Nevada	21
New Hampshire	7
New Jersey	12
New Mexico	18
New York	17
North Carolina	20
North Dakota	4
Ohio	22
Oklahoma	13
Oregon	26
Pennsylvania	22
Puerto Rico	3

State	Total
Rhode Island	1
South Carolina	18
South Dakota	9
Tennessee	30
Texas	107
Utah	22
Vermont	4
Virginia	23
Washington	33
Washington, DC	2
West Virginia	10
Wisconsin	22
Wyoming	11
Total	1,185

International Investigations

The United States is a signatory to the Chicago Convention on International Civil Aviation, which is administered by ICAO. The NTSB is charged with fulfilling the US obligation for accident and incident investigations in accordance with Annex 13 of this agreement in full coordination with the US Department of State.

The international investigative process is critical to maintaining aviation safety in the United States and throughout the world. When an aircraft operated by—or designed, manufactured, or registered to—a US company has been involved in an accident in a foreign state, NTSB participation in that investigation enables the United States to gain access to critical safety information and ensure the airworthiness and operation of its aircraft operated here and overseas. ICAO Annex 13 protocols also define the agency's engagement with international authorities whose products or operations are involved in accidents within the United States. This international process of collaboration plays an important role in enabling us to identify safety concerns and issue appropriate recommendations. We have issued numerous safety recommendations that have resulted in safety improvements within the United States and worldwide as a direct result of our participation in these foreign investigations.

Between October 1, 2024, and September 30, 2025, the Office of Aviation Safety was notified of 1,086 international investigations and assigned accredited representatives for 455 investigations. The following international investigations required significant US involvement during this period.

Boeing 787-8 Crash Shortly After Takeoff
Ahmedabad, Gujarat, India
June 12, 2025

On June 12, 2025, Air India flight AI-171, VT-ANB, a Boeing 787-8, was involved in an accident about 0.8 nm southwest of Sardar Vallabhbhai Patel International Airport in Ahmedabad, Gujarat, India. The aircraft had just departed the airport when the flight crew declared an emergency. Soon after, the aircraft impacted the campus of a nearby medical college. The aircraft was destroyed. Of the 242 occupants on board (230 passengers and 12 crew members), all but one passenger were fatally injured, as were multiple people on the ground. The surviving passenger sustained serious injuries. As the US accredited representative of the state of design and manufacture of the airframe and engines, NTSB staff traveled to India to assist the Aircraft Accident Investigation Bureau in its investigation. Since the accident, NTSB staff have traveled to support an examination of a systems component.

MHI RJ CL-600-2D24 Crash During Landing
Toronto, Canada
February 17, 2025

On February 17, 2025, Endeavor Air flight EDV4819, an MHI RJ Aviation Group, CL-600-2D24, N932XJ, impacted the runway while landing at Lester B. Pearson International Airport in Toronto, Canada; the right wing detached, and the airplane overturned and slid down the runway inverted, coming to rest near the intersection of two runways. A fire ensued. Aircraft rescue and firefighting personnel responded and all passengers and crew evacuated. Twenty-one of the 80 occupants were injured, with two of those occupants reporting serious injuries. As the US accredited representative of the state of the operator, NTSB staff traveled to Canada to assist the Transportation Safety Board of Canada in its investigation. Since the accident, NTSB staff have traveled to support systems examinations.

Airbus A220-300 Engine Failure and In-Flight Smoke
Graz, Austria
December 23, 2024

On December 23, 2024, Swiss International Airlines flight 1885, an Airbus A220-300, en route from Bucharest Otopeni Airport, Romania, to Zurich International Airport in Switzerland, experienced an in-flight engine failure at 40,000 ft. Smoke entered the cockpit and cabin. The flight crewmembers donned their full-face quick-donning oxygen masks and the cabin crewmembers donned protective breathing equipment (PBE); no passenger oxygen masks were deployed. The flight crew performed an emergency

landing at Graz, Austria. Seventy-four passengers and all five crewmembers were evacuated. Several passengers and the entire crew were taken to a hospital for medical evaluation and treatment. One cabin crewmember later died.

As the US accredited representative of the state of design and manufacture of the engines and the PBE, NTSB staff traveled to assist the Austria Federal Safety Investigation Authority, Civil Aviation Safety Investigation Authority with its investigation. Since the accident, NTSB staff have traveled to support engine examinations and teardowns and PBE examinations and testing. The investigation has subsequently been delegated to the Swiss Transportation Safety Investigation Board for completion.

Boeing 737 Crash on Approach
Vilnius, Lithuania
November 24, 2024

On November 24, 2024, Swiftair flight 5960, B737-476, crashed short of the landing runway on approach to Vilnius Airport in Lithuania. Of the two flight crewmembers and two occupants on board, one flight crewmember was fatally injured, one flight crewmember and one occupant sustained serious injuries, and one occupant sustained minor injuries. The airplane was destroyed. As the US accredited representative of the state of design and manufacture of the airframe and engines, NTSB staff traveled to Lithuania to assist the Safety Investigation Division of the Ministry of Justice of the Republic of Lithuania in its investigation. Since the accident, NTSB staff have traveled to support systems examination and testing.

Boeing 737 Cargo Fire
São Paulo, Brazil
November 9, 2024

On November 9, 2024, Total Linhas Aereas flight 5682, a Boeing 737-4QB, experienced a cargo fire while en route from Eurico De Aguiar Salles Airport, Vitoria, Brazil, to São Paulo/Guarulhos International Airport in Brazil. The flight crew made an emergency landing at GRU and the two flight crewmembers evacuated with minor injuries. The airplane was destroyed. As the US accredited representative of the state of design and manufacture of the airframe and engines, NTSB staff traveled to Brazil to assist Aeronautical Accidents Investigation and Prevention Center in its investigation.

Boeing 737 Runway Excursion
Malabo, Equatorial Guinea
August 29, 2024

On August 29, 2024, Ethiopian Airlines flight C2-205, a Boeing 737-800, experienced a runway excursion while landing at Malabo International Airport. The airplane received substantial structural damage, but none of the 133 people on board were injured. As the U.S. accredited representative for the state of design and manufacture of the airframe, the NTSB provided support for vehicle recorder readouts in early 2025.

Boeing 737 Runway Excursion
Dakar, Senegal
May 9, 2024

On May 9, 2024, TransAir flight HC301, a Boeing 737-38J, experienced a runway excursion following an aborted takeoff at Blaise Diagne International Airport, Dakar, Senegal. The airplane received substantial damage. Several airplane occupants were injured, including four who sustained serious injuries. The Senegal government is investigating the accident. As the U.S. accredited representative for the state of design and manufacture of the airframe, the NTSB hosted Senegalese representatives in the United States in support of systems investigation activities in early 2025.

Boeing 737 Crash Following Gear-Up Landing
Muan County, South Korea
December 29, 2024

On December 29, 2024, Jeju Air flight 2216, a Boeing 737-800, landed well beyond the touchdown zone on the arrival runway at Muan International Airport, Muan County, South Korea, without the landing gear having deployed. The airplane overran the runway and impacted the approach lighting system then an embankment. A postimpact fire ensued. All but 2 of the 181 occupants were fatally injured. As the U.S. accredited representative of the state of design and manufacture of the airframe and engines, NTSB staff traveled to South Korea to assist the Aviation and Railway Accident Investigation Board in its investigation. Since the accident, NTSB staff have traveled to support engine and systems examination and testing.

US Comments on Foreign Accident Reports

The NTSB completed comments on behalf of the United States on several international investigations in which the United States had significant involvement under Annex 13, including the following events.

Embraer ERJ190 Descent Below Glideslope
Brisbane, Australia
May 9, 2024

On May 9, 2024, the crew of an Embraer ERJ190 selected an incorrect autopilot mode on approach to Brisbane International Airport in Australia. The airplane descended below the glideslope, resulting in an unstable approach. As the US-accredited representative of the state of design and manufacture of the engines, the NTSB provided comments on a draft report to the Australian Transport Safety Bureau in February 2024. The final report was issued in April 2025.

Boeing 787 Lightning Strike to Fuselage
Tokyo, Japan
March 20, 2024

On March 20, 2024, ANA All Nippon Airways flight NH-5, a Boeing 787-9, was struck by lightning while descending into Narita International Airport in Japan. The right forward fuselage was damaged, but no injuries were reported. As the US-accredited representative of the state of design and manufacture of the airframe, the NTSB provided comments on a draft report to the Japan Transport Safety Board in December 2024. The final report was published in February 2025.

BAE 3201EP Runway Excursion
San Antonio del Estrecho, Peru
September 20, 2022

On September 20, 2022, a BAE 3201EP airplane failed to reach takeoff velocity and aborted the takeoff, then overran the runway at El Estrecho Airport, San Antonio del Estrecho, Peru. One person on board died and 16 others sustained injuries ranging from minor to serious. The airplane was destroyed. As the US-accredited representative of the state of design and manufacture of the engines, the NTSB provided comments on a draft report to the Aviation Accident Investigation Commission in October 2024, and a final report was issued in December 2024.

Boeing 787 Tail Strike
Guangzhou, China
October 21, 2024

On October 21, 2024, China Southern Airlines flight 3534, a Boeing 787-9, experienced a tail strike after a hard landing at Guangzhou Baiyun International Airport, Guangzhou Guangdong, China. The airplane sustained substantial damage, but no injuries were reported. As the

US-accredited representative of the state of design and manufacture of the airframe, the NTSB provided comments on a draft report to the Civil Aviation Administration of China. A final report is pending.

Boeing 737 Late Takeoff
Amsterdam, The Netherlands
December 19, 2023

On December 19, 2023, during takeoff from Amsterdam Airport Schiphol, the Netherlands, ASL Airlines Ireland flight BCS38L, a cargo Boeing 737-400, departed the runway at an airspeed significantly higher than its rotation speed due to a ballast container not being in the correct position. No injuries were reported. As the US-accredited representative of the state of design and manufacture of the airframe, the NTSB provided comments on a draft report to the Dutch Safety Board in October 2024. The final report is pending.

Investigative Hearings

Investigative hearings are public hearings related to investigations in which the agency is authorized to obtain testimony under oath.

PSA Airlines Flight 5342 and Army Helicopter Midair Collision, January 29, 2025
Investigative Hearing
July 30–August 1, 2025

The NTSB convened a 3-day investigative hearing from July 30 through August 1, 2025, to gather sworn testimony about the January 29, 2025, midair collision between PSA Airlines flight 5342, a Bombardier CRJ700 regional jetliner, and a US Army Sikorsky UH-60 Black Hawk helicopter. The accident occurred when the two aircraft collided over the Potomac River near DCA about 8:48 pm; following the collision, both aircraft crashed into the Potomac River, killing all 67 people aboard—the two pilots, two flight attendants, and 60 passengers aboard the airplane, and the helicopter's three crew members. The NTSB will use the information gathered to complete the investigation, determine probable cause, and make recommendations to improve transportation safety.

Safety Alerts

A safety alert is a short informational bulletin that pinpoints a particular safety issue. It contains information based on the findings of one or more NTSB investigations and enhances the dissemination of safety information and actions to the traveling public; federal, state, and local officials; and transportation operators about safety hazards and practical remedies identified

through NTSB accident investigations, safety research, and safety recommendations.

Overspeeding Risks Flutter and In-Flight Breakup

The NTSB developed this safety alert based on information from several accidents involving pilots of Van's model airplanes who exceeded the manufacturers never exceed speed (velocity never exceed, or Vne), causing flutter that resulted in the airplanes' in-flight breakup.

With the cooperation of Van's Aircraft, the NTSB performed a focused analysis of accidents involving Van's model airplanes. Due to their design, Van's airplanes are sleek and can exceed Vne very quickly.

The NTSB found that exceeding Vne can quickly induce flutter and cause catastrophic structural damage, and that flutter susceptibility increases with higher airspeed, reduced structural stiffness, or changes in mass distribution. Pilots of high-performance aircraft who perform aerobatics without aerobatic training or who enter instrument meteorological conditions without an instrument rating face an increased risk for exceeding their airplane's Vne, which can lead to flutter and result in an in-flight breakup. Weight and balance concerns (for example, paint weight and unbalanced control surfaces) can reduce flutter margins if not properly considered.

Issue Date: April 2025

Other Efforts and Focus Areas

Follow-up Activities from the 2024 ICAO Audit

During the first half of FY 2025, the office worked to address a finding identified during ICAO's audit of the US civil aviation system in July 2024. As a result, the office will modify our investigation management system to ultimately automate ICAO notification submissions.

Ongoing Support of Agencywide Technology Upgrades

The office continues to support significant technology modernization at the NTSB as part of the Technology Modernization Fund (TMF). The NTSB's TMF objectives aim to improve internal and external customer experience through digital content delivery, the vast majority of which is generated by the office. The office continues to provide the TMF team technical direction to improve our ability to inform decision-makers in the National Airspace System about lessons learned from our work so that they may implement change. To do this, we have worked with the agency's TMF team to enable a new web

version of the 6120 notification form for pilots and operators who have to report an event to the NTSB, developed web-based application programming interfaces (APIs) to provide our customers direct access to our data, and continue to help plan major upgrades to the search functions at NTSB.gov so customers can subscribe to specific categories of information.

Ongoing Significant Aviation Accident and Incident Investigations

Location	Description	Date	Fatalities
Copake, New York	Mitsubishi MU-2B-40 destroyed in accident	4/12/2025	6
Jersey City, New Jersey	Structural failure involving a Bell 206L-4	4/10/2025	6
Canton, Mississippi	Airbus EC135 P2+ helicopter destroyed in accident	3/10/2025	3
Chicago, Illinois	Runway incursion involving a Boeing 737-800 and a Bombardier CL-35	2/25/2025	-
Scottsdale, Arizona	Runway excursion involving a Learjet 35A	2/10/2025	1
Nome, Alaska	Loss of control in flight of a Cessna 208B	2/6/2025	10
Philadelphia, Pennsylvania	Learjet 55 destroyed in accident	1/31/2025	7
Washington, District of Columbia	Midair collision involving a Sikorsky UH-60L helicopter and a CRJ700	1/29/2025	67
Houston, Texas	Collision with a radio tower involving a Robinson R44 helicopter	10/21/2024	4
Saint Mary's, Alaska	Controlled flight into terrain accident involving a Cessna 207	9/16/2024	4
Nashville, Tennessee	Runway incursion involving a Boeing 737-900 and a Boeing 737-700	9/12/2024	-
College Park, Georgia	Ground collision involving an Airbus A350-941 and CRJ-900	9/10/2024	-
Houston, Texas	Landing gear collapse involving an Embraer EMB-145LR	5/3/2024	-
Queens, New York	Runway incursion involving an Airbus A330-343 and a Boeing 767-432(ER)	4/17/2024	-
Houston, Texas	Loss of control on the ground by a Boeing 737-8	3/8/2024	-
Missoula, Montana	Corrosion found on two large air tankers used for fire suppression	3/1/2024	-
Dallas, Texas	Runway excursion involving a Boeing 737-823	2/11/2024	-

Location	Description	Date	Fatalities
Westwater, Utah	Loss of control in flight of a Hawker 900XP	2/7/2024	2
Newark, New Jersey	Flight control system malfunction of a Boeing 737-8	2/6/2024	-
St. Simons Island, Georgia	Hard landing involving an Embraer SA EMB-545	9/21/2023	-

Note: We are devoting significant resources to the investigations listed and anticipate producing a report upon the completion of each investigation. These investigations were ongoing as of September 30, 2025. Please see NTSB.gov for more information on the status of these investigations.

HIGHWAY SAFETY

Fiscal Year	($000s)	FTEs	Pos.
FY 2026 Estimate	$11,060	36	37
FY 2027 Request	$11,052	36	37
Increase/Decrease	($8)	-	-

Overview of the Request

The requested funding level assumes no pay raise in FY 2027 and incorporates modest, targeted reductions in operational expenses, with a focus on internal efficiencies, to partially offset a projected 2-percent increase in nonpay inflationary costs. These adjustments are designed to preserve core mission capabilities and sustain priority activities while limiting growth in administrative support costs.

Program Description

The Office of Highway Safety investigates crashes that have significant safety implications nationwide. These crashes highlight national safety issues, involve the loss of numerous lives, or generate high interest because of emerging technologies or the circumstance of the crash. For example, our investigations may focus on mass casualties and injuries on public transportation vehicles (such as motorcoaches and school buses), collapses of bridges spanning roadways or tunnel structures, or collisions at highway–railroad grade crossings. This office also investigates crashes that involve new safety issues or technologies (such as automated vehicles and alternatively fueled vehicles) and develops reports based on trends emerging from NTSB investigations and from research and data that identify common risks or underlying causes of crashes, injuries, and fatalities.

The NTSB is the only US organization that performs independent, comprehensive, and transparent multidisciplinary investigations to determine the probable causes of highway crashes, with the goal of making recommendations to prevent similar events and to reduce injuries and fatalities. Our investigations result in recommendations that provide policymakers and stakeholders with unbiased analysis and that, if implemented, would reduce or eliminate the safety risks identified in the investigations.

The Office of Highway Safety comprises the Investigations Division and the Report Development Division.

Investigations Division

The Investigations Division manages the teams launched to crash sites to collect factual information and identify highway safety issues used in our investigations. Currently, the division is separated into three branches: Multidisciplinary Investigations East, Multidisciplinary Investigations West, and Special Investigations. The multidisciplinary investigations branches conduct highway investigations using a multidisciplinary team comprising an IIC and five other investigators with expertise in vehicle, highway, human performance, survival, and motor carrier factors. The Special Investigations Branch performs focused investigations by specific subject matter experts on targeted safety issues. All investigations are supported by two crash reconstruction experts. To enhance geographic coverage and reduce response time, team members are located throughout the country, including in California, Florida, Montana, Tennessee, Texas, Washington, Wyoming, and Washington, DC.

Report Development Division

The Report Development Division researches, analyzes, and develops nationally significant highway safety issues, writes investigation reports, and issues safety recommendations. The division works with Board members to incorporate changes to reports before Board meetings, and it coordinates the presentation of reports to the Board. Staff members also host public forums, attend specialized meetings on highway safety issues, testify before Congress, serve on discussion panels, and respond to letters from the public to advocate for highway safety. The division's project managers and writer-editors develop technical reports by reviewing investigative materials for accuracy and completeness; research, analyze, and develop national highway safety issues based on this investigative information; and write and edit technical reports.

Accomplishments and Ongoing Efforts

Office accomplishments include issuing products related to transportation safety arising from completed and ongoing investigations. Products completed between October 1, 2024, and September 30, 2025, are highlighted below, along with information about other efforts and focus areas important to our mission.

Investigation Reports

Investigation reports are issued for accident or incident investigations and may contain a probable cause determination and safety recommendations, depending on the scope of the investigation and the safety issues identified. For select, larger scale investigations, the office launches an

investigation team and presents a comprehensive investigation report to the Board. Investigations that are limited in scope are primarily intended to determine probable cause; the resultant report may be issued by the office director under delegated authority or may be adopted by the Board. Special investigation reports usually involve analysis of data from multiple accidents centered around a common safety issue and result in safety recommendations. A report containing only safety recommendations can be issued at any time during an investigation. If the Board determines that a recommended course of action requires immediate attention to avoid imminent loss of life from a similar accident, the safety recommendation is designated "urgent."

From October 1, 2024, through September 30, 2025, the Office of Highway Safety published four investigation reports identifying safety issues that led to the issuance of 32 new safety recommendations. During this period, the office also issued four investigation reports that solely determined probable cause. The Office of Highway Safety also supported the Office of Marine Safety for the investigative report with urgent safety recommendations titled "Safeguarding Bridges from Vessel Strikes: Need for Vulnerability Assessment and Risk Reduction Strategies" discussed below.

Below are summaries of the highway investigation reports completed between October 1, 2024, and September 30, 2025, arranged by report date.

