U.S. Department
of Transportation

**Federal Railroad
Administration**

2011 FRA REPORT TO CONGRESS ON ACTIONS TAKEN TO IMPLEMENT UNMET STATUTORY MANDATES AND ADDRESS OPEN RECOMMENDATIONS BY THE NTSB AND THE DOT INSPECTOR GENERAL REGARDING SAFETY

(December 30, 2011)

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Basis for this Report

This report responds to Section 106 of the Rail Safety Improvement Act of 2008 (RSIA), Pub. L. No. 110-432, Div. A, 122 Stat. 4848 et seq., enacted on October 16, 2008. Section 106 reads as follows:

> **SEC. 106. REPORTS ON STATUTORY MANDATES AND RECOMMENDATIONS.**
>
> Not later than December 31, 2008, and annually thereafter, the Secretary shall transmit a report to the House of Representatives Committee on Transportation and Infrastructure and the Senate Committee on Commerce, Science, and Transportation on the specific actions taken to implement unmet statutory mandates regarding railroad safety and each open railroad safety recommendation made by the National Transportation Safety Board or the Department's Inspector General.

Reliance on FRA's December 2010 Report

In preparing this report on behalf of the Secretary of Transportation, the Federal Railroad Administration (FRA) has relied upon the report that it prepared as of December 2010 and transmitted to the appropriate Congressional committees to fulfill this annual requirement. Mandates and recommendations, either added to or removed from the December 2010 Report, are noted below.

Treatment of Mandates in RSIA

The RSIA introduced numerous mandates regarding railroad safety. A number of these mandates require action to be taken after the completion of this report, and FRA has not included in this report those mandates with statutory deadlines after December 30, 2011.

The FRA reiterates its commitment to meet each new statutory deadline to the extent practicable and has a centralized process for tracking and monitoring implementation of all Congressional rail safety mandates. This process uses Microsoft SharePoint, an Intranet-based application accessible to FRA leadership and assigned staff to review and edit information to facilitate the planning and managing of work assignments. This system is called Regulations and Program Development Tracking, or RPDT. In addition, the Office of Policy in the Office of the Secretary of Transportation has a separate, Intranet-based tracking system that uses a different type of software called the Legislative Implementation Plan Data System. The FRA has a parallel legislative implementation plan for the RSIA employing that software.

The Office of the Secretary of Transportation also has other systems for tracking the status of congressionally mandated reports to Congress, and for tracking rulemakings. The FRA would be glad to provide additional information on these tracking systems and its progress in implementing the various mandates.

Discussion of Exhibit A, "Unmet Congressional Rail Safety Mandates"

Exhibit A lists FRA's nine Congressional rail safety mandates that were unmet as of December 30, 2011, and actions to implement them. Congressional rail safety mandates that were previously implemented or not yet due have been excluded from Exhibit A. Item Nos. 1 (SAFE RAIL TRANSPORT OF CERTAIN RADIOACTIVE MATERIALS), 2 (HOURS OF SERVICE REGULATORY AUTHORITY), 3 (PEDESTRIAN CROSSING SAFETY), 4 (NOTIFICATION OF GRADE CROSSING PROBLEMS), 5 (MINIMUM TRAINING STANDARDS AND PLANS), 6 (DEVELOPMENT AND USE OF RAIL SAFETY TECHNOLOGY), 7 (ALCOHOL AND CONTROLLED SUBSTANCE TESTING FOR MAINTENANCE-OF-WAY EMPLOYEES), 8 (EMERGENCY ESCAPE BREATHING APPARATUS), and 9 (NORTHEAST CORRIDOR INFRASTRUCTURE AND OPERATIONS IMPROVEMENTS) are unmet mandates that were listed in the December 2010 Report.

Of the 18 total unmet mandates listed in the December 2010 Report:

- The FRA fulfilled the mandate in Section 203 of the RSIA to "develop and make available to States model legislation providing for improving safety by addressing sight obstructions." The FRA submitted the model law to the relevant Congressional committees, the Governor of each State, and local governmental organizations by letter dated January 7, 2011.
- The FRA fulfilled the mandate in Section 208 of RSIA to "develop and make available to State and local governments model State legislation providing for civil or criminal penalties, or both, for violations of highway-rail grade crossing signs, signals, markings, or other warning devices." After consulting with a large number of State organizations, local governments, and the railroad industry, on November 7, 2011, the Administrator approved a model State law, and by letter dated November 10, 2011, the Administrator distributed the model State law to the States and local government organizations.[1]
- The FRA implemented the mandate in Section 402 of RSIA to "prescribe regulations to establish a program requiring the certification of train conductors." The FRA published a final rule on November 9, 2011. See 76 Fed. Reg. 69802.
- The FRA completed the mandate in Section 403(a) of RSIA to report to Congress on the results of DOT research about track inspection intervals and other track safety issues. The report of the study was transmitted to Congress on May 2, 2011.
- The FRA fulfilled the mandate in Section 403(d) of RSIA to "promulgate regulations for concrete ties." On April 1, 2011, FRA published a final rule mandating specific requirements for effective concrete crossties, rail fastening systems connected to concrete

[1] Model State legislation was sent to the following organizations: National Governors Association, Council of State Governments, National Conference of State Legislatures, National Conference of Commissioners on Uniform State Laws, United States Conference of Mayors, National League of Cities, National Association of Counties, American Association of State Highway and Transportation Officials, Association of Metropolitan Planning Organizations, Association of State Rail Safety Managers, American Public Transportation Association, Association of American Railroads, American Short Line and Regional Railroad Association, National Railroad Construction and Maintenance Association, United Transportation Union, Brotherhood of Locomotive Engineers and Trainmen, Brotherhood of Maintenance of Way Employes Division, International Brotherhood of Electrical Workers, and Brotherhood of Railroad Signalmen.

crossties, and automated inspection of track constructed with crossties. See 76 Fed. Reg. 18073. On September 9, 2011, FRA published a final rule responding to the petitions for reconsideration. See 76 Fed. Reg. 55819.