Cargo Tank Combination Vehicle Roadway Departure, Rollover, and Release of Anhydrous Ammonia
Teutopolis, Illinois
September 29, 2023

On September 29, 2023, about 8:41 p.m. local time, a minivan began passing a truck-tractor cargo tank combination vehicle (combination vehicle) carrying anhydrous ammonia while traveling west on two-lane US Highway 40 near Teutopolis, Illinois. As the minivan, operated by a 17-year-old driver, was still in the process of passing in the no-passing zone, an oncoming vehicle approached. To accommodate the passing minivan and prevent a head-on collision in the opposite lane, the combination vehicle driver steered right. The combination vehicle departed the roadway, entered a drainage channel, overturned, rolled onto its right side, and slid forward until the front of the cargo tank struck a utility trailer parked in a residential yard. The collision with the trailer punctured the cargo tank, causing the release of anhydrous ammonia. The release caused five fatalities among nearby residents and vehicle occupants, serious injuries to nine, and minor injuries to four.

We determined that the probable cause of the Teutopolis, Illinois, roadway departure and overturning of the combination vehicle was the unsafe passing maneuver by a teen driver that caused the combination vehicle driver

to initiate an evasive action that resulted in loss of vehicle control and rollover. Contributing to the severity of the crash was the subsequent impact of the overturned cargo tank with a parked utility trailer that resulted in the release of anhydrous ammonia.

As a result of this investigation, we identified lessons learned on risky behavior among teen drivers and the safe transportation and incident management of anhydrous ammonia.

Recommendations: none
Report Date: September 16, 2025

Multivehicle Collision and Postcrash Fire on Interstate 70
Etna, Ohio
November 14, 2023

On November 14, 2023, about 8:47 a.m. local time, a combination vehicle, operated by Mid-State Systems Inc., was traveling west in the right lane of Interstate 70 (I-70) near Etna, Ohio. As the combination vehicle approached a traffic queue that had formed due to an earlier minor crash, the driver did not slow and crashed into the rear of the traffic queue. The resulting chain-reaction collision and postcrash fire involved five vehicles, including two passenger vehicles, a motorcoach, and a second combination vehicle. Immediately before the crash, the combination vehicle was traveling about 72 mph, and the other four vehicles were traveling between 3 and 15 mph. As a result of the crash, six occupants were fatally injured, four were seriously injured, and 37 sustained minor injuries. Fifteen occupants were uninjured.

We determined that the probable cause of the Etna, Ohio, crash was the truck driver's inattention and failure to respond, for unknown reasons, to the visibly slow-moving vehicles, including a motorcoach, at the end of a traffic queue caused by an earlier minor crash. Contributing to the crash was the lack of adequate strategies to monitor the development of the traffic queue on I-70 after a minor incident and to inform travelers of the traffic conditions ahead. Also contributing to the crash was the lack of an in-vehicle driver monitoring system to return the truck driver's attention to the forward roadway. Contributing to the severity of the crash and occupant injuries were the speed differential between the combination vehicle and the slow-moving traffic queue and the postcrash fire.

Safety issues identified in this investigation included inadequate guidance for traffic incident management to reduce the incidence of secondary crashes, driver inattention and lack of standards for collision avoidance technology for heavy vehicles, inadequate standards for postcrash

fire protection on motorcoaches, and insufficient school district processes for chartering motorcoach transportation.

We issued new safety recommendations to the Federal Highway Administration, National Highway Traffic Safety Administration (NHTSA), Ohio Department of Transportation, American Trucking Associations, Owner-Operator Independent Drivers Association, American Bus Association, United Motorcoach Association, Amalgamated Transit Union, International Brotherhood of Teamsters, Transport Workers Union of America, and Tuscarawas Valley Local School District. We also reiterated two recommendations to NHTSA and classified one of these recommendations.

Recommendations: 8 new, 1 reiterated, and 1 reiterated and classified
Report Date: September 3, 2025

Tire Failure, Motorcoach Roadway Departure, and Rollover
Wawayanda, New York
September 21, 2023

On September 21, 2023, about 1:12 p.m. local time, a motorcoach operated by Regency Transportation LTD was traveling west on Interstate 84 in Wawayanda, New York, when its left-front (steer) tire failed. As a result of the tire failure, the motorcoach crossed the left lane and shoulder, penetrated a roadside cable barrier, traveled down into the median, and rolled before coming to rest on its left side. The motorcoach was occupied by a 59-year-old driver, 40 high school students, and 3 adult chaperones. Two adult chaperones were ejected and fatally injured. The driver was ejected and seriously injured, 14 other occupants sustained serious injuries, and 27 had minor injuries.

We determined that the probable cause of the Wawayanda, New York, roadway departure crash was the tread/belt detachment and casing rupture of the left steer axle tire on the motorcoach due to prolonged operation in an underinflated condition combined with previous impact damage to the tire interior. Contributing to the crash was Regency Transportation's inadequate vehicle inspection process, which permitted the motorcoach to operate with underinflated tires. Contributing to the severity of the injuries was the motorcoach occupants' failure to use the available lap/shoulder belts.

As a result of this investigation, we identified lessons learned related to proper tire pressure maintenance as well as the use of lap/shoulder belts by all drivers and passengers in motorcoaches to prevent injury or ejection during collisions.

Recommendations: none
Report Date: July 10, 2025

Vehicle Collision with Stopped School Bus and Student Pedestrian
Town of Excelsior, Wisconsin
May 12, 2023

On May 12, 2023, about 7:21 a.m. local time, a school bus stopped to board students in the westbound lane of State Highway 23/33 in the Town of Excelsior, Wisconsin. As the bus slowed nearly to a stop, the driver deactivated the bus's amber lights and activated the red lights and extended the stop arm. A pickup truck, operated by a 17-year-old driver, was traveling west behind the bus. As the pickup truck approached the rear of the school bus, the driver braked and swerved the truck to the right, sideswiped the right-rear corner of the bus, continued across the paved shoulder onto a private driveway, and struck a 13-year-old student pedestrian who was waiting to board the bus. The student died and the pickup truck driver sustained minor injuries. The school bus driver and the 16 student passengers on the school bus were not injured.

We determined that the probable cause of the Town of Excelsior, Wisconsin, crash was the pickup driver's distracted driving due to his texting. Contributing to the severity of the injuries to the student pedestrian was the pickup truck's speed, as well as its height and the shape of its front end.

The safety issues identified in this investigation were driver distraction from cell phone use and lack of collision avoidance and injury mitigation technology.

We issued a new recommendation to NHTSA. We also reiterated one recommendation to phone manufacturers (Apple, Inc., Google, Inc., HTC Corporation, Lenovo, LG Electronics, Motorola, Samsung Group, and Sony Corporation), and we classified seven recommendations.

Recommendations: 1 new, 1 reiterated, 7 classified
Report Date: June 4, 2025

Collision of Motorcoach with Combination Vehicles Parked Along Exit Ramp to Interstate 70 Rest Area
Highland, Illinois
July 12, 2023

On July 12, 2023, about 1:48 a.m. local time, a motorcoach with 21 occupants was westbound on Interstate 70 (I-70) near Highland, Illinois. The motorcoach, owned and operated by Greyhound Lines, Inc., departed I-70 onto the rest area exit ramp, where it collided with three truck-tractor/semitrailer combination vehicles parked on the ramp's right shoulder. Three motorcoach passengers died as a result of the collision. The driver and the remaining 11 motorcoach passengers sustained injuries ranging from

minor to serious. The three truck drivers, who were inside their vehicles at the time of the crash, were uninjured.

We determined that the probable cause of the Highland, Illinois, crash was the motorcoach driver's departure from the travel lanes onto the shoulder of the exit ramp due to fatigue. Contributing to the driver's fatigue was his irregular work–rest schedule and prolonged time awake. Contributing to the crash was the failure of Greyhound Lines, Inc., to mitigate the motorcoach driver's recurring unsafe driving behaviors. Also contributing to the crash were the three combination vehicles parked on the shoulder of the exit ramp due to the recurring lack of available truck parking. Contributing to the injury severity for some of the motorcoach passengers was their lack of seat belt use.

We identified safety issues associated with motorcoach driver fatigue; deficient driver oversight by Greyhound Lines, Inc.; insufficient federal guidance on safety management, driver coaching, and fatigue mitigation; lack of seat belt use by the motorcoach passengers; and crash risk from lack of truck parking along the National Highway System.

The NTSB issued new recommendations to the DOT, the Federal Motor Carrier Safety Administration (FMCSA), Greyhound Lines, Inc., the National Coalition on Truck Parking, the American Bus Association, and the United Motorcoach Association. We also reiterated a recommendation to the FMCSA and reiterated and classified a recommendation to the FMCSA.

Recommendations: 11 new, 1 reiterated, and 1 reiterated and classified
Report Date: May 20, 2025

Combination Vehicle Rollover, Fire, and Interstate 95 Overpass Collapse
Philadelphia, Pennsylvania
June 11, 2023

On June 11, 2023, about 6:17 a.m. local time, a truck-tractor in combination with a tank trailer (truck) was exiting northbound Interstate 95 (I-95) at the Cottman Avenue exit in Philadelphia, Pennsylvania. In this area, the posted speed limit on I-95 is 55 mph with an advisory speed limit of 25 mph for the exit ramp. The truck was transporting about 8,500 gallons of gasoline. As the truck traversed the exit ramp at an estimated speed of 44–54 mph, the driver lost control on the decreasing-radius, leftward curve, causing it to roll onto its passenger side and strike the adjacent concrete barrier. A subsequent fire destroyed the truck and caused the collapse of the northbound overpass lanes of I-95. The truck driver died as a result of the crash and postcrash fire.

We determined that the probable cause of the Philadelphia, Pennsylvania, rollover crash, postcrash fire, and subsequent I-95 overpass

collapse was the driver's failure to slow the vehicle as he exited the interstate onto the exit ramp well above the posted advisory speed limit, due to inattention to the roadway potentially associated with fatigue. Contributing to the severity of the postcrash fire was the driver's failure to secure the vehicle's manhole cover during his pretrip inspection.

As a result of this investigation, we identified lessons learned on truck driver fatigue and lack of electronic stability control on trucks to prevent rollover crashes.

Recommendations: None
Report Date: March 19, 2025

Box Truck Centerline Crossover Collision with Bus
Louisville, New York
January 28, 2023

On January 28, 2023, about 6:00 a.m. local time, a bus transporting 14 workers was traveling west on New York State Route 37 (SR-37) at a speed of 53–54 mph in Louisville, New York. At the same time, a box truck was traveling east on SR-37 about 59 mph. SR-37 is a two-lane roadway with one lane in each direction and a posted speed limit of 55 mph. As the two vehicles approached each other, the truck crossed over the highway centerline and collided with the driver's side of the bus. Six bus passengers died, two were seriously injured, five had minor injuries, and one was uninjured. The bus driver sustained minor injuries, and the truck driver was seriously injured.

We determined that the probable cause of the Louisville, New York, crash was the truck driver's fatigue due to insufficient sleep and circadian disruption, which lowered his level of alertness. Contributing to the crash was the failure of the truck motor carrier to manage driver fatigue and monitor unsafe driving, and the failure of the bus motor carrier to operate in compliance with Federal Motor Carrier Safety Regulations and a federal out-of-service order. Contributing to the severity of the injuries was the failure of the bus motor carrier to ensure that seat belts were readily accessible and worn.

We identified safety issues associated with the lack of seat belt use by the bus occupants, inadequate safety practices of the truck motor carrier for managing fatigue and crash risk, and deficient oversight of motor carrier operations by the FMCSA.

The NTSB issued new recommendations to the FMCSA, the State of Montana, the American Trucking Associations, the National Private Truck Council, the Amalgamated Transit Union, the International Brotherhood of Teamsters, the Owner-Operator Independent Drivers Association, the

Transport Workers Union of America, the American Association of Motor Vehicle Administrators, LBFNY (the bus operator), and Aero Global Logistics (the truck operator). We also reiterated or classified previously issued recommendations to the FMCSA, NHTSA, and the State of New York.

Recommendations: 12 new, 3 reiterated, 1 classified
Report Date: November 19, 2024

High-Speed Vehicle Collision with Workers in a Highway Work Zone
Woodlawn, Maryland
March 22, 2023

On March 22, 2023, about 12:36 p.m. local time, six highway workers were struck by a passenger vehicle in a work zone along northbound (inner loop) Interstate 695 near Woodlawn, Maryland. The crash occurred when a 2017 Acura TLX, traveling at 121 mph, moved from the right lane, across the two middle lanes and toward the left lane, and struck a 2017 Volkswagen Jetta, which was traveling at 122 mph.

The Acura driver lost control, and the vehicle entered the work zone through an opening in the concrete barrier that was intended for work zone access. After striking the center concrete median barrier inside the work zone, the vehicle began to overturn. While overturning, the Acura struck construction materials and equipment, as well as the six workers who were standing in the work zone. The Volkswagen made a controlled stop in the left lane. All six workers died, and the Acura driver was seriously injured.

We determined that the probable cause of the Woodlawn, Maryland, crash was the excessive speed of the two vehicles and an unsafe lane change by the Acura driver.

The safety issue identified in this investigation is speeding.

Recommendations: None
Report Date: October 9, 2024

Safety Alerts

A safety alert is a short informational bulletin that pinpoints a particular safety issue. It contains information based on the findings of one or more NTSB investigations and enhances the dissemination of safety information and actions to the traveling public; federal, state, and local officials; and transportation operators about safety hazards and practical remedies identified through NTSB accident investigations, safety research, and safety recommendations.

Cell Phone Use While Driving Kills

The safety alert describes the problem of distracted driving by citing crash statistics and research. It also highlights that texting while driving and handheld cell phone use while driving are prohibited in many states. The alert summarizes two NTSB crash investigations that highlight the dangers of using a cell phone while driving: a crash in Town of Excelsior, Wisconsin, on May 12, 2023, and a crash in Belton, South Carolina, on December 17, 2019. In these crashes, the drivers received calls or text messages from family members, which led the drivers to use their phones and become distracted prior to the fatal crash. We share information about what drivers, passengers, callers, senders of text messages, and others can do to prevent such tragedies. Finally, we provide a list of resources to access additional information about the risks of distracted driving and state laws about cell phone use while driving.

Issue Date: July 2025

Other Efforts and Focus Areas

Highway–Rail Grade Crossing Safety

The Office of Highway Safety led a multidisciplinary and multimodal team to investigate a fatal highway–rail grade crossing crash involving a Brightline passenger train and a sport utility vehicle (SUV) that occurred in Delray Beach, Florida, on February 8, 2023. We then completed three additional focused investigations involving collisions of a Brightline train and a passenger car in North Miami, Florida, on March 3, 2023; a Brightline train and a commercial vehicle in Hollywood, Florida, on April 12, 2023; and a Brightline train and a pickup truck in Melbourne, Florida, on January 12, 2024. We also conducted a limited investigation into a second Delray Beach, Florida grade crossing collision involving a Brightline train and a fire truck that occurred on December 28, 2024. The information from these investigations is being used to produce a report focusing on highway–rail grade crossing safety.

Ongoing Significant Highway Accident Investigations

Location	Description	Date	Fatalities
Pembroke, New York	Motorcoach rollover on Interstate 90	8/22/2025	5
Leander, Texas	School bus roadway departure and rollover	8/13/2025	-
Parrish, Florida	Passenger car roadway departure and crash	8/9/2025	2
Charlotte, North Carolina	Multivehicle crash on Interstate 485	7/26/2025	6

Location	Description	Date	Fatalities
Terrell, Texas	Multivehicle end-of-queue crash on Interstate 20	6/28/2025	5
East Ridge, Tennessee	Multivehicle end-of-queue crash on Interstate 75	5/11/2025	3
Island Park, Idaho	Pickup truck centerline crossover collision with 15-passenger van and postcrash fire	5/1/2025	7
Las Vegas, Nevada	Collision between electric bicycle and pickup truck at intersection	4/28/2025	1
Eden, North Carolina	Vehicle collision with workers in an intersection work zone	4/24/2025	4
Austin, Texas	Multivehicle work zone collision on Interstate 35	3/13/2025	5
Green River, Wyoming	Multivehicle collision and postcrash tunnel fire on Interstate 80	2/14/2025	3
Vicksburg, Mississippi	Motorcoach roadway departure and overturn	8/31/2024	7
Swanton, Ohio	Rear-end collision and subsequent multivehicle collisions near toll plaza on Interstate 80	8/15/2024	2
Belle Glade, Florida	Sport utility vehicle roadway departure and overturn	8/5/2024	9
Kenly, North Carolina	Multivehicle work zone collision and postcrash fire on Interstate 95	7/24/2024	5
Rushville, Illinois	School bus collision with combination vehicle and postcrash fire	3/11/2024	5
Millstone, West Virginia	School bus roadway departure and overturn	3/4/2024	-
Philadelphia, Pennsylvania	Rear-end collision between a sports utility vehicle operating with partial driving automation and two stationary vehicles	3/3/2024	2
San Antonio, Texas	Rear-end collision between a sports utility vehicle operating with partial driving automation and a stationary vehicle	2/24/2024	1

Note: We are devoting significant resources to the investigations listed and anticipate producing a report upon the completion of each investigation. These investigations were ongoing as of September 30, 2025. Please see NTSB.gov for more information on the status of these investigations.

MARINE SAFETY

Fiscal Year	($000s)	FTEs	Pos.
FY 2026 Estimate	$6,925	23	24
FY 2027 Request	$6,920	23	24
Increase/Decrease	($5)	-	-

Overview of the Request

The requested funding level assumes no pay raise in FY 2027 and incorporates modest, targeted reductions in operational expenses, with a focus on internal efficiencies, to partially offset a projected 2-percent increase in nonpay inflationary costs. These adjustments are designed to preserve core mission capabilities and sustain priority activities while limiting growth in administrative support costs.

Program Description

The Office of Marine Safety investigates and determines the probable cause of major marine casualties in US territorial waters, major marine casualties involving US-flagged vessels worldwide, and marine accidents involving a public (government) vessel and any other vessel. Additionally, the NTSB fulfills US obligations with regard to foreign accident investigations, established under the auspices of the International Maritime Organization, by participating with the Coast Guard as a substantially interested State in investigations of certain serious marine casualties involving foreign-flagged vessels in international waters. The office may also investigate accidents when the Board determines that they are catastrophic or the accident involves recurring problems.

The US Coast Guard conducts preliminary investigations of all marine casualties and notifies the NTSB when an event qualifies as a major marine casualty, which is a casualty that results in:

- The loss of six or more lives.
- The loss of a mechanically propelled vessel of 100 or more gross tons.
- Property damage initially estimated to be $500,000 or more.
- A serious threat, as determined by the commandant of the US Coast Guard with the concurrence of the NTSB chairman, to life, property, or the environment by hazardous materials.

The NTSB is the only federal organization that performs independent, comprehensive, and transparent multidisciplinary investigations to determine the probable cause of marine accidents, with the goal of making safety recommendations to prevent similar events from occurring in the future. The thoroughness and independence of these investigations maintain public confidence in marine transportation systems and provide policymakers with unbiased analysis.

After investigating each major marine casualty, the office identifies safety issues and releases an investigation report with a probable cause, which may include safety recommendations to federal government agencies (such as the Coast Guard), state agencies, vessel owners and operators, vessel classification societies, or maritime industry organizations. We may also issue close-out memos noting the general facts of an accident in cases where we do not produce an investigation report.

The Office of Marine Safety comprises the Investigations Division and the Product Development Division.

Investigations Division

The Investigations Division coordinates and oversees investigations of major marine casualties. The division manages the multidisciplinary teams that launch to accident sites, collect information, and analyze collected information to determine the probable cause of an accident. It is comprised of investigators that specialize in disciplines including navigation and ship handling, marine propulsion and ship systems, naval architecture, lifesaving and survival factors, and human factors.

Product Development Division

The Product Development Division works with the Investigations Division to produce all marine investigation reports, safety alerts, and safety recommendations reports. The division, which consists of technical writer-editors, is responsible for quality control of all products and ensuring adherence to agency publications guidelines. The division is also responsible for drafting and editing the annual *Safer Seas Digest* publication, as well as responding to notices of proposed rulemaking, petitions for reconsideration, and general correspondence.

Accomplishments and Ongoing Efforts

Office accomplishments include issuing products related to transportation safety arising from completed and ongoing investigations. Products completed between October 1, 2024, and September 30, 2025, are highlighted below, along with information about other efforts and focus areas important to our mission.

Investigation Reports

Investigation reports are issued for accident or incident investigations and may contain a probable cause determination and safety recommendations, depending on the scope of the investigation and the safety issues identified. For select, larger scale investigations, the office launches an investigation team and presents a comprehensive investigation report to the Board. Investigations that are limited in scope are primarily intended to determine probable cause; the resultant report may be issued by the office director under delegated authority or may be adopted by the Board. Special investigation reports usually involve analysis of data from multiple accidents centered around a common safety issue and result in safety recommendations. A report containing only safety recommendations can be issued at any time during an investigation. If the Board determines that a recommended course of action requires immediate attention to avoid imminent loss of life from a similar accident, the safety recommendation is designated "urgent."

From October 1, 2024, through September 30, 2025, the Office of Marine Safety issued a total of 43 investigation reports, three of which identified safety issues that led to the issuance of 19 new safety recommendations (15 marine safety recommendations and four urgent highway safety recommendations).

Below are summaries of a sampling of the marine investigation reports completed between October 1, 2024, and September 30, 2025, arranged by report date.

Collision of Multi-Purpose Carrier *BBC Africa* with Bulk Carrier *Common Faith*
Houston, Texas
August 25, 2023

On August 25, 2023, about 10:12 a.m. local time, the multipurpose carrier *BBC Africa* lost primary steering as it was departing the Manchester Terminal on the Houston Ship Channel in Houston, Texas, and struck the moored bulk carrier *Common Faith*. There were no injuries, and no pollution was reported. Damage to the vessels was estimated at $1.1 million.

We determined that the probable cause of the collision of the multipurpose carrier *BBC Africa* with the bulk carrier *Common Faith* was the *BBC Africa*'s loss of the primary steering control system due to a steering control system component failure. Contributing to the collision was the delayed response from the ship's crew to implement the emergency steering procedure from the bridge.

Key issues identified and evaluated as part of the investigation and report included the importance of investigating steering control system failures to identify causes and resolving any underlying system discrepancies. Training in steering recovery procedures, including scenario-based drills for bridge and engine teams, is critical to ensure crews can respond in the shortest possible time.

Recommendations: None
Report Date: August 15, 2025

Fire aboard Yacht *Flagship*
Miami, Florida
April 28, 2024

On April 28, 2024, at 10:31 a.m. local time, a fire started on board the uncrewed yacht *Flagship* while it was docked at an enclosed bay of a shipyard on the Miami River in Miami, Florida. Shoreside firefighters moved the vessel to a nearby sea wall, where they extinguished the fire. The vessel eventually sank at the sea wall. There were no injuries, and no pollution was reported. The *Flagship* was declared a total loss, valued at $5 million.

We determined that the probable cause of the fire on the yacht *Flagship* was the thermal runaway and explosion of the 24-volt lithium-ion battery bank due to the inoperable battery management systems, resulting in the practice of manually charging the lithium-ion batteries with a portable battery charger, which compromised the safe monitoring of the vessel's lithium-ion battery systems.

Key issues identified and evaluated as part of the investigation and report included the shipyard's unfamiliarity with the unique electrical power and lithium-ion battery system installed on this foreign-built, first-of-its-class yacht. The shipyard used a portable battery charger to charge the yacht's batteries, bypassing the yacht's battery monitoring system.

Recommendations: None
Report Date: July 28, 2025

Contact of *Joe B. Wyatt* Tow with Fort Madison Bridge Protection Cell and Fendering System
Fort Madison, Iowa
May 9, 2024

On May 9, 2024, about 1:12 p.m. local time, the towing vessel *Joe B. Wyatt* was transiting downbound on the Mississippi River near Fort Madison, Iowa, pushing 13 loaded hopper barges and two empty tank barges. While transiting through the Fort Madison Bridge, the tow struck a protection cell and fendering system for the bridge and broke apart. There were no injuries, and no pollution was reported. Damage to the protection cell, fendering system, barges, and the *Joe B. Wyatt* was estimated at $3.28 million.

We determined that the probable cause of the contact of the *Joe B. Wyatt* tow with a protection cell and the fendering system of the Fort Madison Bridge was the pilot overcompensating for anticipated river crosscurrents during the tow's approach to a bridge.

Key issues identified and evaluated as part of the investigation and report included human factors issues (pilot training and experience, work-rest cycle, distraction, and toxicology), bridge clearances, and channel hydrology.

Recommendations: None
Report Date: July 10, 2025

Collision of *William B Klunk* Tow with Moored Barges
Baton Rouge, Louisiana
April 17, 2024

On April 17, 2024, about 4:55 p.m. local time, the towing vessel *William B Klunk* was pushing 22 barges downbound on the Lower Mississippi River at mile 227, near Baton Rouge, Louisiana, when the tow collided with moored barges at a fleeting area. Thirteen barges broke away from the *William B Klunk* tow, and three barges broke away from the fleeting area, resulting in damage to the barges, a fleet crew boat, and two mooring dolphins. There was one minor injury, and no pollution was reported. Total damages were estimated to be $810,000.

We determined that the probable cause of the collision of the towing vessel *William B Klunk* and tow with moored barges was the *William B Klunk* pilot becoming distracted due to cell phone use in the minutes leading up to the collision. Contributing was the pilot's fatigue due to limited sleep the night before the casualty, which decreased his attentiveness and vigilance while operating the vessel.

Key issues identified and evaluated as part of the investigation and report included the use of cell phones and other personal electronic devices by on-duty crewmembers in a safety-critical positions. Use of cell phones, including company cell phones, should never interfere with a watchstander's primary task to safely navigate a vessel and maintain a proper lookout. To reduce the risk of cell phone distraction, operating companies should establish protocols regarding both personal and work-related cell phone use, and vessel personnel should understand the importance in following them.

Recommendations: None
Report Date: June 24, 2025

Capsizing and Sinking of Towing Vessel *Baylor J. Tregre*
Gulf of America, 23 nautical miles south of Galveston, Texas
May 13, 2024

On May 13, 2024, about 4:57 p.m. local time, the towing vessel *Baylor J. Tregre* was towing the ocean barge *MARMAC 27* in the Gulf of America, about 23 miles south of Galveston, Texas, when the towing vessel capsized and sank. All four crewmembers abandoned the vessel and were rescued by the US Coast Guard. One crewmember sustained minor injuries. There was no pollution reported. Damage to the towing vessel was estimated at $2 million.

We determined that the probable cause of the capsizing and sinking of the towing vessel *Baylor J. Tregre* was the mate's inability to maneuver the tow into the wind due to the overwhelming towline force generated by the towed barge during the sudden onset of severe weather, resulting in unrecoverable heeling.

Key issues identified and evaluated as part of the investigation and report included the importance of pre-voyage planning for heavy weather and remaining vigilant about severe weather forecasts.

Recommendations: None
Report Date: May 15, 2025

Contact of Bulk Carrier *American Mariner* with Munuscong Channel Junction Light
St. Marys River, Michigan
March 28, 2024

On March 28, 2024, about 12:18 a.m. local time, while transiting upbound in the St. Marys River, about 25 miles south of Sault Ste. Marie, Michigan, the bulk carrier *American Mariner* experienced a steering failure and struck the Munuscong Channel Junction Light, a 31-foot-diameter cylindrical concrete structure with a navigation aid on top. The vessel began taking on water; pumps stabilized the flooding. None of the 18 crewmembers on board

was injured, and no pollution was reported. Damage to the vessel was estimated at $800,750, and damage to the Munuscong Channel Junction Light was estimated at $1.25 million for repairs.

We determined that the probable cause of the contact of the bulk carrier *American Mariner* with the Munuscong Channel Junction Light was O-ring-type material debris in the steering gear system's hydraulic oil becoming lodged within a control motor, which caused it to seize, resulting in the rudder locking at its last ordered position.

Key issues identified and evaluated as part of the investigation and report included the importance of investigating steering control system failures to identify causes and resolving any underlying system discrepancies. Training in steering recovery procedures, including scenario-based drills for bridge and engine teams, is critical to ensure crews can respond in the shortest possible time.

Recommendations: None
Report Date: April 29, 2025

Fire aboard Roll-on/Roll-off Container Vessel *Grande Costa D'Avorio*
Newark, New Jersey
July 5, 2023

On July 5, 2023, about 9:00 p.m. local time, the roll-on/roll-off container vessel *Grande Costa D'Avorio* was docked at Port Newark, New Jersey, when a passenger vehicle being used to push nonrunning cargo vehicles onboard the vessel caught fire in an interior garage deck. Vessel crewmembers attempted to put out the fire using portable fire extinguishers and the ship's fixed gas (carbon dioxide) fire extinguishing system. The crew's attempts were unsuccessful and land-based firefighters were called to respond. While attempting to put out the fire, two of the land-based firefighters were trapped inside one of the burning garage spaces and died in the fire. Six additional emergency responders were injured during the firefighting and rescue operations. The damage to the vessel was estimated to be over $23 million.

We determined that the probable cause of the fire aboard the roll-on/roll-off container vessel *Grande Costa D'Avorio* was the use of a passenger vehicle as a pusher vehicle in an industrial application for which it was not intended, which led to the vehicle's transmission fluid overheating, boiling over, and igniting on a hot engine surface.

Key issues identified and evaluated as part of the investigation and report included the inappropriate use of a passenger vehicle as a pusher vehicle, the absence of operating controls for the vessel's fire boundary garage

doors outside of the burning space, and the land-based firefighters' lack of training in how to safely fight shipboard fires.

We issued safety recommendations to the US Coast Guard; the Occupational Safety and Health Administration; the Newark Fire Division; the Port Authority of New York and New Jersey; RINA Services, S.p.A.; the American Association of Port Authorities; the International Association of Fire Fighters; the International Association of Fire Chiefs; Grimaldi Deep Sea; Ports America; and American Maritime Services.

Recommendations: 11 new
Report Date: April 15, 2025

Contact of Tank Vessel *Hafnia Amessi* with Pier
Charleston, South Carolina
January 14, 2024

On January 14, 2024, about 10:20 am local time, the tanker *Hafnia Amessi* was transiting outbound on the Cooper River when the vessel struck the Naval Weapons Station Pier. Hull plating on the vessel's starboard side, a cement platform on the end of the pier, and a protective dolphin were damaged. There were no injuries, and no pollution was reported. Damage to the vessel and pier was estimated at $8.1 million.

We determined that the probable cause of the contact of the tanker *Hafnia Amessi* with Naval Weapons Station Pier B was the pilot navigating the vessel too close to the east bank while approaching the turn immediately before the pier, exposing the tanker to bank effect, which the pilot's subsequent rudder and engine orders could not overcome.

Key safety issues identified and evaluated as part of the investigation included the impact of vessel speed on the strength of hydrodynamic forces, such as bank effect, and safe pilotage in narrow channels.

Recommendations: None
Report Date: March 24, 2025

Safeguarding Bridges from Vessel Strikes: Need for Vulnerability Assessment and Risk Reduction Strategies
Baltimore, Maryland
March 26, 2024

On March 26, 2024, about 1:30 a.m. local time, the 984-foot-long Singapore-flagged containership *Dali* was transiting out of Baltimore Harbor when it experienced a loss of electrical power and propulsion and struck the

Francis Scott Key Bridge. A portion of the bridge subsequently collapsed into the river, and portions of the pier, deck, and truss spans collapsed onto the vessel's forward deck. A seven-person road maintenance crew and one inspector were on the bridge when the vessel struck it. The inspector escaped unharmed, and one of the construction crewmembers survived the collapse with serious injuries. Six construction workers died as a result of the bridge collapse.

This investigation is continuing, with a full report anticipated in FY 2026. A key safety issue identified during this investigation was that many bridges over navigable waterways transited by oceangoing ships have not been assessed for vulnerability to ship strikes. We issued urgent safety recommendations to the Federal Highway Administration, the US Coast Guard, the US Army Corps of Engineers, and the 30 owners of the 68 bridges over navigable waterways frequented by oceangoing vessels to assess the bridges' vulnerability to ship strike.

Recommendations: 4 new (urgent)
Report Date: March 18, 2025

Engine Room Fire aboard Cargo Vessel *Stride*
LaPorte, Texas
January 8, 2024

On January 8, 2024, about 3:30 a.m. local time, a fire broke out in the engine room aboard the cargo vessel *Stride* during bunkering operations while it was docked in LaPorte, Texas. Crewmembers shut down all ventilation to the engine room, and the fire self-extinguished. Shoreside firefighters and the ship's emergency teams removed three crewmembers from the engine control room who were unable to escape the fire; two died on scene, and one was seriously injured. The vessel was declared a constructive total loss, valued at $12 million.

We determined that the probable cause of the fire on board the cargo vessel *Stride* was diesel oil cascading onto operating machinery in the engine room during bunkering due to an incorrect valve type installed into a diesel oil tank fill line, which directed fuel oil up a vent line which then showered into the engine room.

Key safety issues identified and evaluated as part of the investigation included the failure to install the correct type of valve in a fuel system, and the need to assign an adequate number of personnel to monitor fueling operations.

Recommendations: None
Report Date: January 29, 2025

Engine Room Fire Aboard Fishing Vessel *Three Girls*
Gulf of Maine, 118 miles ESE of Portland, Maine
August 11, 2024

On August 11, 2024, about 8:56 pm local time, while the fishing vessel *Three Girls* was engaged in fishing operations in the Gulf of Maine about 118 miles east-southeast of Portland, Maine, a fire broke out in the vessel's engine room. The five crewmembers and a National Marine Fisheries Service observer abandoned the burning vessel into a life raft and were rescued by a US Coast Guard cutter crew that same evening. There were no injuries, and no pollution was reported. Damage to the vessel was estimated at $1.3 million.

We determined that the probable cause of the fire aboard the fishing vessel *Three Girls* was likely the failure of a component on the hydraulic system (located in the engine room) for on-deck fishing equipment, resulting in pressurized hydraulic oil spraying onto a running engine's exhaust system and igniting.

Key safety issues identified and evaluated as part of the investigation included the need to shut off engines and close ventilation openings during engine room fires.

Recommendations: None
Report Date: January 22, 2025

Fire aboard Passenger Vessel *Spirit of Boston*
Boston, Massachusetts
March 24, 2023

On March 24, 2023, about 10:52 p.m. local time, a fire broke out in the deck 1 wait station on the passenger vessel *Spirit of Boston* while it was moored at the Commonwealth Pier in Boston Harbor, Boston, Massachusetts. All 16 people aboard evacuated the vessel to the pier. The local fire department responded and extinguished the fire. There were no injuries, and no pollution was reported. Damage to the vessel was estimated at $3.1 million.

We determined that the probable cause of the fire aboard the passenger vessel *Spirit of Boston* was the improper extinguishing and disposal of a chafing fuel heating canister due to the vessel operator's lack of documented procedures for handling open-flame devices, which led to the ignition of a plastic glassware rolling rack.

Key safety issues identified and evaluated as part of the investigation included the improper handling and disposal of chafing fuel heating canisters, the lack of a crewmember trained in firefighting on board when the fire started,

and the operator's lack of documented procedures on how to handle open-flame devices on board its vessels. Safety recommendations were issued to the US Coast Guard, the Passenger Vessel Association, and City Cruises US.

Recommendations: 4 new, 1 reiterated
Report Date: December 13, 2024

Safety Alerts

A safety alert is a short informational bulletin that pinpoints a particular safety issue. It contains information based on the findings of one or more NTSB investigations and enhances the dissemination of safety information and actions to the traveling public; federal, state, and local officials; and transportation operators about safety hazards and practical remedies identified through NTSB accident investigations, safety research, and safety recommendations.

Land-Based Firefighters: Know the Risks and Challenges Posed by In Port Vessel Fires

Training and vessel familiarization is vital for effective firefighting. Many land-based firefighters lack the necessary training and familiarity with vessel layouts and fire protection systems to effectively fight in-port vessel fires. Fire departments that serve ports can improve the safety of their firefighters and achieve better outcomes when responding to vessel fires by sending their personnel to advanced shipboard firefighting training, developing shipboard firefighting standard operating procedures that include vessel familiarization training, vessel fire strategy and tactics, and communications. Additionally, fire departments should work in advance with local ports to organize vessel familiarization tours and to conduct joint exercises and drills.

Issue Date: September 2025

Other Efforts and Focus Areas

Safer Seas Digest 2024: Annual Publication

The *Safer Seas Digest 2024* was released in May 2025. The digest comprises concise summaries of the previous year's casualty investigations and represents the NTSB's continuing commitment to sharing the lessons that we learn through our marine investigations to inspire safety improvements. Some of the safety issues examined in the 2024 edition included the following:

- Implementing safety management systems.
- Maintaining alertness and vigilance.
- Accounting for hydrodynamic forces.

- Mitigating fire risks.
- Installing and testing bilge alarms.
- Ensuring watertight integrity.
- Preventing hull corrosion.
- Maintaining unimpeded return flow in diesel engine fuel oil return systems.

Ongoing Significant Marine Accident Investigations

Location	Description	Date	Fatalities
Lake Tahoe, California	Capsizing of Recreational Vessel Over the Moon	6/21/2025	8
New York, New York	Contact of tall ship *ARM Cuauhtémoc BE 01* with the Brooklyn Bridge	5/17/2025	2
Juneau, Alaska	Capsizing of fishing vessel *Wind Walker*	12/1/2024	5
Jacksonville, Florida	Fire aboard the dredge *Stuyvesant*	11/2/2024	1
Monroe, Michigan	Collision between National Oceanic and Atmospheric Administration uncrewed surface vessel and a recreational vessel	8/10/2024	-
Baytown, Texas	Collision between cargo ship *Yangze 7* and towing vessel *Miss Peggy*	7/19/2024	1
Baltimore, Maryland	Contact of containership *Dali* with the Francis Scott Key Bridge	3/26/2024	6
Dutch Harbor, Alaska	Fire aboard cargo ship *Genius Star XI*	12/27/2023	-

Note: We are devoting significant resources to the investigations listed and anticipate producing a report upon the completion of each investigation. These investigations were ongoing as of September 30, 2025. Please see NTSB.gov for more information on the status of these investigations.

RAILROAD, PIPELINE AND HAZARDOUS MATERIALS INVESTIGATIONS

Fiscal Year	($000s)	FTEs	Pos.
FY 2026 Estimate	$15,326	49	50
FY 2027 Request	$15,315	49	50
Increase/Decrease	($11)	-	-

Overview of the Request

The requested funding level assumes no pay raise in FY 2027 and incorporates modest, targeted reductions in operational expenses, with a focus on internal efficiencies, to partially offset a projected 2-percent increase in nonpay inflationary costs. These adjustments are designed to preserve core mission capabilities and sustain priority activities while limiting growth in administrative support costs.

Program Description

The Office of Railroad, Pipeline and Hazardous Materials Investigations comprises four divisions: Railroad Division, Pipeline and Hazardous Materials Division, System Safety, and Report Development. Based on the findings of our investigations, we may issue safety recommendations to federal and state regulatory agencies; unions, industry, and safety standards organizations; carriers and pipeline operators; equipment and container manufacturers; producers and shippers of hazardous materials; and emergency response organizations. The office may also issue safety alerts to industry.

Railroad Division

Staff investigate accidents and incidents involving passenger and freight railroads, commuter rail transit systems, and other fixed guideway systems. Accidents are typically collisions or derailments, some of which involve fatalities, severe injuries, hazardous materials release, or residence evacuation. The division is separated into four branches of multidisciplinary investigative teams with expertise in the areas of track and engineering, operations, mechanical, signal and train control, survival factors, crashworthiness, and emergency response.

The division does not investigate every railroad accident reported to the Federal Railroad Administration (FRA), nor every rail transit accident reported to the Federal Transit Administration. To use NTSB resources most efficiently and effectively, criteria have been established to help identify those accidents

that pose significant safety risks. The division also assesses selected railroad safety issues, often based on a set of accident investigations with similar safety issues. In other cases, staff may focus on analyzing regulations, railroad safety programs or procedures, or audit reviews of management and operations practices and organizational safety culture.

Pipeline and Hazardous Materials Division

Staff in the Pipeline and Hazardous Materials Division investigate accidents that threaten public safety by the release of hazardous materials. The division is separated into two branches: Pipeline Investigations and Hazardous Materials Investigations, with investigators having experience in the private and public sectors and expertise in civil engineering, mechanical engineering, petroleum engineering, geology, pipeline engineering, hazardous materials, hazardous materials packaging, environmental response, and emergency response.