- The FRA completed the mandate in Section 404 of RSIA to "complete a study to determine the most safe, efficient, and cost effective way to improve the rail passenger station platforms gaps in order to increase compliance with the requirements under the Americans with Disabilities Act." The FRA published the "Gap Guide" with the assistance of the Passenger Safety Working Group of FRA's Railroad Safety Advisory Committee, and that report was transmitted under a letter dated January 1, 2011.
- The FRA fulfilled the mandate in Section 411 of RSIA to report to Congress on DOT research about exposure of railroad employees and others to radiation. The FRA transmitted this report to Congress by letter dated January 27, 2011.
- The FRA implemented the mandate in Section 420 of RSIA to "prescribe regulations to implement subsection (a)(1) to protect the safety and health of any employees and individuals employed to maintain the right-of-way of a railroad carrier that uses camp cars." FRA published a final rule on October 31, 2011. See 76 Fed. Reg. 67073.
- The FRA completed the mandate in Section 503 of RSIA to establish a task force and report to Congress on model plans and recommendations, to be developed through a task force to be established by DOT, to help railroads respond to passenger rail accidents. This report was transmitted to Congress on April 20, 2011.

Further, FRA is current in its obligations under Section 102 of RSIA to develop a long-term strategy for improving railroad safety, assess the progress in achieving its strategic goals, and report that progress to the Senate Committee on Commerce, Science, and Transportation and the House Committee on Transportation and Infrastructure at the same time as the President's budget submission. This mandate is therefore not listed in Exhibit A.

The FRA notes that, pursuant to Section 405 of RSIA, on May 27, 2010, FRA submitted a report to Congress on the impact of the use of personal electronic devices by railroad operating employees and announced that a separate report dealing with the use of such electronic devices by other safety-related employees is planned. While FRA has not yet completed that separate report, FRA does not consider the mandate in Section 405 to be unmet, and it is not included in Exhibit A, because the section is focused on safety in the locomotive cab, which is normally occupied only by railroad operating employees.

In addition, FRA has excluded from Exhibit A the ongoing Congressional rail safety mandates that require FRA to take periodic action with no specific deadline. FRA has taken action to fulfill these mandates, recognizes the need to take additional periodic action in the future, and has a process in place to meet these mandates. The FRA would be glad to separately report on the status of any Congressional rail safety mandate not included in Exhibit A.

Discussion of Exhibit B, "Open Rail Safety Recommendations by the National Transportation Safety Board to the Federal Railroad Administration"

Exhibit B is a list of the 42 National Transportation Safety Board (NTSB) rail safety recommendations to FRA that were open as of December 30, 2011, and FRA's actions to address them. As previously explained, FRA has improved its processes and procedures to address NTSB recommendations in a more timely manner. In particular, FRA has enhanced its centralized process for tracking each rail safety recommendation through the use of Microsoft SharePoint by establishing the NTSB Recommendation Tracking System, and FRA would be glad to provide additional information on this tracking system. The FRA has also committed to ensuring that the NTSB receives an initial response to each recommendation within 90 days of issuance. The FRA's practice is to submit a tentative implementation schedule as part of that initial response for each rail safety recommendation that needs to be implemented, and periodically update the implementation schedule.

Of the 44 recommendations listed in the December 2010 Report, the NTSB has closed the following safety recommendation numbers (Rec. Nos.): R-92-22, with the classification "Closed – Unacceptable Action" and R-04-06, with the classification "Closed – Acceptable Action." These recommendations are therefore not listed in Exhibit B.

<u>Open – Acceptable Response</u>

Item Nos. 1 through 31, in Exhibit B, corresponding to NTSB Rec. Nos. R-00-01 through R-00-04, R-01-02, R-01-17, R-02-01, R-02-24 through R-02-26, R-04-07, R-05-02, R-05-09, R-05-17, R-06-07, R-06-19, R-06-26, R-07-01, R-08-05 through R-08-07, R-08-09 through R-08-11, R-09-01 through R-09-03, R-09-21, and R-09-22 remain classified as "Open – Acceptable Response," as in the December 2010 Report.

Two open safety recommendations that remain on the list from the December 2010 Report have been reclassified as "Open – Acceptable Response." Item Nos. 30 and 31, in Exhibit B, corresponding to NTSB Rec. Nos. R-10-01 and R-10-02, were previously classified as "Open – Response Received."

<u>Open – Acceptable Alternate Response</u>

Item No. 32, corresponding to NTSB Rec. No. 05-14, remains classified as "Open – Acceptable Alternate Response."

<u>Open – Unacceptable Response</u>

Item Nos. 33 through 42, corresponding to NTSB Rec. Nos. R-97-15, R-97-17, R-98-56, R-02-05, R-03-12, R-04-01, R-05-10, R-06-10, R-07-02, and R-08-12, remain classified as "Open – Unacceptable Response."

The FRA has an ongoing dialogue with NTSB to further the favorable closure of each open rail safety recommendation.

Discussion of Exhibit C, "Open Rail Safety Recommendations by the Office of Inspector General"

Exhibit C contains the one rail safety recommendation by the Department's Office of Inspector General (OIG) that was open as of December 30, 2011, and FRA's actions to address it. Item No. 1 is the same recommendation that was listed in the December 2010 report as Item No. 2. The OIG has favorably closed Item No. 1 in the December 2010 report, which concerned developing model legislation for States to improve safety by addressing sight obstructions at grade crossings.

Conclusion

The U.S. Department of Transportation recognizes the significance of each unmet statutory mandate and open recommendation of NTSB and OIG regarding rail safety. The FRA has focused its efforts on implementing each unmet mandate and addressing each open recommendation in a timely manner to the extent practicable. We would be glad to provide any additional information on FRA's progress in doing so and on the status of any mandate or recommendation.