Pipeline investigations focus on accidents that occur during the transport of natural, flammable, toxic, or corrosive gas or hazardous liquids, such as crude oil or gasoline, through pipeline systems. The branch leads investigations into pipeline accidents that involve fatalities or result in substantial property damage or significant injury to the environment.

Hazardous materials investigations focus on the release of hazardous materials and emergency response in all modes of transportation, including aviation, highway, railroad, marine, and pipeline. The branch may also investigate select hazardous materials accidents that highlight safety issues of national importance or involve a specific accident prevention issue.

System Safety Division

System Safety Division staff are responsible for the following:

- Supporting Railroad Division and the Pipeline and Hazardous Materials Division investigations.
- Investigating the role of system safety management in the regulated transportation modes, as well as the role of individual, workgroup, and organizational factors in an accident.
- Examining the role of regulatory, industry, and company practices in the accidents under investigation.
- Overseeing emerging safety regulations, methods, and data related to railroad, pipeline, and hazardous materials.

Staff typically lead inquiries that extend well beyond the debris field of an accident site. Operational system failures are rarely isolated to the last component to break or malfunction; rather, the reasons for system failures are often traceable back to management decisions and corporate cultural influences. Once these systemic failures are identified and understood, staff develop corresponding safety recommendations. Specific topics evaluated include alcohol and other drug use, work-rest cycles and human fatigue, individual and team training, organizational safety culture, safety management, and public awareness.

Report Development Division

The Report Development Division is responsible for the following:

- Developing and editing railroad, pipeline, and hazardous materials investigation reports, coordinating the presentation of these reports to the Board, and issuing safety recommendations.
- Writing and editing responses to notices of proposed rulemaking; congressional testimony; speeches on matters pertaining to railroad, pipeline, or hazardous materials safety; and replies to safety inquiries from Congress, other federal agencies, state and local agencies, industry, and the public.
- Implementing the agency's guidance, protocols, and applicable portions of NTSB Board orders and operations bulletins related to product standardization and development.

Accomplishments and Ongoing Efforts

Office accomplishments include issuing products related to transportation safety arising from completed and ongoing investigations. Products completed between October 1, 2024, and September 30, 2025, are highlighted below, along with information about other efforts and focus areas important to our mission.

Investigation Reports

Investigation reports are issued for accident or incident investigations and may contain a probable cause determination and safety recommendations, depending on the scope of the investigation and the safety issues identified. For select, larger scale investigations, the office launches an investigation team and presents a comprehensive investigation report to the Board. Investigations that are limited in scope are primarily intended to determine probable cause; the resultant report may be issued by the office

director under delegated authority or may be adopted by the Board. Special investigation reports usually involve analysis of data from multiple accidents centered around a common safety issue and result in safety recommendations. A report containing only safety recommendations can be issued at any time during an investigation. If the Board determines that a recommended course of action requires immediate attention to avoid imminent loss of life from a similar accident, the safety recommendation is designated "urgent."

From October 1, 2024, through September 30, 2025, the Office of Railroad, Pipeline and Hazardous Materials Investigations issued four investigation reports identifying safety issues that led to the issuance of 32 new safety recommendations; we also issued a total of 14 investigation reports (two pipeline and 12 railroad) that solely determined probable cause.

Below are summaries of select investigation reports completed between October 1, 2024, and September 30, 2025, arranged by report date.

Eliminate Fire Risk in the Southeastern Pennsylvania Transportation Authority Silverline IV Fleet
Ridley Park, Pennsylvania
February 6, 2025

On February 6, 2025, the lead railcar of Southeastern Pennsylvania Transportation Authority (SEPTA) train 3223 caught fire as the train departed Crum Lynne Station in Ridley Park, Pennsylvania. Four passengers reported minor injuries, and the railcar was destroyed. Preliminary findings indicate that the fire began with an electrical defect in one of the train's Silverliner IV railcars. Four additional fires have since occurred involving SEPTA's Silverliner IV fleet, including two after SEPTA's initial efforts at mitigating fire risks.

During our ongoing investigation into a February 6, 2025, fire in Ridley Park, Pennsylvania, and four additional fires involving Silverliner IV railcars over the following months, we identified the need for SEPTA to take immediate action to address concerning electrical fires aboard its fleet of Silverliner IV railcars in passenger service.

During our ongoing investigation we identified the following:

- The outdated design of Silverliner IV railcars, in combination with SEPTA's maintenance and operating practices, represents an immediate and unacceptable safety risk because of the incidence and severity of electrical fires that can spread to occupied compartments.
- SEPTA's current operating practices for the Silverliner IV fleet are insufficient to protect passengers and crews because railcars with

electrical faults are not being identified and promptly removed from service.

- The recurrence of fires despite SEPTA's attempted operational, maintenance, and engineering changes is consistent with organizational factors preventing proposed risk mitigations from being effectively deployed.
- The risks posed by the Silverliner IV's outdated design cannot be fully addressed without an extensive fleet retrofit or replacement.
- Operational, maintenance, and engineering changes undertaken by SEPTA require ongoing monitoring to verify that they are mitigating risks to passengers.

As a result of this investigation, the NTSB issued urgent safety recommendations to SEPTA.

Recommendations: 3 new (urgent)
Report Date: September 30, 2025

Enbridge Inc. Natural Gas-Fueled Building Explosion
Youngstown, Ohio
May 28, 2024

On May 28, 2024, about 2:44 p.m. local time, a natural gas–fueled explosion at the Realty Building in Youngstown, Ohio, caused one fatality and injured nine people who required hospitalization. The natural gas originated from a 1-inch-diameter steel service line (accident service line) in the building's basement. The explosion also caused significant structural damage to the building, which contained a Chase Bank and 22 apartment residences.

We determined that the probable cause of the explosion and subsequent fatality was a cut by a scrap-removal crew into an active Enbridge Inc. service line, which was incorrectly documented as having been abandoned years earlier by the pipeline owner at the time, Dominion Energy Inc., and which allowed natural gas to leak into the Realty Building where it was ignited by an unknown source.

Contributing to the severity of the accident were Chase Bank's emergency procedures that did not require employees to immediately evacuate upon being alerted to a natural gas leak.

Recommendations: None
Report Date: August 11, 2025

Middlesex Corporation Employee Fatality on Housatonic Railroad Company-Operated Line
Great Barrington, Massachusetts
August 4, 2023

On August 4, 2023, about 10:05 a.m., the operator of a roadway maintenance machine struck and killed a Middlesex Corporation employee performing track work on the Berkshire Line in Great Barrington, Massachusetts. The roadway maintenance machine involved in the accident was a tie drilling machine, which is commonly referred to as a driller. About an hour before the accident, the driller experienced a mechanical issue that required the driller operator to remove the driller from the work location for repairs. The driller operator was part of a four-member work group of Middlesex employees; one of those employees accompanied him when he departed the job location on the driller, while the other two employees remained working (on foot) at the job location. After repairs had been made to the driller, the driller operator traveled about 1.4 miles in reverse along the Berkshire Line back to the job location to resume work. While conducting this reverse movement, the driller operator did not see that his two fellow Middlesex employees, who had remained working at the job location, were on the same track as the roadway maintenance machine; subsequently, the driller struck and killed one of the employees.

We determined that the probable cause of the Great Barrington, Massachusetts, roadway maintenance worker fatality was the Middlesex Corporation driller operator's failure to actively observe that the driller's path of travel was clear.

Contributing to the accident was:

- the Housatonic Railroad Company (HRRC) roadway worker-in-charge's (RWIC's) lack of awareness of daily tasking, which prevented him from conducting an adequate job briefing for all tasks being performed;
- the RWIC's lack of awareness of on-track roadway maintenance machine movements without his knowledge or authorization;
- the absence of a required second RWIC for work group 2; and
- no communications between the RWIC and work group 2 about their work activities prior to the accident, which resulted in his lack of awareness that a second work group or work site existed.

As a result of this investigation, we issued safety recommendations to the FRA, all Class 1 Railroads, the HRRC, Middlesex Corporation, the American

Short Line and Regional Railroad Association, and the National Railroad Construction and Maintenance Association.

We identified the following safety issues during this investigation:

- Unsafe operation of the tie drilling machine.
- Need for roadway maintenance machines to be equipped with new technologies, such as collision warning and avoidance systems to further advance on-track safety and eliminate human error.
- Uncoordinated and inadequate communication between the HRRC and Middlesex that failed to identify repeated unsafe actions of the HRRC and Middlesex employees.
- The FRA's lack of annual evaluations to assess which railroads have inadequate safety performance and, therefore, are required to establish risk reduction programs.

Recommendations: 6 new, 1 reiterated
Report Date: August 4, 2025

CSX Transportation Conductor Trainee Fatality
Baltimore, Maryland
June 26, 2023

On June 26, 2023, about 8:06 p.m. local time, a CSX Transportation (CSX) conductor trainee in phase II of conductor training died when he fell from an intermodal railcar during a shoving movement and was struck by the train he was riding at Seagirt Marine Terminal in Baltimore, Maryland.

We determined that the probable cause of the Baltimore, Maryland, accident was the conductor trainee, who CSX sent into the field without performance-based verification that he could safely ride an intermodal railcar, riding the intermodal railcar in an unstable position that left him vulnerable to slipping and falling into the train's path.

Contributing to the accident were:

- Deficient CSX operating rules, which did not provide adequate protection against the risk of slipping.
- Deficient CSX training, which did not provide sufficient training on how to ride intermodal railcars.
- The lack of research-based federal guidance for the safe use of railcar safety appliances when riding equipment.

As a result of this investigation, we issued safety recommendations to the FRA, all Class 1 Railroads, and CSX.

Recommendations: 5 new
Report Date: June 25, 2025

Union Pacific Railroad Train Collision and Conductor Fatality
Melrose Park, Illinois
July 6, 2024

On July 6, 2024, about 1:36 a.m. local time, a Union Pacific Railroad (UP) conductor died in a raking collision while protecting a shoving movement at UP's Proviso Yard in Melrose Park, Illinois. At the time of the accident, eastbound train MPRNL-06 was traveling along the South Melrose Track out of Proviso Yard 4. At the same time, train MCBCH-05 was shoving west on the City Lead Track, which merges with South Melrose Track. The conductor of train MCBCH-05 was positioned on the leading end of a tank car when it struck the right side of train MPRNL-06.

We determined that the probable cause of the UP train collision was the conductor, who UP sent into the field without performance-based verification that he could safely navigate the territory, not alerting the engineer to stop the train before reaching the designated stopping point.

Contributing to the accident was UP's failure to provide the required and requested assistance to the inexperienced conductor who was not familiar with the territory. Further contributing to the accident was the striking train crew proceeding with riding the shoving movement after being informed by the yard controller that no additional support would be provided.

Recommendations: None
Report Date: June 25, 2025

Third Coast Infrastructure LLC Crude Oil Release
Gulf of America, Main Pass 69, Louisiana State Waters
November 15, 2023

On November 15, 2023, about 7:00 p.m. local time, an 18-inch underwater crude oil pipeline released about 1.1 million gallons of crude oil into an unusually sensitive area in Main Pass 69 in the Gulf of America, southeast of Venice, Louisiana, in Louisiana state waters. The pipeline is part of the Main Pass Oil Gathering pipeline system, owned by Houston, Texas–based midstream company Third Coast Infrastructure LLC and operated by affiliate Panther Operating Company. No injuries were reported, and the crude oil did not ignite.

We determined the probable cause of the 18-inch diameter Main Pass Oil Gathering pipeline crude oil release was the loss of seal in a collet grip pipeline fitting from pipeline movement caused by geohazards that had not been addressed previously by Third Coast's insufficient integrity management program.

Contributing to the volume of crude oil released was an inappropriate control room response that did not shut down the pipeline system because of the controller's uncertainty about the accuracy of data from a supervisory control and data acquisition system that indicated but did not alert the operator of a leak for more than 11 hours.

Recommendations: None
Report Date: June 13, 2025

CSX Transportation Employee Fatality
Roanoke Rapids, North Carolina
February 13, 2024

On February 13, 2024, about 1:38 p.m. local time, a CSX maintenance-of-way employee died when a ballast regulator reversed direction and struck the employee in the track gauge in Roanoke Rapids, North Carolina. The struck employee was the foreman of a CSX crosstie replacement team that was using the ballast regulator and other equipment to perform track resurfacing and crosstie replacement near milepost 81.61 on a CSX North End Subdivision industry spur track.

We determined that the probable cause of the CSX maintenance-of-way employee fatality was the ballast regulator operator's lack of awareness that the employee was standing in the track gauge before the ballast regulator operator initiated an unannounced reverse movement and the foreman's lack of awareness of the ballast regulator moving toward him. Contributing to the accident were incomplete communications regarding the movement of the ballast regulator at the 10th Street highway–rail grade crossing. Further contributing to the accident was a nonoperational change-of-direction alarm that did not sound and the lack of sound from the horn when the machine reversed direction.

Recommendations: None
Report Date: April 14, 2025

Union Pacific Railroad Train Collision
Chico, Texas
April 16, 2023

On April 16, 2023, about 6:44 p.m. local time, a southbound UP train crossed a main track switch lined toward yard track C-4 and collided with a parked UP train in Chico Yard in Chico, Texas. As a result of the collision, 12 loaded hopper railcars and two locomotives from the southbound train derailed, and one empty gondola railcar and two locomotives from the parked train derailed. Two crewmembers from the southbound train were seriously injured. UP estimated damages to equipment and track infrastructure to be about $4.9 million.

We determined that the probable cause of the collision was the lining of the C-yard main track switch to yard track, a human error made by the conductor of the parked train. Contributing to the collision was the inability of the dispatcher and the crew of the southbound train to determine the position of the main track switch in nonsignaled territory in time to prevent the collision.

Recommendations: None
Report Date: November 13, 2024

UGI Corporation Natural Gas-Fueled Explosion and Fire
West Reading, Pennsylvania
March 24, 2023

On March 24, 2023, around 4:55 p.m. local time, natural gas, which was transported through a UGI Corporation–owned pipeline, leaked into and accumulated in the basement of an R.M. Palmer Company candy factory building in West Reading, Pennsylvania. The gas ignited, causing an explosion and fire that killed 7 Palmer employees, injured 10 people, and destroyed the building. Another Palmer building, as well as an adjacent apartment building, were also severely damaged. Three families were displaced from the apartment building.

We determined that the probable cause of the explosion was degradation of a retired 1982 Aldyl A polyethylene service tee with a Delrin polyacetal insert that allowed natural gas to leak and migrate underground into the R.M. Palmer Company candy factory buildings, where it was ignited by an unknown source. Contributing to the degradation of the service tee and insert were significantly elevated ground temperatures from steam escaping R.M. Palmer Company's corroded underground steam pipe, located near the service tee, that had been unmarked and cracked. Contributing to the steam pipe crack was soil movement and R.M. Palmer Company's lack of awareness of the pipe's corroded state. Contributing to the natural gas leak was UGI

Corporation's lack of awareness of the nearby steam pipe, which led to an incomplete integrity management program evaluation that did not consider or manage the risk posed by the steam pipe. Contributing to the accident's severity was R.M. Palmer Company's insufficient emergency response procedures and training of its employees, who did not understand the hazard and did not evacuate the buildings before the explosion.

The NTSB identified the following safety issues during this investigation:

- Degradation of a retired service tee.
- Insufficient consideration of threats to pipeline integrity.
- The risk associated with unmarked private pipeline assets crossing public rights-of-way (for example, a public street).
- Delayed evacuation of Building 2 despite detection of natural gas.
- Natural gas safety messaging that may not reach certain members of the public and insufficient guidance on gas leak emergency procedures.
- Absence of natural gas detection alarms in commercial buildings.
- Insufficient accessibility of gas distribution line valves.

As a result of this investigation, we issued safety recommendations to the Pipeline and Hazardous Materials Safety Administration; the Occupational Safety and Health Administration; the 50 states, Commonwealth of Puerto Rico, and the District of Columbia; the Pennsylvania Public Utility Commission; the American Gas Association; the American Petroleum Institute; the Gas Piping Technology Committee; the Common Ground Alliance; the International Code Council; the National Fire Protection Association; UGI Corporation; and R.M. Palmer Company.

Recommendations: 18 new, 1 reiterated
Report Date: March 18, 2025

BNSF Railway Derailment with Bridge Strike and Fatality
Pueblo, Colorado
October 15, 2023

On October 15, 2023, about 3:24 p.m. local time, a southbound BNSF Railway freight train derailed 31 hopper cars loaded with coal and subsequently killed a nearby driver in Pueblo, Colorado. The hopper cars derailed near a track switch north of a railroad bridge that crosses over Interstate 25. Derailed hopper cars struck and partially collapsed the bridge

over the northbound lanes. Six derailed hopper cars fell to the interstate below, with at least one falling on a northbound truck-tractor in combination with a utility trailer, killing the driver. The combination vehicle came to rest beneath the collapsed bridge span, derailed hopper cars, and lading. No members of the train crew were injured.

We determined that the probable cause of this derailment was the train encountering a rail break that occurred when a mismatched thermite weld failed. The thermite weld cracked near the rail's base because the welder, for unknown reasons, likely did not use a compromise kit during the welding, as required by BNSF Railway procedures.

Recommendations: None
Report Date: February 12, 2025

CSX Transportation Head-on Collision with Stationary Train
Folkston, Georgia
April 15, 2024

On April 15, 2024, at 1:20 p.m. local time, northbound CSX intermodal train I03215 traversed a misaligned switch and collided head-on with stationary, loaded rock train L74314 while traveling about 28 mph on CSX's Jesup Subdivision near Folkston, Georgia. Two crewmembers of train I03215 and one crew member of train L74314 were hospitalized for non-life-threatening injuries.

We determined that the probable cause of the CSX head-on train collision was an improperly lined dual-controlled, power-operated switch that a conductor did not know how to properly operate, and the conductor's failure to verify its position as required. Contributing to the accident was CSX's insufficient recurring training and failure to implement operational procedures, such as a restricted speed requirement and secondary verification of switch position, to mitigate the risk of misaligned switch accidents during a signal suspension.

Recommendations: None
Report Date: February 4, 2025

Chicago Transit Authority Yellow Line Train Collision with Snow Removal Machine
Chicago, Illinois
November 16, 2023

On November 16, 2023, about 10:30 a.m. local time, southbound Chicago Transit Authority (CTA) Yellow Line passenger train collided with a stationary CTA snow removal machine on south Skokie track one near Howard

Yard and derailed. The train was carrying one operator and 30 passengers; there were six CTA employees on board the snow removal machine. Sixteen people were transported to a hospital, treated, and released. Three people were critically injured, including the operator. There were no fatalities. The train remained upright following the collision. CTA estimated damages to equipment to be about $8.7 million.

We determined that the probable cause of the collision between the CTA passenger train and snow removal machine was a combination of three factors:

- an aggressive speed reduction command that resulted in wheel slide and degraded the train's braking performance;
- the CTA's decision to disable the automatic track brake application feature of the train's wheel slide protection system, delaying application of the track brake and further reducing the train's braking performance; and
- the presence of organic material on the rails that caused slippery conditions that worsened the wheel slide and further degraded the train's braking performance.

Recommendations: None
Report Date: January 29, 2025

Safety Alerts

A safety alert is a short informational bulletin that pinpoints a particular safety issue. It contains information based on the findings of one or more NTSB investigations and enhances the dissemination of safety information and actions to the traveling public; federal, state, and local officials; and transportation operators about safety hazards and practical remedies identified through NTSB accident investigations, safety research, and safety recommendations.

Natural Gas Alarms Save Lives

This safety alert was derived from the natural gas-fueled explosion and fire at an R.M. Palmer Company candy factory in West Reading, Pennsylvania, on March 24, 2023. Our investigation found that, had natural gas alarms been installed inside the candy factory buildings, they could have alerted employees to the natural gas leak, likely prompting them to evacuate, reducing or eliminating the fatal consequences of the explosion. The safety alert describes additional accident scenarios in which a natural gas alarm in commercial and

residential buildings could have reduced the consequences of a similar accident.

Issue Date: March 2025

Other Efforts and Focus Areas

Hazardous Materials Roundtable
May 13–14, 2025

The NTSB Hazardous Materials Investigations Branch chief and a hazardous materials investigator participated in the Hazardous Materials Roundtable held at the National Fire Academy, where they provided updates on NTSB investigations, engaged with first responder organizations, and discussed emerging trends and issues, such as energy storage and lithium battery issues, problems with nonbattery energy alternatives, rail safety and community issues, and new technologies to mitigate hazardous materials incidents.