EXHIBIT A. UNMET CONGRESSIONAL RAIL SAFETY MANDATES (AS OF DECEMBER 30, 2011)

Item No.	Short Title, Public Law Citation, and Enactment Date	Section and U.S. Code Citation, If Any	Unmet Statutory Mandate	Actions Taken by FRA	Actions Needed to Be Taken by FRA
1	Hazardous Materials Transportation Uniform Safety Act of 1990, Pub. L. No. 101-615, November 16, 1990.	Section 15 Amended Section 116(b) of the Hazardous Materials Transportation Act (then Title 49, U.S.C. App. 1813); provision now codified at 49 U.S.C. 5105(c))	"(b) SAFE RAIL TRANSPORT OF CERTAIN RADIOACTIVE MATERIALS - Within 24 months after the date of enactment of this section taking into consideration the findings of the study conducted pursuant to subsection (a), the Secretary shall amend existing regulations as the Secretary deems appropriate to provide for the safe transportation by rail of high-level radioactive waste and spent nuclear fuel by various methods of rail transportation, including by dedicated train."	The study required by subsection (a) was submitted to Congress on September 22, 2005. Subsequent to completion of the study, FRA conducted additional needed research on the operational characteristics and configuration of trains transporting spent nuclear fuel (SNF) and high-level radioactive waste (HLRW). Recent events have drastically lengthened the timeline for anticipated increases in rail transport activity of SNF/HLRW. Very little non-freight containerized SNF/HLRW currently moves by rail with no anticipated increase to occur in the foreseeable future. Nonetheless, FRA expects to issue a Notice of Proposed Rulemaking (NPRM) in FY 2012.	Prepare an NPRM and final rule, based on results of research and review as the Secretary deems appropriate.

Item No.	Short Title, Public Law Citation, and Enactment Date	Section and U.S. Code Citation, If Any	Unmet Statutory Mandate	Actions Taken by FRA	Actions Needed to Be Taken by FRA
2	Rail Safety Improvement Act of 2008, Pub. L. No. 110-432, Div. A, October 16, 2008.	Section 108 (HOURS OF SERVICE REGULATORY AUTHORITY) Amended Title 49, U.S.C. by adding new Section 21109	"(e) PILOT PROJECTS.—(1) IN GENERAL.—Not later than 2 years after the date of enactment of the Rail Safety Improvement Act of 2008, the Secretary shall conduct at least 2 pilot projects of sufficient size and scope to analyze specific practices which may be used to reduce fatigue for train and engine and other railroad employees as follows: (A) A pilot project at a railroad or railroad facility to evaluate the efficacy of communicating to employees notice of their assigned shift time 10 hours prior to the beginning of their assigned shift as a method for reducing employee fatigue. (B) A pilot project at a railroad or railroad facility to evaluate the efficacy of requiring railroads who use employee scheduling practices that subject employees to periods of unscheduled duty calls to assign employees to defined or specific unscheduled call shifts that are followed by shifts not subject to call, as a method for reducing employee fatigue."	In order to successfully fulfill this mandate, FRA must first receive requests from railroads and rail labor organizations to participate in the pilot projects. FRA has not yet received any requests but continues to encourage affected parties to use this option. Because of the lack of interest in developing pilot projects in the rail industry, FRA started the process of developing plans for pilot projects that can be expected to address fatigue issues in the freight railroad industry. The intent is to present pilot projects proposed by FRA to freight railroads and relevant labor unions and to work with them on implementing these pilot projects. If the railroads and labor unions agree to conduct a pilot project, and FRA provides waivers from the requirements of the hours of service laws (HSL) when necessary, an analysis of safety data will be performed to determine the effectiveness of those pilot projects. If FRA determines, using a risk assessment process, that a pilot project has had a positive impact on safety, this information may be used to encourage railroads to incorporate similar arrangements at locations that appear to be at risk for fatigue. The information gained from these pilot projects, if implemented, and relevant waivers from the provisions of the HSL, will also be shared with Congress as appropriate. Should FRA gain participants in a pilot project, several years will be needed to accumulate relevant data. The earliest it could begin the required analysis would be at least 2 years from the initiation of such a pilot project, and the earliest possible date for completion of such analysis would be the end of fiscal year 2014.	Continue to encourage affected parties to participate in the pilot projects.

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3	Rail Safety Improvement Act of 2008, Pub. L. No. 110-432, Div. A, October 16, 2008.	Section 201 (PEDESTRIAN CROSSING SAFETY) (49 U.S.C. 20134 note)	"Not later than 1 year after the date of enactment of this Act, the Secretary shall provide guidance to railroads on strategies and methods to prevent pedestrian accidents, incidents, injuries, and fatalities at or near passenger stations, including—(1) providing audible warning of approaching trains to the pedestrians at railroad passenger stations; (2) using signs, signals, or other visual devices to warn pedestrians of approaching trains; (3) installing infrastructure at pedestrian crossings to improve the safety of pedestrians crossing railroad tracks; (4) installing fences to prohibit access to railroad tracks; and (5) other strategies or methods as determined by the Secretary."	FRA has been working with the Federal Transit Administration and industry stakeholders on this issue, and it was an active Railroad Safety Advisory Committee (RSAC) task when the law was enacted. FRA had previously completed and published a compilation of pedestrian control devices that are currently being used. Draft preliminary guidance has been shared with an RSAC task force, and refined based on its input; and in January 2011, the preliminary guidance was sent to Congress and posted on FRA's Web site. The final guidance was approved by the Administrator on December 19, 2011, and is currently undergoing clearance within the Executive Branch.	Complete and issue final guidance document.