Rail Communication Technology

In FY 2025, the NTSB obtained an instrument that can analyze, measure, and record multiple radio system operating parameters. This instrument enables investigators to record radio performance measurements, scan for interfering frequencies, and map radio frequency coverage for different frequency bands that may be important to an investigation, allowing us to assess the efficacy and integrity of rail technology, including positive train control systems.

Ongoing Significant Railroad, Pipeline, and Hazardous Materials Accident Investigations

Location	Description	Date	Fatalities
Fairfield, Alabama	Fatality of Fairfield Southern Company employee	6/16/2025	1
Nacogdoches, Texas	Fatality of UP conductor	6/9/2025	1
Somerville, Massachusetts	Massachusetts Bay Transportation Authority collision of two light rail trains with derailment	2/9/2025	-
Ridley Park, Pennsylvania	SEPTA train fire and passenger evacuation	2/6/2025	-
Pecos, Texas	UP Railroad train collision with combination vehicle	12/18/2024	-

Location	Description	Date	Fatalities
Bordulac, North Dakota	Canadian Pacific Kansas City train derailment with subsequent hazardous materials release and fire	7/5/2024	-
Jackson, Mississippi	Natural gas-fueled explosion resulting in destruction of three homes	1/24/2024	1

Note: We are devoting significant resources to the investigations listed and anticipate producing a report upon the completion of each investigation. These investigations were ongoing as of September 30, 2025. Please see NTSB.gov for more information on the status of these investigations.

RESEARCH AND ENGINEERING

Fiscal Year	($000s)	FTEs	Pos.
FY 2026 Estimate	$16,911	48	49
FY 2027 Request	$16,999	48	49
Increase/Decrease	$88	-	-

Overview of the Request

The requested funding level assumes no pay raise in FY 2027 and incorporates a modest increase to partially offset the projected 2 percent rise in non-pay inflationary costs and higher annual maintenance expenses for laboratory instruments. These adjustments are designed to preserve core mission capabilities and sustain priority activities while limiting growth in administrative support costs.

Program Description

The Office of Research and Engineering is an investigative office providing scientific and technical expertise for NTSB accident investigations in all modes of transportation. The office, which includes four divisions and one program area, also conducts safety research, generates periodic statistical reviews of aviation accidents, and provides medical and toxicology expertise for investigations in all modes.

Safety Research Division

The Safety Research Division examines transportation accidents, accident trends, and technological changes to identify problems and associated remedial actions that will reduce risk and improve the safety of the transportation system. Division staff comprises transportation safety researchers, data analysts, and statisticians who conduct special studies of the following:

- Risks and hazards in the transportation environment that may influence accidents or injury.
- Accident investigation techniques and methods.
- Effectiveness of various safety countermeasures, such as policies, programs, and technologies.

The division also provides data science, data visualization, and statistical expertise to support accident launches and investigations agencywide, assists

in developing safety recommendations, and publishes annual statistical reviews for the NTSB, Congress, and the public.

Materials Laboratory Division

The Materials Laboratory Division is responsible for the following:

- Performing expert multidisciplinary engineering and scientific analyses to determine if material or structural performance is related to the cause or severity of an accident.
- Analyzing wreckage to determine the causes of fires and explosions.
- Providing chemical and forensic science expertise, as well as technical advice and resources for experimental testing and research in the physical sciences.

Vehicle Recorder Division

The Vehicle Recorder Division is responsible for the following:

- Extracting, formatting, and analyzing data from aircraft flight data recorders (FDRs) and cockpit voice recorders (CVRs) and from recorders installed in locomotives, large ships, and some highway vehicles.
- Examining recorded electronic audio and video information captured by aircraft, ship, train, and support communication systems.
- Providing electronic engineering expertise for all accident investigation modes regarding examining communication and control systems.
- Providing time synchronization to correlate voice, data, and video recorder outputs.
- Using advanced digital and analog filtering and signal representation techniques to extract critical recorder information.
- Performing forensic examinations of personal electronic devices and other computer hardware.

Vehicle Performance Division

The Vehicle Performance Division is responsible for the following:

- Providing specialized aeronautical, mechanical, structural, and biomechanical engineering expertise; three-dimensional laser

scanning and accident reconstruction; photogrammetry and video analysis; and animation and graphics development for all modes.

- Using computational and visualization technology to provide accurate time-motion histories of the sequence of events and evaluating data from multiple sources to determine vehicle and occupant motion and the underlying causes of that motion.
- Developing video animations of accident scenarios, evaluating occupant injury mechanisms, and participating in and directing research into special projects, as required.

Medical Investigations

NTSB medical officers evaluate the medical aspects of investigations, including medical fitness, pathology, toxicology, injury causation, and biomechanics. Examples of medical issues addressed include injury survivability and operator incapacitation and impairment from the effects of substances and medical conditions.

Accomplishments and Ongoing Efforts

Safety Research Division

From October 1, 2024, through September 30, 2025, the Safety Research Division responded to 216 requests for data analysis and statistical information from other NTSB offices, Board members, Congress, and the public. Division staff completed special studies evaluating safety issues for multiple accident investigations in the aviation, rail, marine, and highway modes. In addition, the division published the NTSB's annual statistical review of US civil aviation accident data and interactive dashboard and continued its work on a 5-year update of the NTSB's 2020 Safety Research Report, *Drug Use Trends in Aviation*.

Materials Laboratory Division

From October 1, 2024, through September 30, 2025, the Materials Laboratory staff examined parts and wreckage from 141 accidents from all transportation modes and documented their findings through studies; analytical and formal factual reports; and safety recommendations.

Vehicle Recorder Division

From October 1, 2024, through September 30, 2025, the Vehicle Recorder Division laboratories processed 529 recording devices and

completed essential readouts, transcripts, and studies for aviation, rail, marine, and highway investigations.

Vehicle Performance Division

From October 1, 2024, through September 30, 2025, Vehicle Performance staff produced 61 study reports and animations. Staff also helped develop safety recommendations and modal accident investigation reports.

Medical Investigations

From October 1, 2024, through September 30, 2025, NTSB medical officers produced over 226 reports in all transportation modes. Our medical officers evaluate and address medical issues through formal factual and analytical reports, safety recommendations, coordination with other agencies, and formal presentations to the agency and to external audiences.

Below are examples of the significant investigations involving RE by each of our divisions from October 1, 2024, through September 30, 2025.

Multivehicle Collision and Postcrash Fire on Interstate 70
Etna, Ohio
November 14, 2023

A motor coach transporting 57 passengers and an SUV that was part of this same trip traveling behind the motorcoach encountered a traffic queue resulting from an earlier crash on Interstate 70. A truck-tractor in combination with a van semitrailer failed to slow down as it approached the traffic queue and collided with the SUV, pushing it into the back of the motorcoach, which was then pushed into other traffic. A postcrash fire ensued and three student passengers on the motorcoach and three adults in the SUV were fatally injured. The remaining vehicle occupants were transported to area hospitals for treatment of various injuries. The Safety Research Division completed a study of crash and injury data from the NHTSA Fatality Analysis Reporting System to summarize end-of-queue crash characteristics in the United States. Medical Investigation staff investigated the medical and toxicological status of the involved drivers.

Recommendations: 8 new, 1 reiterated, and 1 reiterated and classified
Report Date: September 3, 2025

Tire Failure, Motorcoach Roadway Departure, and Rollover
Wawayanda, New York
September 21, 2023

A motorcoach operated by Regency Transportation was transporting 40 high school students and four adults to a band camp in Greeley, Pennsylvania, when the motorcoach experienced a blow out of the left steer axle tire. The motorcoach departed the travel lane, penetrated a roadside cable barrier, and came to rest on its left side. Two of the motorcoach occupants were fatally injured. The Materials Laboratory supported the investigation into the tire failure. Vehicle Performance Division staff evaluated the onboard recorded video.

Recommendations: None
Report Date: July 10, 2025

CSX Transportation Conductor Trainee Fatality
Baltimore, Maryland
June 26, 2023

A CSX conductor trainee died while protecting a shoving movement at Seagirt Terminal near Baltimore, Maryland. The trainee fell from the railcar he was riding and was subsequently struck. The Safety Research Division completed a special study on the prevalence of employee-on-duty injuries and fatalities involving employees riding on the side of a railcar between 2010 and 2024.

Recommendations: 5 new
Report Date: June 25, 2025

In-Flight Separation of Left Mid Exit Door Plug Alaska Airlines Flight 1282
Boeing 737-9, N704AL
Portland, Oregon
January 5, 2024

Alaska Airlines flight 1282, a Boeing 737-9, returned to Portland International Airport in Oregon after the left MED door plug departed the airplane, leading to a rapid decompression. Seven passengers and one flight attendant received minor injuries. Materials Laboratory Division staff evaluated the door plug and associated hardware and completed a report documenting

their findings. Vehicle Recorder Division staff analyzed data from the FDR and reviewed audio from the CVR, noting that the CVR had been overwritten.

Recommendations: 19 new, 5 reiterated
Report Date: June 24, 2025

Crash of Pilatus PC-12/45
Stagecoach, Nevada
February 24, 2023

A Pilatus PC-12/45, operated by Guardian Flight LLC as a Title 14 *CFR* Part 135 air ambulance flight, crashed near Stagecoach, Nevada. Vehicle Recorder Division staff extracted and analyzed data from multiple personal electronic devices and cockpit displays. Vehicle Performance Division staff calculated the speed of the engine as the airplane descended from sound recorded by a surveillance camera and identified errors in onboard recorded data by comparing it with performance parameters calculated from automatic dependent surveillance–broadcast (ADS–B) data. Medical Investigation staff investigated the medical and toxicological status of the pilot.

Recommendations: None
Report Date: June 4, 2025

Fire Aboard Roll-on/Roll-off Container Vessel *Grande Costa D'Avorio*
Newark, New Jersey
July 5, 2023

The roll-on/roll-off container vessel, *Grande Costa D'Avorio*, was docked at Port Newark, New Jersey, when a passenger vehicle being used to push nonrunning cargo vehicles onboard the vessel caught fire in an interior garage deck. Vessel crewmembers attempted to put out the fire using portable fire extinguishers and the ship's fixed gas (carbon dioxide) fire extinguishing system. The crew's attempts were unsuccessful and land-based firefighters were called to respond. While attempting to put out the fire, two of the land-based firefighters were trapped inside one of the burning garage spaces and died in the fire. The Materials Laboratory supported the investigation into the source of the fire and the extent of fire damage.

Recommendations: 11 new
Report Date: April 15, 2025

Combination Vehicle Rollover, Fire, and Interstate 95 Overpass Collapse
Philadelphia, Pennsylvania
June 11, 2023

A truck-tractor in combination with a tank trailer carrying gasoline caught fire while under an overpass of Interstate 95 in Philadelphia, Pennsylvania. The fire resulted in a collapse of the northbound overpass lanes of Interstate 95. The Safety Research Division completed a special study of fatal and nonfatal traffic crash data to determine the likelihood of fire occurrence following a vehicle rollover based on vehicle type and hazardous material classification. Vehicle Performance Division staff analyzed video to determine the speed of the vehicle when exiting the highway and evaluated the capability of stability control systems to affect the accident outcome. Medical Investigation staff investigated the medical and toxicological status of the driver.

Recommendations: None
Report Date: March 19, 2025

UGI Corporation Natural Gas-Fueled Explosion and Fire
West Reading, Pennsylvania
March 24, 2023

A natural gas–fueled explosion and fire occurred at Building 2 of the R.M. Palmer Company in West Reading, Pennsylvania, destroying Building 2 and causing significant structural damage to the adjacent Building 1 and other surrounding structures. Seven people died, 11 people were injured, three families were displaced from a neighboring apartment building, and many more people were evacuated from the area. The Materials Laboratory supported the fire and explosion investigation as well as the evaluation of the jurisdictional pipe components. Vehicle Performance Division staff evaluated photographic evidence to determine the location of a 2021 excavation to expose the gas service line. Medical Investigation staff supported efforts to gather injury information.

Recommendations: 18 new, 1 reiterated
Report Date: March 18, 2025

BNSF Railway Derailment with Bridge Strike and Fatality
Pueblo, Colorado
October 15, 2023

A BNSF Railway freight train derailed 31 hopper cars loaded with coal Pueblo, Colorado. The derailment occurred near a track switch east of a

railroad bridge that crossed over Interstate 25 and the derailed railcars struck the bridge, six dropping to the interstate below and one or more striking a northbound truck-tractor in combination with a utility trailer. The eastern span of the bridge partially collapsed over the interstate's northbound lanes. The combination vehicle came to rest beneath the collapsed bridge span, derailed railcars, and lading. The truck driver died; no members of the train crew were injured. Metallurgists from the Materials Laboratory Division evaluated the quality of thermite welds within rail segments.

Recommendations: None
Report Date: February 12, 2025

In-Flight Collision During Air Show Commemorative Air Force Boeing B-17G, N7227C, and Bell P-63F, N6763
Dallas, Texas
November 12, 2022

A Boeing B-17G and a Bell P-63F collided midair while performing at the Wings Over Dallas WWII Airshow at the Dallas Executive Airport Terminal. Vehicle Recorder Division staff downloaded data from various devices containing nonvolatile memory and developed a transcript of ATC audio. Vehicle Performance Division staff used video and photographs from multiple sources to calculate the position and orientation of both airplanes at impact. Vehicle Performance Division staff also used ADS–B data from the FAA and recorded communications among the airshow participants to document the sequence of events and determine the visibility of each airplane to the other pilot in the time leading to the collision, and combined this information in an explanatory animation (including the probable cause and recommendations) that was released with the final report. Medical Investigation staff investigated the medical and toxicological status of the flight crew of both airplanes.

Recommendations: 7 new
Report Date: December 4, 2024

Cirrus Aircraft SR22 Crash
Tomball, Texas
September 1, 2022

A newly manufactured Cirrus Aircraft SR22 airplane was substantially damaged when it was involved in an accident near Tomball, Texas. The flight instructor was fatally injured; the pilot and passenger sustained serious injuries. The Materials Laboratory Division conducted a metallurgical evaluation of a

separated 90° elbow fitting for the fuel system. Medical Investigation staff investigated the medical and toxicological status of the flight crew.

Recommendations: None
Report Date: October 23, 2024

High-Speed Vehicle Collision with Workers in a Highway Work Zone
Woodlawn, Maryland
March 22, 2023

Six highway construction workers were struck and fatally injured by an errant passenger car while working within a work zone along northbound Interstate 695 in Woodlawn, Maryland. The car driver stated that she had experienced a seizure leading to the event. Medical Investigation staff evaluated the car driver's medical records and postcrash toxicology findings.

Recommendations: None
Report date: October 9, 2024

Contact of Tall Ship *ARM Cuauhtémoc BE 01* with the Brooklyn Bridge
Brooklyn, New York
May 17, 2025

The Mexican Navy tall ship *ARM Cuauhtémoc BE 01* struck the Brooklyn Bridge on the East River in New York, New York, severely damaging three of the ship's masts. Two fatalities and multiple additional injuries were reported. Vehicle Recorder Division staff launched to the accident and assisted in collecting and analyzing witness video recordings. Medical Investigation staff provided remote support to on-scene investigators by organizing preliminary injury information from emergency medical services records.

Investigation in process as of September 30, 2025.

Mitsubishi MU-2B-40 Crash
Copake, New York
April 12, 2025

A Mitsubishi MU-2B-40, N635TA, was destroyed when it was involved in an accident near Copake, New York. The pilot and five passengers were fatally injured. The airplane was operated as a Title 14 *CFR* Part 91 personal flight. Vehicle Performance Division staff are evaluating ADS–B data and any onboard

recorded data that is recovered to identify performance issues in the missed approach.

Investigation in process as of September 30, 2025.

Bell 206L-4 Crash
Jersey City, New Jersey
April 10, 2025

A Bell 206L-4 helicopter, N216MH, was destroyed when it was involved in an accident near Jersey City, New Jersey. The pilot and five passengers were fatally injured. The helicopter was operated as a Title 14 *CFR* Part 91 air tour flight. Vehicle Recorder Division staff assisted in analyzing witness video recordings. Vehicle Performance Division staff are evaluating the trajectories of helicopter components after the inflight breakup to better define the sequence of events. The Materials Laboratory supported the investigation of the inflight breakup.

Investigation in process as of September 30, 2025.

Airbus Helicopter EC135 P2+ Crash
Canton, Mississippi
March 10, 2025

An Airbus Helicopters (formerly Eurocopter Deutschland) EC135 P2+ helicopter, N835CS, operated as AirCare 3, was destroyed when it was involved in an accident near Canton, Mississippi. The commercial pilot, the flight paramedic, and the flight nurse sustained fatal injuries. The helicopter was operated by MedTrans Corporation as a Title 14 *CFR* Part 135 air medical flight. Safety Research Division and Vehicle Recorder staff analyzed medical helicopter crash investigation data and recorder lab data to identify the prevalence of cases where the helicopter had a non-crash-hardened flight monitoring device. Vehicle Performance Division staff are documenting the sequence of events from ADS–B data. Medical Investigation staff are evaluating the medical and toxicological status of the pilot.

Investigation in process as of September 30, 2025.

Cessna 208B Crash
Nome Alaska
February 6, 2025

A Textron Aviation Cessna 208B airplane, N321BA, operated as Bering Air flight 445, was destroyed when it was involved in an accident near Nome,

Alaska. The pilot and nine passengers were fatally injured. The airplane was operated as a Title 14 *CFR* Part 135 scheduled commuter flight. Vehicle Recorder Division staff analyzed data from memory cards, on-board equipment, and personal electronic devices. Vehicle Performance Division staff conducted an airplane performance study to determine the evidence of icing on the flight. Materials Laboratory staff evaluated airplane structural components for indications of failure.

Investigation in process as of September 30, 2025

Learjet 55 Crash
Philadelphia, Pennsylvania
January 31, 2025

A Learjet 55 airplane, Mexican registration XA-UCI (call sign MTS056) was destroyed when it was involved in an accident in Philadelphia, Pennsylvania. The two pilots, two medical crewmembers, and two passengers were fatally injured. One person on the ground was fatally injured, 4 people were seriously injured, and 20 people incurred minor injuries. The airplane was operated by Med Jets, S.A. DE C.V. as a Title 14 *CFR* Part 129 air ambulance flight. Vehicle Recorder Division staff analyzed data from the cockpit voice recorder and other portable electronic devices. Vehicle Performance Division staff conducted an aircraft performance study to support an evaluation of a somatogravic illusion scenario. Materials Laboratory staff evaluated aircraft components and oxygen cylinders for failure modes. Medical Investigation staff are evaluating the medical and toxicological status of the pilots.

Investigation in process as of September 30, 2025

Midair Collision Involving a Sikorsky UH-60L and a Mitsubishi Heavy Industries RJ Aviation CRJ700
Washington, District of Columbia
January 29, 2025

A Sikorsky UH-60L, operated by the US Army under the callsign PAT25, and a Mitsubishi Heavy Industries RJ Aviation (formerly Bombardier) CL-600-2C10 (CRJ700), N709PS, operated by PSA Airlines as flight 5342, collided in flight approximately 0.5 miles southeast of DCA in Arlington, Virginia, and impacted the Potomac River in southwest Washington, District of Columbia. The 2 pilots, 2 flight attendants, and 60 passengers aboard the airplane and all 3 crew members aboard the helicopter died, and both aircraft were destroyed. Vehicle Recorder Division staff analyzed the aircrafts' FDR data, transcribed their CVR audio, and assisted in analyzing video to determine visible lighting on both aircraft. Vehicle Performance Division staff are documenting each

aircraft's flight history, identifying the source of altitude discrepancies in data from the helicopter, performing a detailed study of the visibility of each aircraft from the other, and developing animations to explain the sequence of events and safety issues identified. Safety Research Division staff documented safety data sources and analyzed data that had the potential to provide safety information to identify and manage the risk of midair collisions at DCA. Medical Investigation staff identified, gathered, and reviewed medical fitness standards, medical certification records, toxicology and autopsy reports, and other medical evidence pertaining to involved operators, in coordination with the US Army, FAA, and others. Staff from the Safety Research, Materials Laboratory, Vehicle Recorder, and Vehicle Performance Divisions participated in the 3-day investigative hearing from July 30 through August 1, 2025.

Investigation in process as of September 30, 2025.

Natural Gas Leak and Residential Explosion
Bel Air, Maryland
August 11, 2024

A natural gas explosion destroyed a single-family residence at 2300 Arthurs Woods Drive, Bel Air, Maryland. Two people died and three people were injured. Several nearby residences were damaged and families were displaced. Damaged electrical service lines and a plastic natural gas service line with a hole on the bottom were recovered from the site. The Materials Laboratory is supporting the examination of the electric and natural gas service components.

Investigation in process as of September 30, 2025.

Multivehicle Work Zone Collision and Postcrash Fire on Interstate 95
Kenly, North Carolina
July 24, 2024

A 2020 Freightliner Cascadia truck-tractor in combination with a 2022 Wabash refrigerated semitrailer (Freightliner combination) operated by Leonard's Express, Inc., struck the rear of a 2013 Chevrolet Tahoe SUV. After impacting the Chevrolet, the Freightliner combination continued forward and struck three other vehicles: a 2017 Toyota RAV4 SUV, a 2025 Kenworth T680 truck-tractor in combination with a 2018 Great Dane refrigerated van semitrailer, and a 2014 International LF687 truck-tractor in combination with a 2003 Somerset Welding & Steel end-dump semitrailer. A postcrash fire ensued and consumed the Freightliner combination. The driver and passenger in the Chevrolet and the driver and two passengers in the Toyota died as a result of the crash. The drivers of the Freightliner, Kenworth, and International were

treated for various injuries. The Materials Laboratory is providing fire investigation support for the postcrash fire.

Investigation in process as of September 30, 2025.

Contact of Cargo Vessel *Dali* with Francis Scott Key Bridge and Subsequent Bridge Collapse
Baltimore, Maryland
March 26, 2024

The Singapore-flagged cargo vessel (containership) *Dali* lost electrical power and propulsion and struck the southern pier supporting the central truss spans of the Francis Scott Key Bridge. A portion of the bridge subsequently collapsed into the river, and portions of the deck and the truss spans collapsed onto the vessel's forward deck. Six construction crewmembers who were on the bridge when the vessel struck died. Materials Laboratory Division staff evaluated a component related to the *Dali*"s power loss. Vehicle Recorder Division staff traveled to Baltimore to recover voyage data recorder audio and parametric data. Recorder Division staff also analyzed the parametric data, reviewed the audio, produced a timeline of events, and held a transcription group at NTSB headquarters to produce a written transcript of the voyage data recorder audio. Vehicle Performance Division staff are developing an animation to explain the use of terminal blocks to connect wires and evaluating the effect of dropping the ship's anchor on the accident sequence. Medical Investigation staff helped investigators identify pertinent sources of information regarding postevent drug testing. Safety Research Division staff completed a literature review of changes in commercial vessel size in US ports, and a special study of bridge strike trends and characteristics using data from the Coast Guard's Marine Information for Safety and Law Enforcement system and Aids to Navigation Information Management system.

Investigation in process as of September 30, 2025.

Loss of Control on Ground by a Boeing 737-8
Houston, Texas
March 8, 2024

United Airlines flight 2477, a Boeing 737-8, N27290, veered off a taxiway at the George Bush Intercontinental Airport in Houston, Texas. No injuries were reported among the 6 crew and 160 passengers. The left main landing gear departed the paved surface and contacted a concrete structure that was recessed into the ground. Vehicle Recorder Division staff analyzed data from the FDR and held a group to transcribe audio from the CVR. Vehicle

Performance Division staff are evaluating the stopping performance of the airplane for a range of runway conditions and pilot actions.

Investigation in process as of September 30, 2025.

School Bus Roadway Departure and Overturn
Millstone, West Virginia
March 4, 2024

A 2022 IC 77-passenger school bus occupied by a driver and 19 students and operated by the Calhoun County Board of Education was traveling south on State Highway 16 near Millstone, West Virginia, when it departed the right side of the roadway and overturned. Nineteen students on the bus were injured (3 serious and 16 minor injuries). Safety Research Division staff completed a special study of alcohol-impaired driving fatalities, behavioral countermeasures to impaired driving, and the current state of impaired driving detection and prevention technologies.

Investigation in process as of September 30, 2025.

Atmos Energy Corporation Natural Gas-Fueled Home Explosions and Fires
Jackson, Mississippi
January 24, 2024

A home explosion and fire occurred in Jackson, Mississippi, on January 24, 2024, resulting in one fatality and one injury. While the NTSB investigative team was traveling to the scene, the NTSB learned of a second home explosion and fire, which occurred on January 27, 2024, about 0.7 miles southeast of the first. Although the fire from the second explosion spread to a neighboring home, no fatalities or injuries were reported. Natural gas service to the affected homes was provided by Atmos Energy Corporation. Atmos's natural gas distribution system near the locations was constructed of 2-inch coated steel main and installed in the 1960s and early 1970s. Materials Laboratory staff evaluated leaks at the service line tee fittings and conducted failure analyses on fitting components. Safety Research Division staff completed a geospatial study comparing leak and hazardous leak repair location data with risk grids calculated using PHMSA leak grade classifications, which identify leaks by severity and probability of public safety impact.

Investigation in process as of September 30, 2025.

Summary of Research and Engineering Systems and Instruments

The Office of Research and Engineering is dedicated to developing innovative systems that make our work more efficient and accurate. Due to rapidly changing technology, these systems must be updated annually and maintained.

System	Description	RE Division
DREAM	The Data Recorders, Electronics, and Analysis Management (DREAM) system is an internal workflow tool, integrated with SAFTI, used by recorder specialists to track devices sent in by field investigators. Specialists use the database to record the entire lifecycle of a device in the lab, from when it arrives from the field to when it is eventually returned to its owner. Staff also track all intermediate steps, including download, recovery, audition (when applicable), and product development.	Vehicle Recorder Division
CIDER	The CIDER system is a client/server application used to process parametric recorder data. Recorder specialists use CIDER to recover data from tape-based FDRs, convert data from raw binary formats into engineering units for analysis, analyze and validate the data, and generate plots, tabular data files, and other products for other investigative teams and reports. CIDER can also be used to manage investigation recorder data and document recorder conversion libraries.	Vehicle Recorder Division
MEDICS	The Medical Information Catalog System (MEDICS) is a web-based application used to store medical records from NTSB investigations. NTSB medical officers use MEDICS as a case management tool for their reviews across all modal offices. The MEDICS software automatically enforces the security, storage, transmission, and access control requirements for medical records. MEDICS also connects to the SAFTI database used to manage investigation data, which allows investigators to access records, receive autopsy and toxicology reports, request subpoenas for medical records,	Medical Investigations

System	Description	RE Division
	and request medical officer reviews. Only those employees with a need to access this health information may use MEDICS.	
PREVIEW	The Protected Recording Viewer (PREVIEW) system is a web-based application that allows access to protected content products (such as audio and video transcripts) and recordings normally stored on non-networked secure servers within the laboratory at NTSB headquarters for authorized NTSB employees working remotely. The application automatically enforces the security requirements for storage, transmission, and access control to prevent inadvertent public release of the products and recordings in accordance with statutory requirements and NTSB requirements for protecting the content.	Vehicle Recorder Division
RAPT-R	The Rome Audio Processing Tool-Revision (RAPT-R) is a software tool developed by the Air Force Research Laboratory that enables multitrack audio playback, video playback, and transcription. It is the NTSB's primary tool for analyzing CVR content.	Vehicle Recorder Division
Reveal	Reveal is a digital data recovery and analysis tool for visualizing, exploring, and extracting binary data files. It allows users to mine unstructured binary data for useful data parameters, either through manual inspection or by using scripted routines.	Vehicle Recorder Division

In addition, the office also uses laboratory instruments to support accident investigations. These include digital and electron microscopes and analytical spectrometers to conduct materials failure analyses, specialized recorder readout equipment, and x-ray computed tomography and wire bonding equipment to recover memory chips from recording devices. These instruments typically require annual maintenance contracts, updates, and replacement at certain intervals.

ADMINISTRATIVE LAW JUDGES

Fiscal Year	($000s)	FTEs	Pos.
FY 2026 Estimate	$3,115	7	7
FY 2027 Request	$3,586	9	9
Increase/Decrease	$471	2	2

Overview of the Request

The requested funding level assumes no pay raise in FY 2027 and incorporates modest, targeted reductions in operational expenses, with a focus on internal efficiencies, to partially offset a projected 2-percent increase in nonpay inflationary costs. These adjustments are designed to preserve core mission capabilities and sustain priority activities while limiting growth in administrative support costs. In addition, the request reflects an increase of two FTEs/positions that will be transferred from the Office of Safety Recommendations and Communications to address operational needs within this office.

Program Description

The NTSB serves as the court of appeals for pilots, aircraft mechanics, air traffic controllers, air carriers, repair facilities, and any other individual or entity against whom the FAA has taken a certificate action, and for mariners against whom the US Coast Guard has taken a certificate action. The agency's administrative law judges hear, consider, and issue initial decisions on administrative appeals regarding FAA aviation enforcement actions, including the following:

- Orders issued by the FAA administrator amending, modifying, suspending, or revoking, in whole or in part, certificates of airmen, air agencies, and air carriers for alleged violations of the *Federal Aviation Regulations* or for lack of qualifications.
- FAA actions denying applications for the issuance or renewal of airman certificates, including airman medical certificates.
- Certain FAA civil penalty orders issued against individuals, pilots, flight engineers, mechanics, or repair people where the amount in dispute is less than $50,000.

The judges also adjudicate claims under the Equal Access to Justice Act for fees and expenses stemming from FAA certificate and civil penalty actions.

An administrative law judge must convene a hearing regarding the appeal of an emergency order or another immediately effective order within 30 days of receipt. If the law judge's decision is appealed to the full Board, an opinion and order must be issued within 60 days of the appeal's initial filing.

Marine certificate actions are heard first by the US Coast Guard administrative law judges and may be appealed to the vice commandant of the US Coast Guard. The ruling of the vice commandant may then be appealed to the NTSB's full Board.

The NTSB has three judges and a vacant chief judge position, which is based in Washington, DC. One judge is stationed in the circuit that includes Raleigh, North Carolina; one is stationed in the circuit that includes Aurora, Colorado; and one is stationed in the circuit that includes San Antonio, Texas.

Accomplishments and Ongoing Efforts

The Office of Administrative Law Judges completed the following actions from October 1, 2024, through September 30, 2025:

- Filed 90 emergency order appeals.
- Closed 106 emergency order appeals.
- Held 13 emergency order appeal hearings.
- Had 39 cases in which respondents waived the emergency procedures.
- Processed 14 petitions challenging the FAA's determination to bring a case as an emergency.
- Filed 271 new cases (100 of which were enforcement cases; 130 of which were medical certificate denials).
- Closed 393 cases.
- Scheduled 66 hearings (49 of which were emergency appeals).
- Held 20 hearings.

INFORMATION TECHNOLOGY AND SERVICES

Fiscal Year	($000s)	FTEs	Pos.
FY 2026 Estimate	$9,855	26	26
FY 2027 Request	$9,849	26	26
Increase/Decrease	($6)	-	-

Overview of the Request

The requested funding level assumes no pay raise in FY 2027 and incorporates modest, targeted reductions in operational expenses, with a focus on internal efficiencies, to partially offset a projected 2-percent increase in nonpay inflationary costs. These adjustments are designed to preserve core mission capabilities and sustain priority activities while limiting growth in administrative support costs.

Program Description

The Office of the Chief Information Officer provides strategic direction and operational support for NTSB information systems and develops and distributes programs and products for use by the agency and the public. The office comprises four divisions and two program areas, described below.

Computer Services Division

The Computer Services Division is responsible for the following:

- Providing computer and network services for headquarters and regional offices, including internet access, web services, email, backup, continuity-of-operations infrastructure, and disaster recovery.
- Securing the network and defending against outside threats.
- Staffing the helpdesk, which performs a wide range of tasks, including desktop/laptop setup, repair, and replacement; network connectivity; and software installation and upgrades.
- Deploying and maintaining essential systems and services that range from desktop telephones to enterprise storage systems, cell phones, and tablets.

Systems Support Division

The Systems Support Division is responsible for the following:

- Developing, distributing, and maintaining agency-specific applications.
- Providing web design and content management.
- Delivering database administration services.
- Supporting accident data collection, storage, analysis, and dissemination for all modes, as well as managing systems for accident records, safety recommendations, correspondence, FOIA requests, and general administration.
- Developing office-centric applications for modal and support offices.

Records Management Division

The Records Management Division is responsible for the following:

- Maintaining accident investigation files, NTSB reports, and other agency records in accordance with applicable law.
- Fulfilling public requests for information, including FOIA requests, and providing training on the docket management system and guidance on redaction policies and techniques.
- Monitoring the privacy and confidentiality of data and information.
- Providing records management services that enable NTSB staff to locate and use investigative records to respond to media and public requests for accident safety data and records more efficiently and effectively.

Enterprise Architect Division

The Enterprise Architect Division provides a logical business and technological blueprint for how the NTSB operates today, plans to operate in the future, and intends to invest in technology. The division understands the agency's business needs and defines the processes and information necessary to operate the business-support technologies and transitional processes required to implement new technologies.

Chief Technology Officer Program

The chief technology officer outlines the office's technological vision, researching new technologies for potential benefits, implementing technology

strategies, and ensuring that the technological resources are aligned with the agency's mission needs and goals.

Information Technology Security Program

The chief information security officer protects the availability, confidentiality, and integrity of IT resources by applying the requirements specified in OMB Circular A-130, the Federal Information Security Management Act (FISMA), and various US Department of Commerce National Institute of Standards and Technology publications. The IT security program uses a risk-based, cost-effective approach to secure information and systems, identify and resolve current IT security weaknesses and risks, and protect the NTSB's networked capabilities against future vulnerabilities and threats.

Accomplishments and Ongoing Efforts

Computer Services Division

The Computer Services Division resolved over 3,212 service desk tickets and filled over 150 service requests from October 1, 2024, through September 30, 2025. The division's IT specialists supported the agency's mission by launching on six major accident investigations to assist Board members and staff on scene. Most notable of these on-scene support launches was the midair collision at DCA in January 2025. The on-scene support for this accident required our IT staff to provide services at two different locations: the accident site and the command post for the family briefings. IT networking, printing, and data handling services were set up at each site.

Additionally, the division continued to fight daily threats against agency systems by applying patches and updates on a regular basis. We continue to comply with and respond to any advisories from the Federal Continuous Diagnostics and Mitigation Program. Systems are backed up daily, and file recoveries have been conducted during the past year, serving as a regular test of the backup and recovery system. We also preserve files and emails in support of the Office of General Counsel and have processed litigation hold requests for several agency staff since October 1, 2024.

The division managed the hardware and operating system configuration for the rollout of Microsoft Windows 11 laptops to agency staff, successfully deploying 500 devices agencywide. Key activities included migrating software to the Microsoft Company Portal to streamline installation and updates, completing the upgrade prior to Windows 10's end-of-life to maintain support and security compliance and ensure long-term sustainability. In April 2025, staff migrated the agency's secure file transfer system, which is vital to the agency's

mission. The system had to be switched over without disruption and without a parallel deployment period; all existing data had to be migrated from one system to the other while keeping the data synchronous to avoid any issues. The division seamlessly performed the cutover, trained NTSB staff in using the new system, and ensured that external users had appropriate access to the new system.

The division is actively implementing the Zero Trust principle across agency systems and services, having successfully onboarded the agency's enterprise applications into the Identity and Access Management platform with a dynamic approver workflow for access request. In addition to daily IT systems maintenance and projects, the division has also been working to process several of the agency's software purchases and services maintenance contract renewals.

Systems Support Division

The Systems Support Division made significant strides in enhancing and upgrading the Board's suite of in-house applications, which are pivotal to supporting various agency program offices and activities, including the Product Management Application (PMA), Case Appeals Filing System (CAFS), MEDICS, SAFTI, Case Analysis and Reporting Online (CAROL), DREAM, and PREVIEW. Division staff collaborated closely with other offices and teams, as described below, to ensure these enhancements were successfully implemented:

- Authentication technologies: In response to Microsoft's retirement of Windows authentication, the division proactively updated the agency's mission-critical applications (SAFTI, DREAM, CAFS, MEDICS, PREVIEW, CAROL, and PMA) to modern authentication technologies using the Security Assertion Markup Language protocol. This bolstered system and data security and ensured compliance with Zero Trust requirements.
- Safety recommendation report improvements: In anticipation of Microsoft's upcoming retirement of Structured Query Language (SQL) Server Reporting Services 2016, the division collaborated with the Office of Safety Recommendations and Communications to migrate PMA's critical reports to SQL Server Reporting Services 2022. This upgrade resulted in noticeable performance enhancements, as reported by office testers.
- Improved email communications for internal applications: In anticipation of Microsoft's retirement of several legacy email protocols, the division modernized the impacted applications (SAFTI,

MEDICS, and CAFS) to leverage Microsoft Graph Application Programming Interface for email communications. This modernization ensures seamless internal and external communications.

- Improved multimode investigation tracking: Enhancements to SAFTI now enable offices to add and track products associated with multiple transportation modes.
- Streamlined information syncing between SAFTI and PMA: Syncing probable cause data between SAFTI and PMA establishes a single information source, enhancing the accuracy of investigative information.
- Enhanced DREAM templates: The division launched advanced template-to-report automation within DREAM, allowing group attendance documents to be generated from application data. This innovation significantly reduces reliance on manual processes.
- Improved MEDICS/CAFS external communication: MEDICS and CAFS were reengineered to use the new secure large-file transfer system for secure external communication. We automated workflows to minimize manual efforts, enhancing operational efficiency.
- Improved NTSB.gov: Continuous improvements to the public-facing website included the addition of new pages supporting Safety Alerts, enhanced styling, and issue resolution. These updates further enrich user experience.
- Modernized and replaced purchase request management tool (DAPr): Due to Windows updates, RE was unable to continue using its previous tool. The division developed a low code/no code tool called PARS using Microsoft's Power Platform and SharePoint Online. This was a creative solution that allowed RE to continue managing their office purchase requests.

These enhancements collectively represent the division's commitment to innovation, security, and operational excellence, positioning the agency for continued success in its mission-critical endeavors.

Records Management Division

The Records Management Division posted 942 accident dockets to our public website through September 30, 2025, and we received 615 new and closed 522 FOIA requests. This required reviewing more than 56,178 pages of

records, 34,085 pages of which were released by the office. The division implemented two initiatives to address the resource- and time-intensive nature of our records redaction and FOIA processes. We used existing commercially available AI technology for document review, which aligns with recent federal AI mandates and efficiently handles traditional personally identifiable information redactions. We also implemented a process improvement pilot to expand the use of our commercially available FOIA management tool for the entire FOIA process, eliminating manual re-entry, ensuring consistency, and enhancing request visibility.

The division partnered with the National Archives and Records Administration (NARA) and transferred permanent, noninvestigation paper records in accordance with federal requirements. We have also submitted a comprehensive, agencywide draft records schedule to NARA for formal review and approval. Division staff continue to support NTSB staff and the public on obtaining accident information from the NTSB website investigative search tools and docket management systems.

Enterprise Architect Division

In FY 2025, the Enterprise Architect Division continues to analyze and visualize NTSB data to support informed decision-making. Its efforts have enabled agency data users to make better, more strategic decisions through enhanced data visualization. The division is currently implementing a new data warehouse solution for the entire agency. This initiative aims to improve data quality, strengthen governance, and enhance the agency's ability to share data with external partners and the public.

As part of the TMF project, the division successfully deployed a new content services platform. This cloud-based platform centralizes accident documents and media, allowing investigation teams to efficiently find, share, manage, and publish critical information. Legacy content is currently being migrated into the new platform.

Additionally, the division led the delivery of the agency's new data-sharing capability. The newly developed API services will enable the agency to securely expose and consume accident and safety recommendation data across internal systems and external stakeholders, fostering seamless integration.