Item No.	Short Title, Public Law Citation, and Enactment Date	Section and U.S. Code Citation, If Any	Unmet Statutory Mandate	Actions Taken by FRA	Actions Needed to Be Taken by FRA
4	Rail Safety Improvement Act of 2008, Pub. L. No. 110-432, Div. A, October 16, 2008.	Section 205 (NOTIFICA-TION OF GRADE CROSSING PROBLEMS) Amended Title 49, U.S.C. by adding new Section 20152	"(a) IN GENERAL.—Not later than 18 months after the date of enactment of the Rail Safety Improvement Act of 2008, the Secretary of Transportation shall require each railroad carrier to—(1) establish and maintain a toll-free telephone service for rights-of-way over which it dispatches trains, to directly receive calls reporting—(A) malfunctions of signals, crossing gates, and other devices to promote safety at the grade crossing of railroad tracks on those rights-of-way and public or private roads; (B) disabled vehicles blocking railroad tracks at such grade crossings; (C) obstructions to the view of a pedestrian or a vehicle operator for a reasonable distance in either direction of a train's approach; or (D) other safety information involving such grade crossings; (2) upon receiving a report pursuant to paragraph (1)(A) or (B), immediately contact trains operating near the grade crossing to warn them of the malfunction or disabled vehicle; (3) upon receiving a report pursuant to paragraph (1)(A) or (B), and after contacting trains pursuant to paragraph (2), contact, as necessary, appropriate public safety officials having jurisdiction over the grade crossing to provide them with the information necessary for them to direct traffic, assist in the removal of the disabled vehicle, or carry out other activities as appropriate; (4) upon receiving a report pursuant to paragraph (1)(C) or (D), timely investigate the report, remove the obstruction if possible, or correct the unsafe circumstance; and (5) ensure the placement at each grade crossing on rights-of-way that it owns of appropriately located signs, on which shall appear, at a minimum— (A) a toll-free telephone number to be used for placing calls described in paragraph (1) to the railroad carrier dispatching trains on that right-of-way; (B) an explanation of the purpose of that toll-free telephone number; and (C) the grade crossing number assigned for that crossing by the National Highway-Rail Crossing Inventory established by the Department of Transportation."	Emergency notification systems (ENS) are already implemented at a majority of public highway-rail grade crossings in the United States, as described in FRA's May 2006 Report to Congress titled, "Pilot Programs for Emergency Notification Systems at Highway-Rail Grade Crossings," which is available on FRA's Web site at: http://www.fra.dot.gov/downloads/safety/1_800_report.pdf. Section 205 requires that FRA mandate such systems for private crossings as well, and FRA published an NPRM proposing to do so on March 4, 2011. See 76 Fed. Reg. 11992. FRA notes that the benefits that result from these systems are directly related to the number of trains and motor vehicles using the subject crossings. Since the majority of crossings used by the greatest number of trains and motor vehicles are on Class I railroads and the fact that all Class I railroads have implemented some type of ENS, the ENS currently in place, with FRA encouragement, already capture the vast majority of benefits that are available.	Issue regulations as necessary.

Item No.	Short Title, Public Law Citation, and Enactment Date	Section and U.S. Code Citation, If Any	Unmet Statutory Mandate	Actions Taken by FRA	Actions Needed to Be Taken by FRA
5	Rail Safety Improvement Act of 2008, Pub. L. No. 110-432, Div. A, October 16, 2008.	Section 401 (MINIMUM TRAINING STANDARDS AND PLANS) Amended Title 49, U.S.C. by adding Section 20162	''(a) IN GENERAL.—The Secretary of Transportation shall, not later than 1 year after the date of enactment of the Rail Safety Improvement Act of 2008, establish—(1) minimum training standards for each class and craft of safety-related railroad employee (as defined in Section 20102) and equivalent railroad carrier contractor and subcontractor employees, which shall require railroad carriers, contractors, and subcontractors to qualify or otherwise document the proficiency of such employees in each such class and craft regarding their knowledge of, and ability to comply with, Federal railroad safety laws and regulations and railroad carrier rules and procedures promulgated to implement those Federal railroad safety laws and regulations; (2) a requirement that railroad carriers, contractors, and subcontractors develop and submit training and qualification plans to the Secretary for approval, including training programs and information deemed necessary by the Secretary to ensure that all safety-related railroad employees receive appropriate training in a timely manner; and (3) a minimum training curriculum, and ongoing training criteria, testing, and skills evaluation measures to ensure that safety-related railroad employees, and contractor and subcontractor employees, charged with the inspection of track or railroad equipment are qualified to assess railroad compliance with Federal standards to identify defective conditions and initiate immediate remedial action to correct critical safety defects that are known to contribute to derailments, accidents, incidents, or injuries, and, in implementing the requirements of this paragraph, take into consideration existing training programs of railroad carriers."	FRA informed Congress by letter on January 16, 2009, that FRA would not meet the 12-month timetable. FRA noted that it already has in place significant training requirements for a variety of subjects, and it has regularly included training elements in each of the new and revised regulatory programs that FRA has issued in recent years. Nevertheless, given the number of technical disciplines represented on the railroad properties and the breadth of the knowledge, skills, and abilities required to execute the tasks that they are required to accomplish safely, this provision requires an extensive effort. On February 11, 2010, RSAC accepted the task of assisting FRA in developing recommendations for minimum training standards and plans through the Training Standards Working Group. On December 14, 2010, RSAC approved the Working Group's recommendations to draft an NPRM addressing the statutory requirements. Publication of an NPRM is expected early in 2012.	Issue regulations as necessary.

Item No.	Short Title, Public Law Citation, and Enactment Date	Section and U.S. Code Citation, If Any	Unmet Statutory Mandate	Actions Taken by FRA	Actions Needed to Be Taken by FRA
6	Rail Safety Improvement Act of 2008, Pub. L. No. 110-432, Div. A, October 16, 2008.	Section 406 (DEVELOP-MENT AND USE OF RAIL SAFETY TECHNOLOGY) Amended Title 49, U.S.C. by adding new Section 20164	‘‘(a) IN GENERAL.—Not later than 1 year after enactment of the [Rail] Safety [Improvement] Act of 2008, the Secretary of Transportation shall prescribe standards, guidance, regulations, or orders governing the development, use, and implementation of rail safety technology in dark territory, in arrangements not defined in Section 20501 or otherwise not covered by Federal standards, guidance, regulations, or orders that ensure the safe operation of such technology, such as—(1) switch position monitoring devices or indicators; (2) radio, remote control, or other power-assisted switches; (3) hot box, high water, or earthquake detectors; (4) remote control locomotive zone limiting devices; (5) slide fences; (6) grade crossing video monitors; (7) track integrity warning systems; or (8) other similar rail safety technologies, as determined by the Secretary.”	FRA has prioritized the review of railroad plans and product safety submissions under the Positive Train Control (PTC) mandate of Section 104; indeed, many dark-territory lines will be equipped with PTC during that effort (largely mooting the issue of lesser technology for those lines). With the progress made in implementing the PTC mandate, on September 23, 2010, the full RSAC accepted the task to provide advice regarding development of standards, guidance, regulations, or orders governing the development, use, and implementation of rail safety technology in dark territory. Therefore, the Dark Territory Working Group was formed with the approval of the full RSAC in December 2010. The Dark Territory Working Group has met four times thus far. Based on input provided by the Dark Territory Working Group, a draft document addressing proposed guidance regarding the use of unusual contingency detectors, track integrity systems, switch point monitoring systems, and power-assisted switches is being developed. In addition, FRA intends to issue an NPRM in late 2012 that would require railroads to submit plans to address the installation, adjustment, testing, maintenance, and inspection of these safety devices for FRA approval.	Issue guidance document and prepare NPRM.