The division continues to collaborate with investigators to identify and optimize business processes and is planning to implement new functional capabilities aligned with future-state workflows in the coming year. It also provides ongoing technical direction for enhancement requests and data integration across all line-of-business applications.

Chief Technology Officer Program

The chief technology officer leads the enterprise's technological vision. In FY 2025, the chief technology officer successfully championed several critical and transformative programs for the NTSB that improved our customers' experience, secured the NTSB digital ecosystem, and ensured full compliance with federal mandates: TMF and Zero Trust.

In the second year of the TMF project, the NTSB successfully deployed the following:

- A fully automated NTSB Form 6120.1, Pilot/Operator Aircraft Accident/Incident Reporting, which will eliminate input duplication, streamline internal and external processes, improve the system interface, reduce unnecessary paperwork, and improve customer experience.
- An Enterprise content service platform to standardize artifact management across all NTSB accident investigations. This cloud-based platform enables staff to securely ingest, organize, store, locate, retrieve, and share investigative and safety research artifacts in a centralized digital environment. To enhance both internal operations and public-facing services, the content service platform will incorporate features such as redaction and annotation tools, as well as mobile compatibility. The agency began migrating investigative artifacts from disparate sources to the new platform in the second quarter of FY 2025.
- An enterprise API infrastructure to facilitate secure and efficient communication and data exchange between internal applications and external stakeholders.

In FY 2025, the NTSB initiated Phase 3 of its Zero Trust Implementation Plan, aligning with federal requirements. As part of this effort, the agency is deploying an enterprise-wide identity, credential, and access management platform. This system ensures that individuals have appropriate access privileges to the information they need, precisely when they need it. By establishing a robust framework for managing identities, credentials, and access controls, the identity, credential, and access management platform significantly reduces the risk of unauthorized access and cyber threats.

IT Security Program

In FY 2025, the IT security program continued to advise the chief information officer on FISMA compliance requirements and promoted the expanded use of external cybersecurity enhancement services. The agency's overall cyber posture remains "optimized," the highest rating an agency can receive, and we are pleased to report no incidents this year. Key initiatives included adopting targeted web application vulnerability scanning, strengthening mobile device management, and securing professional cybersecurity assessment services through a multi-year blanket purchase agreement with independent third-party providers. These efforts support federal compliance and mitigate the risk of security breaches.

The IT security program also collaborated closely with external cybersecurity oversight agencies, responding to multiple ongoing reporting directives, incident reports, and the annual FISMA submission. We have remediated vulnerabilities and updated standard operating procedures accordingly to allow us to address several FY 2024 audit findings and strengthen the agency's overall cybersecurity posture.

In FY 2025, the agency continues to advance its cybersecurity posture through the following strategic initiatives across policy, operations, and workforce development:

- **Policy and Planning**: Developed and implemented new guidelines for creating system security plans, strengthening the foundation for secure system development and oversight.
- **Collaboration and Monitoring**: Expanded continuous monitoring and diagnostic agreements with the Department of Homeland Security to enhance threat detection and response capabilities.
- **System Consolidation**: Streamlined cybersecurity management by consolidating multiple FISMA systems, improving efficiency and reducing complexity.
- **Zero Trust Implementation**: Led efforts to fulfill OMB's initial Zero Trust mandates with key initiatives in the following:
    - Application software vulnerability scanning
    - Comprehensive IT asset management
    - Automated incident reporting systems
    - Maturing identity and access management capabilities

- **Cybersecurity Training**: Augmented the annual security awareness training program by introducing advanced courses tailored for system administrators and system owners, elevating the agency's security culture and expertise.

HUMAN CAPITAL MANAGEMENT AND TRAINING

Fiscal Year	($000s)	FTEs	Pos.
FY 2026 Estimate	$5,162	15	15
FY 2027 Request	$5,159	15	15
Increase/Decrease	($3)	-	-

Overview of the Request

The requested funding level assumes no pay raise in FY 2027 and incorporates modest, targeted reductions in operational expenses, with a focus on internal efficiencies, to partially offset a projected 2-percent increase in nonpay inflationary costs. These adjustments are designed to preserve core mission capabilities and sustain priority activities while limiting growth in administrative support costs.

Program Description

The Office of Human Capital Management and Training (HCT) provides oversight, guidance, and support for the agency's human capital program and ensures human resources policies and procedures align with the agency's mission.

HCT develops goals and objectives and provides leadership in human capital planning and development, employment and staffing, compensation, benefits, executive resources, labor and employee relations, agencywide training programs, career management, and other human capital and training functions. Two divisions carry out the office's work: the Human Resources Division and the Career Development and Training Division.

Human Resources Division

The Human Resources Division is responsible for human capital planning and management, policy and program development, consulting, and advisory services. Specifically, the division provides position management, classification, recruitment, staffing, labor and employee relations, benefits administration, and pay and leave administration services.

Career Development and Training Division

The Career Development and Training Division oversees the development and implementation of career development programs and the investigative/technical training curriculum for the NTSB workforce. The division

curates educational offerings and training opportunities aimed at enhancing employees' skills and knowledge to ensure they are equipped for transportation accident investigations, future leadership challenges, and to meet our mission.

Accomplishments and Ongoing Efforts

From October 1, 2024, through September 30, 2025, the Office of Human Capital Management and Training focused on several key areas, including hiring and recruitment, employee engagement and recognition, career development and training, and process improvements.

Human Resources Division

The office's human capital initiatives are continuously evolving to enhance employee experience, streamline operations, and support agencywide development. During this period, the Human Resources Division onboarded 34 employees to the agency. The division also managed the separation of 58 employees, resulting in an onboard count of 416 as of September 30, 2025.

The division actively leads and supports a variety of employee engagement and recognition activities across the agency. Those efforts ensure the workforce stays connected and that employee contributions are promptly acknowledged.

The division partnered with various offices, including those of the Board members, to administer the annual honor awards program and ceremony. The event was attended widely by both headquarters and regional employees and recognized the diverse contributions of staff in both technical and nontechnical fields.

Ahead of this year's ceremony, the employee recognition and awards program underwent a comprehensive evaluation and update, ensuring alignment with federal government best practices. A significant outcome was the addition of a new honor award specifically designed to recognize new NTSB employees who have made an early and significant impact on the agency's mission. This new award was well received by both agency leadership and the workforce, garnering the most nomination submissions for any award.

The division also hosted several informative brown bag sessions for employees. These sessions covered critical human resources and career development and training information, including federal benefits open season options and the Flexible Spending Account program; guidance for supervisors

on closing out the 2024 performance cycle and initiating the 2025 cycle; and the agency's learning management system (LMS) capabilities.

The division implemented a robust process for managing EOs and presidential memoranda (PMs), resulting in response to around 70 human capital-related EOs and PMs. The process helped ensure timely and accurate compliance in several key areas, including the following:

- **Return to In-Person Work**: In accordance with the January 20, 2025, *Return to In-Person Work* PM, the agency required employees to return to work in person at their respective duty stations on a full-time basis. This agencywide return to full-time in-person work was a significant undertaking and a major accomplishment for the office. In collaboration with the chairman and the Office of the Managing Director, the office led a review of the duty location and the work status of every employee. The office also developed new work schedule agreement forms to replace the previous telework forms; educated supervisors and employees about the requirements outlined in the PM; distributed and reviewed each employee's form; and created a secure site to store the data. This comprehensive effort was crucial in ensuring a well-managed and compliant transition back to our shared physical workspace.
- **Merit Hiring**: In accordance with the January 20, 2025, EO 14170: *Reforming the Federal Hiring Process and Restoring Merit to Government Service ("Restoring Merit")*, the agency established a talent team, led by the chief human capital officer, to oversee hiring and workforce strategies and ensure implementation of the reforms outlined in the president's Merit Hiring Plan. The agency's recruitment strategies include leveraging existing federal hiring flexibilities to ensure the NTSB maintains a merit-based federal workforce. These strategies will ensure that the agency's budgetary resources are efficiently allocated to those areas of the agency with the most critical needs. Further, by proactively recruiting early-career talent, veterans, and science, technology, engineering, and mathematic professionals, the agency will have a future-ready, mission-aligned workforce to support our statutory mission of making transportation safer.
- **Probationary Periods**: In accordance with the April 24, 2025, EO 14284: *Strengthening Probationary Periods in the Federal Service*, the office achieved compliance with the new standards by establishing the required agency oversight and review processes, effectively eliminating automatic tenure and enforcing the mandatory written certification that an employee's continued appointment is in the

public interest and aligns with Civil Service Rule XI, section11.5. This work included implementing the mandatory 60-day review meetings for all new hires to ensure the agency retains only the highest-quality federal employees. In addition, 30 days prior to the end of the employee's probationary period, the employee's supervisor must provide justification for the chairman's approval to retain a probationary employee.

- **Performance Management**: In accordance with the June 17, 2025, OPM memorandum, *Performance Management for Federal Employees*, the office led the agency's review of the performance management systems for both SES/SL and GS employees. As a result, the office provided leadership and guidance to successfully integrate the new supervisory critical element, "Holding Employees Accountable," into executives' and supervisors' performance plans. Further, the office developed a comprehensive plan and timeline to ensure full compliance with this memo across all SES/SL and GS employee performance plans.

Additionally, the division provided vital guidance on critical human capital system updates, such as Quicktime, the time and attendance system; eOPF the official personnel records system; and Next FPPS, the federal payroll processing system. This proactive posture and expertise ensured the agency was well-positioned to seamlessly transition to the new versions of these platforms while safeguarding the integrity of the data they house.

The division supported emergency preparedness efforts by encouraging all employees to update their emergency contact information in Employee Express and provided this information to the NTSB's Response Operations Center and agency leadership to ensure employees can be reached promptly during emergencies.

Career Development and Training Division

During this period, the Career Development and Training Division continued to make significant strides in enhancing agencywide learning, leadership development, and training compliance.

The division collaborated with the Transportation Safety Institute within the Department of Transportation to streamline the process for investigators to attend critical, mission-related courses and allow NTSB employees to participate in specialized training, such as Human Factors in Aviation Maintenance, Rotorcraft Accident Investigation, and the Bow Tie Method of Safety Risk Management.

To improve the overall learning experience, the division developed and launched an agencywide LMS refresh. This update significantly enhanced usability, making it easier for employees to quickly find mandatory training and professional development offerings. This initiative also created numerous opportunities for employees to access free external certification training. As a result, employees leveraged the LMS to complete nearly 3,000 training courses, encompassing both instructor-led and web-based formats.

In collaboration with the Office of the Managing Director, the office successfully launched and delivered NTSB Fundamentals, a comprehensive, agencywide onboarding and training initiative. NTSB Fundamentals provides all new hires with mission-critical information while also equipping new investigators with crucial media and occupational safety and health training. A total of 59 employees participated in the training. Afterward, HCT collaborated with the Office of Safety Recommendations and Communications to develop a dedicated *Getting Started: NTSB Fundamentals* intranet page, which combines practical onboarding tools with training materials, providing employees with everything they need to get oriented in one location, solidifying the agency's commitment to employee success.

The division also facilitated access to multiple learning opportunities through key external partnerships, including the Department of Interior University, Small Agency Council, Transportation Research Board, and the Treasury Executive Institute.

Lastly, the division developed and introduced a new hire training plan through the agency's LMS, FedTalent. New hires are now notified of mandatory technology training (required prior to receiving a government computer), essential new hire training (due within 60 days after onboarding), and additional new hire training and annual safety certifications (due within 90 days). This structured notification system ensures the new hires meet all necessary training requirements.

APPENDIX A: FEDERAL DATA STRATEGY

Significant Activities in FY 2025

The NTSB is committed to implementing the Evidence Act and achieving the data management objectives defined by the Federal Data Strategy and Annual Action Plans. One of our strategic plan goals is to improve agency products and processes through data analysis. Further, we are developing metrics that will support Foundations for Evidence-Based Policymaking Act of 2018 (Pub. L 115-435) requirements for all agencies to invest in and that focus on managing and using data and evidence, linking spending to program outputs, executing mission, and better managing enterprise risks. We are prioritizing data as a strategic asset and taking significant actions to support data governance processes, establish plans for data assets and infrastructure, and expand public access to agency data. NTSB data analytics and governance activities are also expanding to include safe and effective use of AI.

Some notable actions during FY 2025 to date include the following:

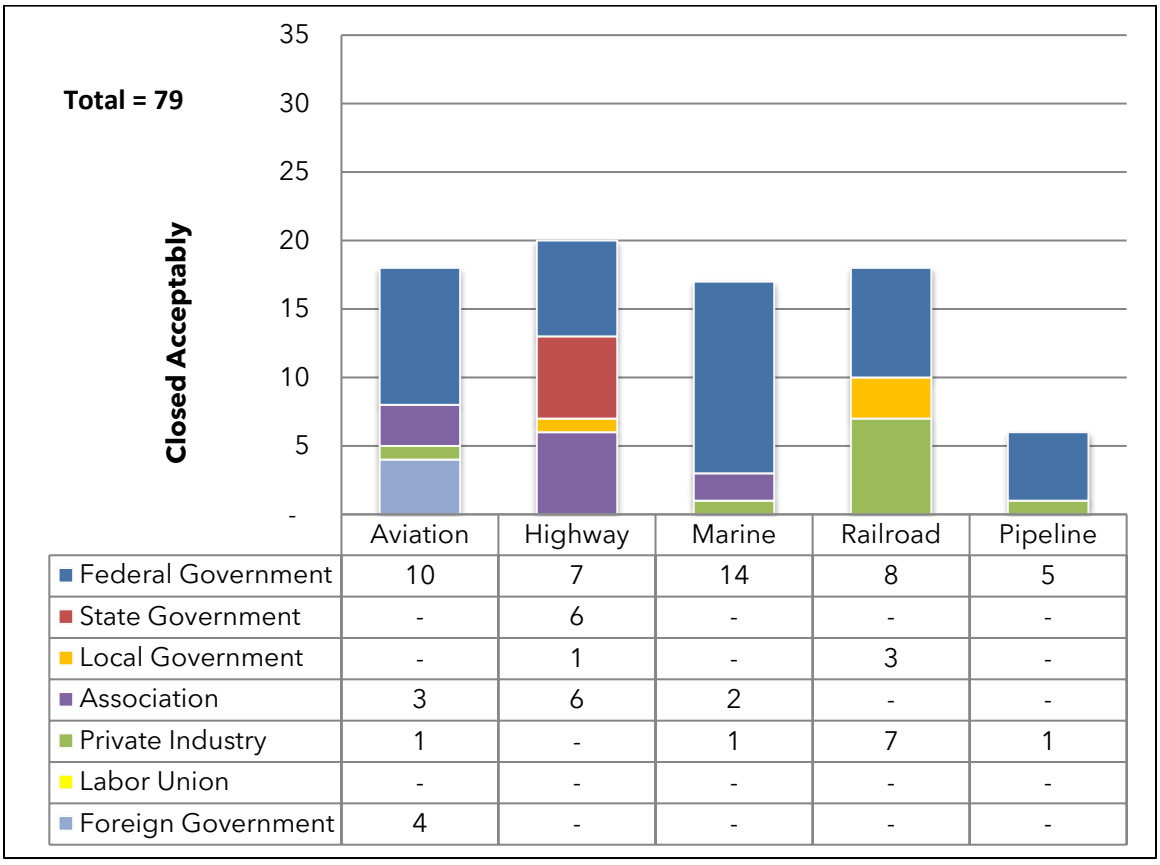
- To align with the OMB's Accelerating Use of Artificial Intelligence through Innovation, Governance, and Public Trust (M-25-21), we formally designated the agency's CDS as the NTSB chief AI officer and developed an agency plan for compliance with M-25-21, establishing clear leadership for AI strategy and oversight.
- We expanded our data analytics library with investigative dashboards displaying information such as the timeliness of investigations and the number of launches evaluated for on-scene safety risks. These tools have led to measurable improvements in operations and support more effective risk evaluation for investigators in the field, helping us prioritize their safety during investigations.
- Beyond investigative data, we added new business performance metrics to our analytics portfolio, including employee onboarding time and facility occupancy. These metrics support compliance with the president's *Return to In-Person Work* directive and the Utilization, Space, and Efficiency Improvement and Transformation Act, which promotes effective use of federal office space.

- We launched a data governance discovery initiative, engaging business process owners and data stewards across the agency. This project identified opportunities to improve data management practices. As part of the effort, we created an initial data inventory and began mapping it to federal metadata standards. We also initiated the inclusion of agency data assets in the data.gov catalog.
- In alignment with the OMB's Phase 2 Implementation of the Foundations for Evidence-Based Policymaking Act of 2018 (M-25-05), we drafted the first NTSB Open Data Plan. This plan outlines our systematic approach for making data publicly available while safeguarding privacy, confidentiality, and security.
- Looking ahead, we are committed to the safe and effective adoption of emerging analytical tools, including AI applications, to improve public access to the agency's library of investigations, studies, and safety recommendations. We have also developed APIs to efficiently share investigation data in an open format. Both are currently expected to be released to the public during FY 2026.

APPENDIX B: STATUS OF SAFETY RECOMMENDATIONS

Recommendations Closed

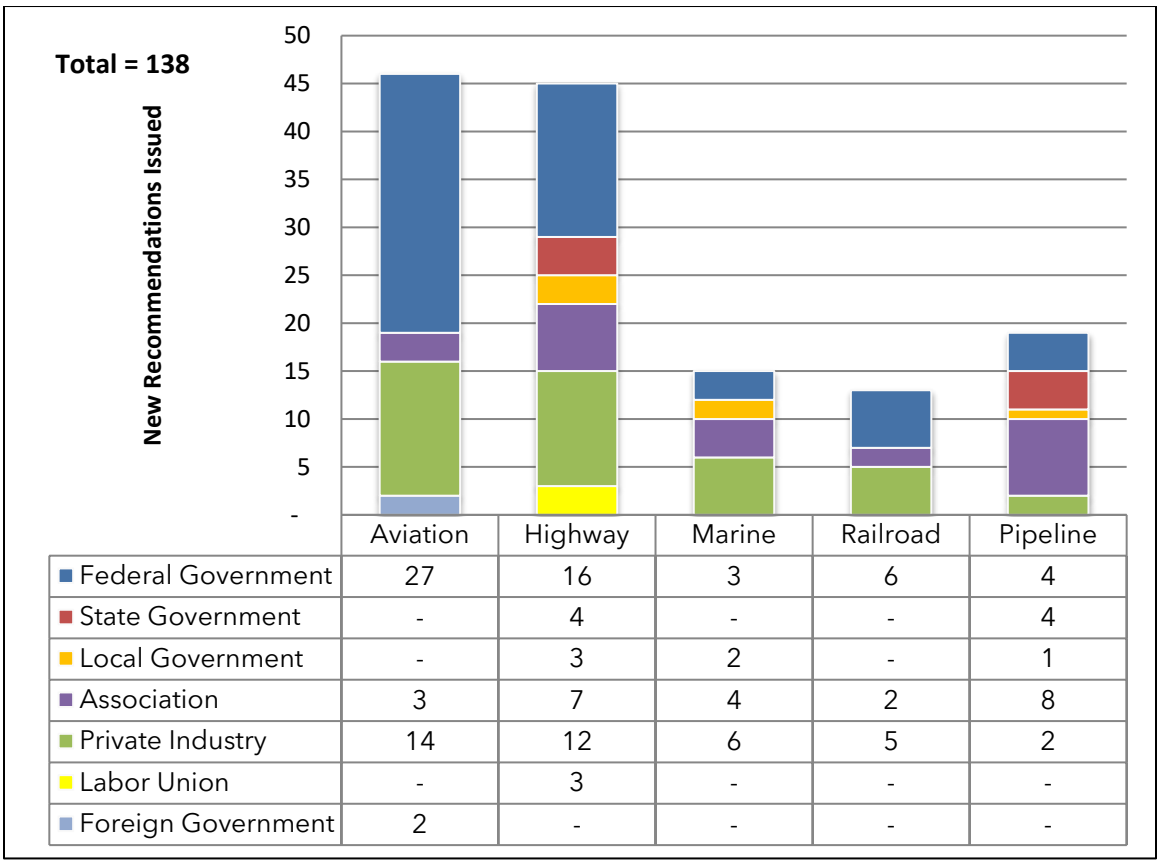
The chart below shows the distribution by transportation mode (aviation, highway, marine, railroad, pipeline) and recipient type (federal, state, or local government; association; private industry; or foreign government) of the 79 NTSB safety recommendations closed *Acceptable* from October 1, 2024, through September 30, 2025.