Item No.	Short Title, Public Law Citation, and Enactment Date	Section and U.S. Code Citation, If Any	Unmet Statutory Mandate	Actions Taken by FRA	Actions Needed to Be Taken by FRA
7	Rail Safety Improvement Act of 2008, Pub. L. No. 110-432, Div. A, October 16, 2008.	Section 412 (ALCOHOL AND CONTROLLED SUBSTANCE TESTING FOR MAINTEN-ANCE-OF-WAY EMPLOYEES)	"Not later than 2 years following the date of enactment of this Act, the Secretary of Transportation shall complete a rulemaking proceeding to revise the regulations prescribed under Section 20140 of Title 49, United States Code, to cover all employees of railroad carriers and contractors or subcontractors to railroad carriers who perform maintenance-of-way activities."	After engaging in discussions with stakeholders (focused primarily on how to define maintenance-of-way (MOW) activities and how to expand FRA's alcohol and drug regulations to a large population of MOW contractors), FRA has drafted an NPRM that is currently undergoing internal review. This NPRM would also respond to various NTSB recommendations and otherwise update the regulations. FRA anticipates the NPRM will be published in 2012.	Issue regulations as necessary.

Item No.	Short Title, Public Law Citation, and Enactment Date	Section and U.S. Code Citation, If Any	Unmet Statutory Mandate	Actions Taken by FRA	Actions Needed to Be Taken by FRA
8	Rail Safety Improvement Act of 2008, Pub. L. No. 110-432, Div. A, October 16, 2008.	Section 413 (EMERGENCY ESCAPE BREATHING APPARATUS) Amended Title 49, U.S.C. by adding new Section 20166	"Not later than 18 months after the date of enactment of the Rail Safety Improvement Act of 2008, the Secretary of Transportation shall prescribe regulations that require railroad carriers—(1) to provide emergency escape breathing apparatus suitable to provide head and neck coverage with respiratory protection for all crewmembers in locomotive cabs on freight trains carrying hazardous materials that would pose an inhalation hazard in the event of release; (2) to provide convenient storage in each freight train locomotive to enable crewmembers to access such apparatus quickly; (3) to maintain such equipment in proper working condition; and (4) to provide their crewmembers with appropriate training for using the breathing apparatus."	In March 2009, FRA completed a contract study to determine the feasibility of providing appropriate breathing apparatus capable of protecting crewmembers from the chemicals that may pose inhalation hazards. The study reviewed the types of emergency escape breathing apparatus (EEBA) available, how the EEBA should be assigned, what training would be necessary for safe use of the EEBA, and the cost of instituting an EEBA program. The study is available on FRA's Web site at: http://www.fra.dot.gov/downloads/Research/ord0911.pdf. FRA used information contained in the study as well as information gained from consultations with the railroad industry and railroad labor organizations to publish an NPRM on October 5, 2010. See 75 Fed. Reg. 61386. FRA received several comments to the NPRM. FRA is currently reviewing the comments and is developing a final rule.	Issue final rule.

Item No.	Short Title, Public Law Citation, and Enactment Date	Section and U.S. Code Citation, If Any	Unmet Statutory Mandate	Actions Taken by FRA	Actions Needed to Be Taken by FRA
9	Passenger Rail Investment and Improvement Act of 2008, Pub. L. No. 110-432, Div. B, October 16, 2008.	Section 212 (NORTHEAST CORRIDOR INFRASTRUCT-URE AND OPERATIONS IMPROVE-MENTS) (49 U.S.C. 24905)	"(f) NORTHEAST CORRIDOR SAFETY COMMITTEE.—(1) IN GENERAL.—The Secretary shall establish a Northeast Corridor Safety Committee composed of members appointed by the Secretary. The members shall be representatives of—(A) the Department of Transportation, including the Federal Railroad Administration; (B) Amtrak; (C) freight carriers operating more than 150,000 train miles a year on the main line of the Northeast Corridor; (D) commuter rail agencies; (E) rail passengers; (F) rail labor; and (G) other individuals and organizations the Secretary decides have a significant interest in rail safety or security. (2) FUNCTION; MEETINGS.—The Secretary shall consult with the Committee about safety and security improvements on the Northeast Corridor main line. The Committee shall meet at least two times per year to consider safety and security matters on the main line. (3) REPORT.—At the beginning of the first session of each Congress, the Secretary shall submit a report to the [Northeast Corridor Infrastructure and Operations Advisory] Commission and to the Committee on Transportation and Infrastructure of the House of Representatives and the Committee on Commerce, Science, and Transportation of the Senate on the status of efforts to improve safety and security on the Northeast Corridor main line. The report shall include the safety and security recommendations of the Committee and the comments of the Secretary on those recommendations."	To help address operational safety issues in the Northeast Corridor, FRA formed the Northeast Corridor Safety Committee (Committee), comprising FRA, the Transportation Security Administration, Amtrak, freight carriers operating more than 150,000 train miles a year on the main line of the Northeast Corridor, commuter railroads, rail passengers, rail labor, and other individuals and organizations the Secretary decides have a significant interest in rail safety or security. An inaugural meeting is scheduled for February 22, 2012. FRA notes that the Northeast Corridor Infrastructure and Operations Advisory Commission (Commission), which was separately mandated by Section 212(a) of the RSIA and is to receive bi-annual reports conveying the Committee's recommendations, held its inaugural meeting on September 27, 2010.	Begin Committee consultations. Submit bi-annual report conveying Committee's recommendations to the Commission and the respective Congressional Committees.