	Aviation	Highway	Marine	Railroad	Pipeline
Federal Government	10	7	14	8	5
State Government	-	6	-	-	-
Local Government	-	1	-	3	-
Association	3	6	2	-	-
Private Industry	1	-	1	7	1
Labor Union	-	-	-	-	-
Foreign Government	4	-	-	-	-

New Recommendations Issued

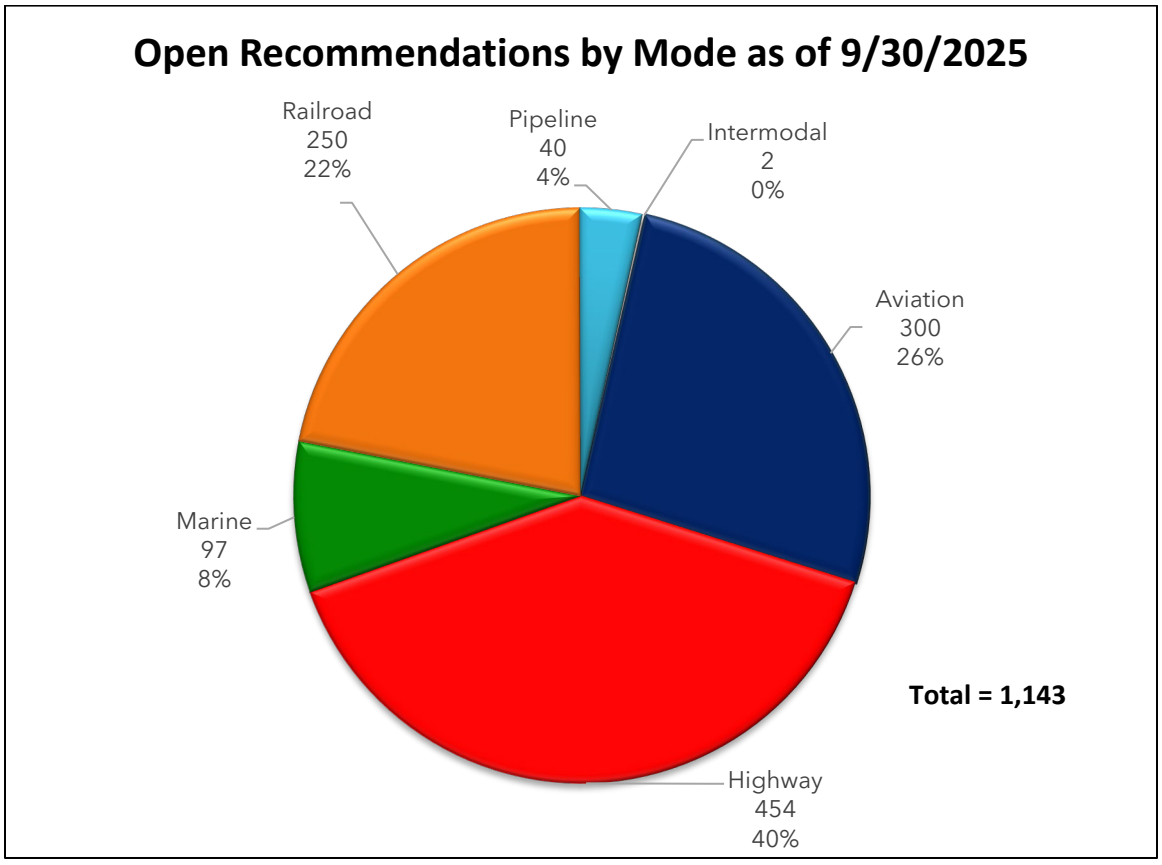
The chart below shows the distribution by transportation mode (aviation, highway, marine, railroad, pipeline) and recipient type (federal, state, or local government; association; private industry; or foreign government) of the 138 safety recommendations issued by the NTSB from October 1, 2024, through September 30, 2025.



	Aviation	Highway	Marine	Railroad	Pipeline
Federal Government	27	16	3	6	4
State Government	-	4	-	-	4
Local Government	-	3	2	-	1
Association	3	7	4	2	8
Private Industry	14	12	6	5	2
Labor Union	-	3	-	-	-
Foreign Government	2	-	-	-	-

Open Recommendations

The chart below displays the distribution by transportation mode of the 1,143 safety recommendations open as of September 30, 2025.



APPENDIX C: TRANSPORTATION DISASTER ASSISTANCE

Significant Activities in FY 2025

Transportation Disaster Assistance Support for Accident Investigations

The Transportation Disaster Assistance Division offered information and disaster assistance services to 3,669 accident survivors, family members, and family contacts associated with the following NTSB investigations from October 1, 2024, through September 30, 2025:

Launches	19
Aviation Safety	11
Marine Safety	2
Highway Safety	6
Rail Safety	-
Pipeline Safety	-

Other Investigations	812
Domestic aviation accidents	666
International aviation accidents	19
Rail accidents	52
Highway accidents	45
Pipeline accidents	9
Marine accidents	21

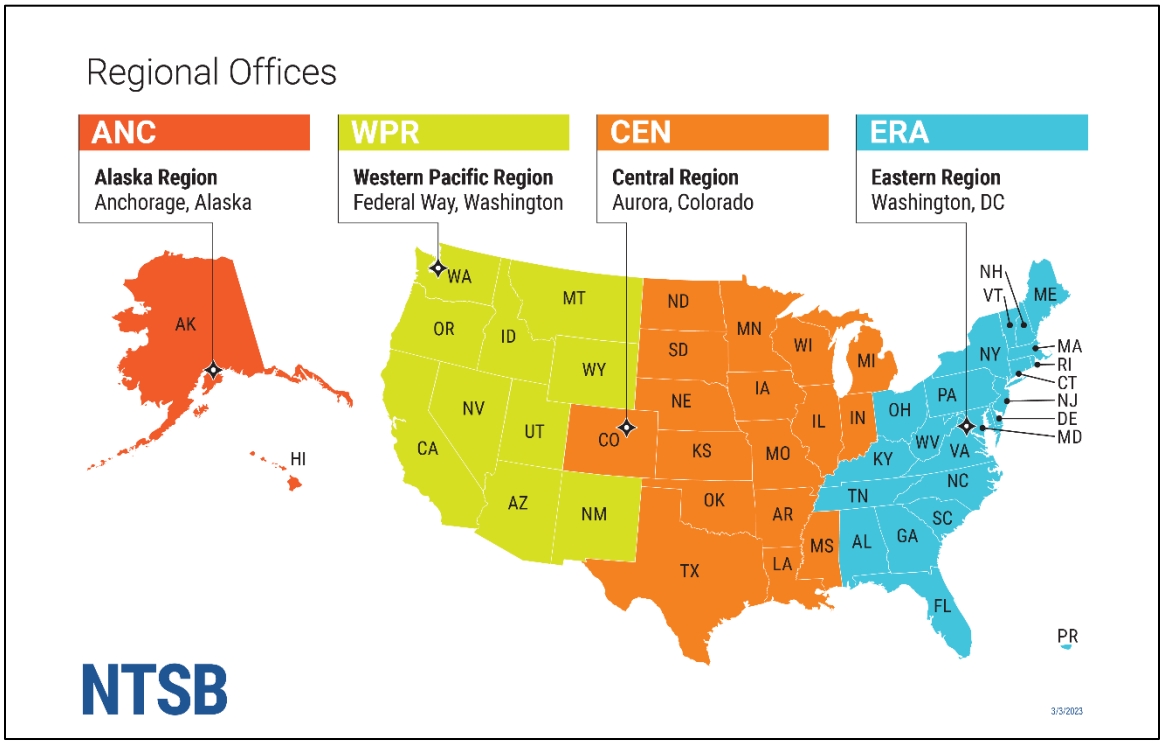
Additionally, division staff provided investigative support for 125 investigations (59 percent of new cases):

Support Type	Investigations
Healthcare system engagement	17
Medicolegal jurisdiction engagement	53
Interview coordination	33
Personal effects/evidence management	55
Medical information requests from family members	15
Records requests from family members	61
Records requests from response agencies	11
Other information of investigative value obtained from family members	52

Other Notable Division Activities

- Staff provided fatality management subject matter support to the Federal Emergency Management Agency under a Stafford Act deployment for the Hurricane Helene response in North Carolina. During the 1-week deployment, staff supported the establishment of the family assistance operation and high throughput morgue operations.
- Staff participated in 68 outreach events, resulting in direct contact with 3,766 participants; additionally, staff responded to inquiries from 465 agencies and organizations.
- Staff published the *Federal Family Assistance Framework for Rail Passenger Disasters*, which provides guidance to the family assistance response community, with a specific focus on roles and responsibilities of the NTSB and the American Red Cross under Title 49 *U.S.C.* section 1139, and rail passenger carriers that hold obligations under Title 49 *U.S.C.* section 24316, and federal agencies that have established relationships with the NTSB. Staff also published the *Medicolegal Collaboration with NTSB* guidance document for the medicolegal community, which describes scene management and documentation, autopsy, toxicology testing, and personal effects management.
- Staff continues to engage in a collaborative effort to enhance the agency's Employee Assistance, Critical Incident Stress Awareness, and Peer Support Programs.

APPENDIX D: AVIATION SAFETY REGIONAL OFFICES



	Alaska Region	Western Pacific Region	Central Region	Eastern Region
Coverage Area	Alaska and Hawaii	Arizona, California, Idaho, Montana, Nevada, New Mexico, Oregon, Utah, Washington, and Wyoming, as well as the territories of American Samoa, Guam, and the Northern Mariana Islands	Arkansas, Colorado, Illinois, Indiana, Iowa, Kansas, Louisiana, Michigan, Minnesota, Mississippi, Missouri, Nebraska, North Dakota, Oklahoma, South Dakota, Texas, and Wisconsin	Alabama, Connecticut, Delaware, Florida, Georgia, Kentucky, Maine, Maryland, Massachusetts, New Hampshire, New Jersey, New York, North Carolina, Ohio, Pennsylvania, Rhode Island, South Carolina, Tennessee, Vermont, Virginia, West Virginia, and Washington, DC, as well as the territories of Puerto Rico and the US Virgin Islands

APPENDIX E: HISTORICAL INFORMATION

NTSB Salaries and Expenses Funding History (in millions)

FY	Amount
2000*	$56.8
2001*	$62.8
2002*	$67.9
2003*	$72.0
2004*	$73.1
2005*	$76.1
2006*	$75.9
2007	$79.3
2008	$84.4
2009	$91.0
2010	$98.0
2011*	$97.8
2012	$102.4
2013*	$97.0
2014	$103.0
2015	$104.0
2016	$105.2
2017	$106.0
2018	$110.4
2019	$110.4
2020	$110.4
2021	$118.4
2022	$121.4
2023	$129.3
2024	$140.0
2025	$145.0

*Includes across-the-board rescissions

Current Board Members

Name	Board Title	Appointment	Term Expiration
Jennifer Homendy	Chairwoman	08/09/2024	08/08/2027[1]
Michael Graham	Member	12/31/2019	12/31/2025
Thomas Chapman	Member	12/31/2019	12/31/2023
John DeLeeuw	Member	03/06/2026	12/31/2026

[1] Chairwoman Homendy's term as a Board member ends December 31, 2029.

Under Title 49 *U.S.C.* section 1111(d), when the term of office of a Board member ends, the member may continue to serve until a successor begins service as a Board member or until that Board member is reconfirmed for a new term.

Emergency Fund Activity

Fiscal Year	Appropriations (Rescissions)	Obligation Activity	Balance	Purpose/Source
2000	-	-	$2,000,000	No activity
2001	-	-	$2,000,000	No activity
2002	-	$491,687	$1,508,313	Extraordinary costs related to the crash of AAL flight 587 at Belle Harbor, New York
2003	-	$4,914	$1,503,399	Adjustment of FY 2002 obligations
2004	-	($138,000)	$1,641,399	Adjustment of FY 2002 obligations
2004	$358,601	-	$2,000,000	Appropriation (Pub. L.108-199)
2004	($2,116)	-	$1,997,884	Rescission (Pub. L.108-199)
2005	-	-	$1,997,884	No activity
2006	-	-	$1,997,884	No activity
2007	-	-	$1,997,884	No activity
2008	-	-	$1,997,884	No activity
2009	-	-	$1,997,884	No activity
2010	-	-	$1,997,884	No activity
2011	-	-	$1,997,884	No activity
2012	-	-	$1,997,884	No activity
2013	-	-	$1,997,884	No activity
2014	-	-	$1,997,884	No activity
2015	-	-	$1,997,884	No activity
2016	-	-	$1,997,884	No activity
2017	-	-	$1,997,884	No activity
2018	-	-	$1,997,884	No activity
2019	-	-	$1,997,884	No activity
2020	-	-	$1,997,884	No activity
2021	-	-	$1,997,884	No activity
2022	-	-	$1,997,884	No activity
2023	-	-	$1,997,884	No activity
2024	-	-	$1,997,884	No activity
2025	-	-	$1,997,884	No activity

International Investigations

Total International Accident Investigation Costs by Fiscal Year from 2012 through 2025*

FY	Costs
2012 (a)	$1,641,132
2013 (b)	$2,366,274
2014 (c)	$976,642
2015 (d)	$1,838,241
2016 (e)	$1,664,764
2017 (f)	$826,248
2018 (g)	$902,981
2019 (h)	$2,126,327
2020	$632,682
2021	$935,571
2022	$895,787
2023	$901,463
2024	$1,194,459
2025	$1,632,988

*Since the beginning of FY 2012, the agency has captured payroll and other direct costs (such as travel) through its cost accounting systems. The totals above reflect these costs.

(a) Includes $149,707 billed to the DOT under the Safe Skies for Africa (SSA) Program.
(b) Includes $42,727 billed to the DOT under the SSA Program.
(c) Includes $64,897 billed to the DOT under the SSA Program.
(d) Includes $120,026 billed to the DOT under the SSA Program.
(e) Includes $138,115 billed to the DOT under the SSA Program.
(f) Includes $35,146 billed to the DOT under the SSA Program.
(g) Includes $88,300 billed to the DOT under the SSA Program.
(h) Includes $22,785 billed to the DOT under the SSA Program.

FY 2025 International Investigation Costs by Accident*

Description	Location	Amount
A Boeing 787 crashed immediately after take-off.	Ahmedabad, India	$302,871
A Boeing 737 overran runway, impacted a perimeter wall and ignited.	Muan County, Republic of Korea	$298,739
The 21-foot submersible *Titan* lost communication shortly into its voyage and debris consistent with the catastrophic loss of the pressure chamber was later found.	Atlantic Ocean	$155,153
A Boeing 737 impacted a house during landing.	Vilnius, Lithuania	$118,057
An Airbus A220 had smoke in cockpit.	Graz, Austria	$89,422
A US Navy aircraft carrier and a cargo vessel collided.	Port Said, Egypt	$55,827
A US tanker was struck by a Portuguese container ship.	Withernsea, United Kingdom	$52,739
An airplane flipped over during landing.	Toronto, Canada	$44,795
A Boeing 777 experienced a fatal injury turbulence encounter.	Payagyi, Burma	$37,043
A Boeing 787-8 experienced dual inertial reference unit failure.	Dabouzra, Cote D'Ivoire	$31,723
Supply vessel *Jack Edwards* experienced a loss of steering and sustained damage to its starboard midline.	Georgetown, Guyana	$28,620
A Boeing 787 had uncontained engine failure during initial climb out of Singapore Changi Airport.	Singapore, Singapore	$26,567
A Sikorsky SK76 helicopter plunged into the Atlantic Ocean.	Port Harcourt, Nigeria	$25,223
Shortly after takeoff, a helicopter lost both rotor blades and collided with terrain.	Fort Good Hope, Canada	$22,617
A Cessna 208B experienced a total loss of engine power.	Spa, Belgium, Belgium	$22,407
A Bell 206L-3 experienced main rotor blade failure.	Behchokǫ̀, Canada	$21,820

Description	Location	Amount
A Bombardier BD100 experienced No.1 engine failure during initial climb.	Nassau, Bahamas	$19,347
A Boeing 747 diverted and landed after report of vibration.	Istanbul, Turkey	$18,630
A Boeing 787-9 experienced extreme turbulence.	Pacific Ocean, Hong Kong	$18,400
A Boeing 737 had a cargo fire due to a laptop computer lithium-ion battery.	Sao Paulo, Brazil	$15,971
A Boeing 737 experienced powerplant malfunction.	Cochabamba, Bolivia	$15,950
A Beech 200 experienced cabin pressure loss due to fractured cabin door hook.	Egedesminde, Greenland	$14,414
A Boeing 747-400F tire burst during takeoff and caused damage to hydraulic system.	Hong Kong, Hong Kong	$13,429
A Beech 58 lost control in flight and collided with rocky terrain.	Amatschonjoch, Austria	$11,679
A Boeing 737 experienced No. 1 engine failure during take-off.	Budapest, Hungary	$11,101
A Boeing 747 declared emergency after experiencing partial loss of engine power.	Guayaquil, Ecuador	$11,088
A Boeing 737 sustained substantial damage during a runway excursion when the engine made contact with the ground.	Dakar, Senegal	$10,924
A Boeing 747 experienced hydraulic failure shortly after takeoff.	Incheon, Republic of Korea	$10,906
Starship 8 lost engines during ascent to orbit, re-entered atmosphere and broke up over Caribbean.	Ragged Island, Bahamas	$10,713
A Cessna 208 lost contact and was later found to have crashed into the forest.	Wat Khao Din, Thailand	$10,623
An aircraft suffered ruptured tires on both main landing gears during landing on runway.	Florianópolis, Santa Catarina, Brazil	$9,098

Description	Location	Amount
SpaceX *Starship* second stage experienced anomaly during ascent to orbit, broke up and reentered atmosphere.	East of Turks and Caicos Islands	$8,803
A Pilatus PC12 experienced flight instrument malfunction.	Geneva, Switzerland	$8,737
An Airbus A320 experienced No. 2 engine failure during takeoff.	Barcelona, Spain	$8,322
A Boeing 777FZB experienced uncontained engine failure	Narita, Japan	$8,186
Reports received indicate missing/overdue aircraft after not arriving at intended destination.	Abaco, Bahamas	$7,847
An Embraer 145 lost total engine power after takeoff.	Kumasi, Ghana	$7,718
An aircraft undershot the landing area, causing landing gear and aircraft to separate.	Cabo San Lucas, Mexico	$7,208
During the climb of Boeing 737, the No. 2 engine stopped as a result of inflight shut down on right side of aircraft.	Ciudad Juarez, Mexico	$6,949
SpaceX *Dragon2* impacted the ocean short of designated impact area.	400 nm East of New Zealand, New Zealand	$6,339
A Beechcraft 1900 undershot the landing area.	Limpopo, South Africa	$5,747
After departure, a Boeing 747-400F experienced hydraulic malfunction.	Narita, Japan	$5,586
A Cessna P210N crashed shortly after takeoff in low visibility conditions.	Dornbirn, Austria	$5,555
A Boeing 737 experienced a bird strike to windshield.	Mississauga, Canada	$5,086
A Boeing 787 experienced severe turbulence.	Waypoint DAGAG, Singapore	$5,009
Grand Total		**$1,632,988**

*Note: report includes accidents, whether occurring in the current year or previously, with more than $5,000 in FY 2025 expenses and is cumulative through September 30, 2025. Costs include payroll as well as travel and other direct costs.

NTSB | National Transportation Safety Board

ntsb.gov • *Making Transportation Safer*

The National Transportation Safety Board is an independent federal agency charged by Congress with investigating every civil aviation accident in the United States and significant events in the other modes of transportation—railroad, transit, highway, marine, pipeline, and commercial space. We determine the probable causes of the accidents and events we investigate and issue safety recommendations aimed at preventing future occurrences. In addition, we conduct transportation safety research studies and offer information and other assistance to family members and survivors for each accident or event we investigate. We also serve as the appellate authority for enforcement actions involving aviation and mariner certificates issued by the Federal Aviation Administration (FAA) and US Coast Guard, and we adjudicate appeals of civil penalty actions taken by the FAA.