EXHIBIT B. OPEN RAIL SAFETY RECOMMENDATIONS BY THE NATIONAL TRANSPORTATION SAFETY BOARD (NTSB) TO THE FEDERAL RAILROAD ADMINISTRATION[1] (AS OF DECEMBER 30, 2011)

Item No.	Issue Date	Rec. No.	Open NTSB Recommendation	NTSB Classification and Actions Taken by FRA	Actions Needed to Be Taken by FRA
1	01/13/00	R-00-01	NTSB recommended that FRA establish, with assistance from experts on the effects of pharmacological agents on human performance and alertness, procedures or criteria by which train operating crewmembers who medically require substances not on DOT's list of approved medications may be allowed, when appropriate, to use those medications when performing their duties.	Open – Acceptable Response. In a forthcoming Notice of Proposed Rulemaking (NPRM), FRA is proposing major revisions to its regulations on alcohol and drug use (49 CFR Part 219). To address recommendations R-00-01, R-00-02, and R-00-03 on the use of therapeutic medications by train operating crewmembers and other regulated employees (see response to R-00-24 below), FRA would expand the scope of its section on medications use (Section 219.103) to cover more prescription and over-the-counter (OTC) drugs. FRA would also provide a training module which could be used as a model for required training on the hazards of performing regulated service while using drugs with possible sedating or impairing effects. In addition, to facilitate informed decision making by employees and health care practitioners (HCP), FRA has developed a form for documenting an employee's consultation with his or her HCP. The purpose of this form, which would be recommended but not required, would be to involve an employee's prescribing HCP in deciding if and when the employee's use of a prescribed or recommended drug would be consistent with safe performance of regulated service.	Issue regulations as necessary.
2	01/13/00	R-00-02	NTSB recommended that FRA develop, then periodically publish, an easy-to-understand source of information for train operating crewmembers on the hazards of using specific medications when performing their duties.	Open – Acceptable Response. See FRA's response to R-00-01. FRA is proposing to require training for train crews and others on the hazards of using specific medications when performing their duties.	Complete and publish guidance document. Issue regulations as necessary.

[1] NTSB recommendations are listed in the following order by NTSB classification: Item Nos. 1 through 31, "Open – Acceptable Response"; Item No. 32, "Open – Acceptable Alternate Response"; and Item Nos. 33 through 42, "Open – Unacceptable Response." Within each NTSB classification, NTSB recommendations are listed in chronological order by the date of issuance of the recommendation, and within the same date of issuance, by the number of the recommendation (Rec. No.).

Item No.	Issue Date	Rec. No.	Open NTSB Recommendation	NTSB Classification and Actions Taken by FRA	Actions Needed to Be Taken by FRA
3	01/13/00	R-00-03	NTSB recommended that FRA establish and implement an educational program targeting train operating crewmembers that, at a minimum, ensures that all crewmembers are aware of the source of information described in NTSB Rec. No. R-00-002 regarding the hazards of using specific medications when performing their duties.	Open – Acceptable Response. See FRA's responses to R-00-01 and R-00-02.	Issue regulations as necessary.
4	01/13/00	R-00-04	NTSB recommended that FRA establish, in coordination with DOT, the Federal Motor Carrier Safety Administration, the Federal Transit Administration, and the U.S. Coast Guard, comprehensive toxicological testing requirements for an appropriate sample of fatal highway, railroad, transit, and marine accidents to ensure the identification of the role played by common prescription and over-the-counter medications. FRA is to review and analyze the results of such testing at intervals not to exceed every 5 years.	Open – Acceptable Response. FRA has drafted a second Part 219 NPRM which would add additional drugs of concern, such as synthetic opiates and sedating antihistamines, to the panel of drugs tested for under its post accident testing program. FRA is currently coordinating this proposal with the Department of Justice and the Office of Management and Budget.	Issue regulations as necessary.

Item No.	Issue Date	Rec. No.	Open NTSB Recommendation	NTSB Classification and Actions Taken by FRA	Actions Needed to Be Taken by FRA
5	03/12/01	R-01-02	NTSB recommended that FRA evaluate, with the assistance of Research and Special Programs Administration, the Association of American Railroads (AAR), and the Railway Progress Institute, the deterioration of pressure relief devices through normal service and then develop inspection criteria to ensure that the pressure relief devices remain functional between regular inspection intervals. FRA is to incorporate these inspection criteria into DOT's Hazardous Materials Regulations.	Open – Acceptable Response. FRA has drafted a scope of work to quantify the effects of environmental factors on the results of bench tests used to determine the onset of discharge and vapor tight pressures of pressure relief valves under different environments. The results of this study will enable the development of a correction factor based on specified environmental factors that will, in conjunction with FRA's previous research performed using Analysis of Fire Effects on Tank Cars software, enable FRA to establish a meaningful performance standard for pressure relief valves. This research will start in February 2012.	Evaluate research results and work with PHMSA to issue regulations as necessary.
6	09/24/01	R-01-17	NTSB recommended that FRA modify Title 49 of the Code of Federal Regulations, Section 219.201(b), as necessary to ensure that the exemption from mandatory post-accident drug and alcohol testing for those involved in highway-rail grade crossing accidents does not apply to any railroad signal, maintenance, and other employees whose actions at or near a grade crossing involved in an accident may have contributed to the occurrence or severity of the accident.	Open – Acceptable Response. The NPRM discussed in R-00-01 would narrow FRA's grade crossing exemption by allowing post accident testing of a railroad signal, maintenance, or other employee who may have contributed to the cause or severity of an accident.	Issue regulations as necessary.

Item No.	Issue Date	Rec. No.	Open NTSB Recommendation	NTSB Classification and Actions Taken by FRA	Actions Needed to Be Taken by FRA
7	02/15/02	R-02-01	NTSB recommended that FRA, for all railroads that install new or upgraded grade crossing warning systems that include crossing gates and that are equipped with event recorders, require that the information captured by event recorders include the position of the deployed gates.	Open – Acceptable Response. FRA intends to open Part 234 for amendments upon completing RSIA rulemaking mandates. At that time, when FRA and industry stakeholder personnel are available, FRA intends to address this issue within those amendments.	Issue regulations, as necessary.
8	11/27/02	R-02-24	NTSB recommended that FRA develop a standard medical examination form that includes questions regarding sleep problems and require that the form be used, pursuant to Title 49 of the Code of Federal Regulations Part 240, to determine the medical fitness of locomotive engineers; the form should also be available for use to determine the medical fitness of other employees in safety-sensitive positions.[2]	Open – Acceptable Response. On September 21, 2006, FRA tasked the Railroad Safety Advisory Committee (RSAC) to develop and recommend medical standards and procedures for determining the medical fitness-for-duty of personnel engaged in safety-critical functions. The RSAC established a Medical Standards Working Group (MSWG) and FRA continues to work with the MSWG on issues relevant to completion of that task. Substantial progress has been made in developing a template that is responsive to R-02-24. A draft "Health History Template" prepared by the MSWG Physicians Task Force has been distributed to MSWG members for review and comment. FRA anticipates that the RSAC will deliver a publishable template during 2012. FRA has also taken action to sponsor development of a Web site: The Railroaders' Guide to Healthy Sleep. The Web site is designed to provide locomotive engineers, conductors, and other safety-critical personnel educational information about sleep disorders, access to a screening questionnaire for obstructive sleep apnea, and information about how the questionnaire can be used to screen for undiagnosed sleep apnea, how to obtain further evaluation and treatment for sleep disorders, how lack of sleep and circadian misalignment affect performance, and how railroad personnel can get the sleep they need. The Web site, a joint initiative of FRA, DOT's Volpe National Transportation Systems Center (Volpe Center), Harvard Medical School Division of Sleep Medicine, and WGBH Education Foundation, is tentatively scheduled to be online by February 2012.	Issue guidance documents as necessary.

[2] On June 23, 2011, NTSB announced its annual updates to its "Most Wanted List." This year, NTSB changed the format of the Most Wanted List. Rather than highlight those specific recommendations that, if acted upon, will most improve safety, NTSB prepared a list of the 10 most critical transportation issue areas that need to be addressed to improve safety and save lives. The NTSB selected the following issue areas: general aviation safety, runway safety, bus occupant safety, safety management systems, recorders, addressing human fatigue, pilot and air traffic control professionalism, teen driver safety, addressing alcohol-impaired driving, and motorcycle safety.

Item No.	Issue Date	Rec. No.	Open NTSB Recommendation	NTSB Classification and Actions Taken by FRA	Actions Needed to Be Taken by FRA
9	11/27/02	R-02-25	NTSB recommended that FRA require that any medical condition that could incapacitate, or seriously impair the performance of, an employee in a safety-sensitive position be reported to the railroad in a timely manner.[3]	Open – Acceptable Response. See response to R-02-24. In addition, FRA, working with the MSWG and its Physicians Task Force, has made significant progress in developing the following: (1) a list of the more common medical conditions and events that can cause serious impairments of hearing and vision and/or sudden incapacitation, (2) guidance that explains how these medical conditions can affect one's capacity to safely perform safety-critical service, and (3) medical qualification criteria and assessment protocols that a railroad may use to reduce the risk that a certified locomotive engineer or conductor would experience sudden incapacitation or a serious impairment of hearing or vision while performing safety-critical service. Draft documents prepared by the MSWG's Physicians Task Force have been distributed to the Working Group for review and comment. The MSWG has established a task force to format these documents and incorporate agreed upon changes. FRA anticipates that RSAC will complete its task during 2012.	Issue guidance documents as necessary.
10	11/27/02	R-02-26	NTSB recommended that FRA require that, when a railroad becomes aware that an employee in a safety-sensitive position has a potentially incapacitating or performance-impairing medical condition, the railroad prohibit that employee from performing any safety-sensitive duties until the railroad's designated physician determines that the employee can continue to work safely in a safety-sensitive position.[4]	Open – Acceptable Response. See FRA's responses to R-02-24 and R-02-25.	Issue guidance documents as necessary.

DOT is required by statute (Title 49 U.S.C. 1135(e)) to submit a report to Congress and NTSB each year until final regulatory action is taken, or the Secretary, or an Administration within DOT, Determines and reports that no action should be taken. This recommendation is associated with one of the NTSB's issue areas from the 2011 Most Wanted List and is addressed in DOT's 2011 annual report to Congress and the National Transportation Safety Board.

[3] Id.

[4] Id.

Item No.	Issue Date	Rec. No.	Open NTSB Recommendation	NTSB Classification and Actions Taken by FRA	Actions Needed to Be Taken by FRA
11	03/15/04	R-04-07	NTSB recommended that FRA develop and implement Tank Car Design-Specific Fracture Toughness Standards, such as a minimum average Charpy value, for steels and other materials of construction for pressure tank cars used for the transportation of the Department's Class 2 hazardous materials, including those in "low temperature" service. The performance criteria must apply to the material orientation with the minimum impact resistance and take into account the entire range of operating temperatures of the tank car.	Open – Acceptable Response. The research sponsored as part of the Advanced Tank Car Collaborative Research Project (ATCCRP) is ongoing. The ATCCRP expects to publish the results of its two projects reported previously (i.e., (1) evaluating the puncture force and energy of impactors having a variety of shapes and sizes and different impact scenarios, and (2) the correlation of steel properties to puncture resistance) in 2012. FRA has developed a plan to perform full-scale crash tests to validate the results of the ATCCRP's research and expects to initiate execution of its test plan in 2012. Additionally, FRA has committed to fund a research project developed by an AAR Tank Car Committee Task Force intended to quantify the effect of chemical composition, specifically sulfur content, of certain steels on the Charpy values. This research will also analyze the feasibility of using alternative steels for tank car tank material with a focus on Charpy impact results. The research is expected to be completed in late 2012.	Continue research.
12	02/03/05	R-05-02	NTSB recommended that FRA require in Title 49 of the Code of Federal Regulations, Part 225 (Railroad Accidents/Incident: Reports Classification, and Investigations) that derailments caused by rail cracks originating from bond wire attachments be reported with a specific cause code and that information on the methods and locations of those wire attachments be provided in the accident narrative.	Open – Acceptable Response. On September 9, 2008, FRA issued an NPRM to revise 49 CFR Part 225, including revisions to Appendix C of the train accident cause codes in FRA's Guide for Preparing Accident/Incident Reports. 73 Fed. Reg. 52520. The revisions include adding train accident cause code T224—rail defect originating from bond wire attachment. The final rule was published on November 8, 2010. 75 Fed. Reg. 68862.	None.

Item No.	Issue Date	Rec. No.	Open NTSB Recommendation	NTSB Classification and Actions Taken by FRA	Actions Needed to Be Taken by FRA
13	11/23/05	R-05-09	NTSB recommended that FRA develop guidelines for locomotive engineer simulator training programs that go beyond developing basic skills and teach strategies for effectively managing multiple concurrent tasks and atypical situations.	Open – Acceptable Response. FRA is currently conducting joint research with Veolia Transportation in the Cab Technology Integration Laboratory (CTIL) at the Volpe Center to develop training guidelines to address distraction and sustained attention. Results will be shared with the industry.	Develop and issue guidelines.
14	12/12/05	R-05-17	NTSB recommended that FRA determine the most effective methods of providing emergency escape breathing apparatuses for all crewmembers on freight trains carrying hazardous materials that would pose an inhalation hazard in the event of unintentional release and require railroads to provide these breathing apparatus to their crewmembers along with appropriate training.	Open – Acceptable Response. In March 2009, FRA completed a contract study to determine the feasibility of providing appropriate breathing apparatus capable of protecting crewmembers from the chemicals that may pose inhalation hazards. The study reviewed the types of emergency escape breathing apparatus (EEBA) available, how the EEBA should be assigned, what training would be necessary for safe use of the EEBA, and the cost of instituting an EEBA program. The study is available on FRA's Web site at: http://www.fra.dot.gov/downloads/Research/ord0911.pdf. FRA used information contained in the study as well as information gained from consultations with the railroad industry and railroad labor organizations to publish an NPRM on October 5, 2010. See 75 Fed. Reg. 61386. FRA received a number of comments to the NPRM. FRA is currently reviewing the comments and is developing a final rule.	Issue final rule.
15	06/07/06	R-06-07	NTSB recommended that FRA require railroads to implement for all power-assisted switch machines, regardless of location, a formal commissioning procedure and a formal maintenance program that includes records of inspections, tests, maintenance, and repairs.	Open – Acceptable Response. The RSAC Dark Territory Working Group has been formed and has met four times thus far. A draft document addressing proposed "official guidance" regarding the use of safety technologies, including power-assisted switch machines, in non-signaled territory is nearing completion. In addition, FRA intends to issue an NPRM that would require any railroad using certain types of safety technology, including power-assisted switch machines, in non-signaled territory to develop and submit to FRA for approval a plan that contains written procedures for inspection, testing, and maintenance of these devices.	Issue guidance documents and regulations as necessary.

Item No.	Issue Date	Rec. No.	Open NTSB Recommendation	NTSB Classification and Actions Taken by FRA	Actions Needed to Be Taken by FRA
16	10/25/06	R-06-19	NTSB recommended that FRA extend its Track Safety Standards to all classes of track having concrete crossties. The Track Safety Standards should address, at a minimum, the following: limits for rail seat abrasion; concrete crosstie pad wear limits; missing or broken rail fasteners; loss of appropriate toe load pressure; improper fastener configurations; and excessive lateral rail movement.	Open – Acceptable Response. In April 2006, FRA created a task force to study the safety aspects of concrete crossties. The task force's purpose was to determine a recommended course of action for a safety advisory on that subject. Findings from that initial effort were transferred to RSAC's Track Safety Standards Working Group's Concrete Crosstie Task Force, which reported consensus recommendations for a proposed rule that were accepted by RSAC on December 10, 2008. FRA prepared an NPRM on concrete ties, which was published on August 26, 2010. See 75 Fed. Reg. 52490. On April 1, 2011, FRA published the Track Safety Standards; Concrete Crossties Final Rule. See 76 Fed. Reg. 18073. The final rule establishes with respect to track classes 1–5 specific requirements for concrete crossties, rail fastening systems connected to such crossties, automated inspections of track constructed with such crossties, and training track inspectors whose territories include such track on handling exceptions involving rail seat abrasion. FRA subsequently received two Petitions for reconsideration. On June 15, 2011, FRA delayed the effective date of the final rule until October 1, 2011. See 76 Fed. Reg. 34890. On September 9, 2011, FRA published Track Safety Standards; Concrete Crossties Final Rule; Response to Petitions for Reconsideration. See 76 Fed. Reg. 55819. This rulemaking fulfills the mandate in Section 403(d) of the RSIA, which was based on this NTSB recommendation.	None.

Item No.	Issue Date	Rec. No.	Open NTSB Recommendation	NTSB Classification and Actions Taken by FRA	Actions Needed to Be Taken by FRA
17	12/21/06	R-06-26	NTSB recommended that FRA require all rail passenger car seat assemblies be dynamically tested to withstand the accelerations specified in Title 49 of the Code of Federal Regulations, Section 238.233, and require both upward and downward vertical acceleration tests.	Open – Acceptable Response. FRA informed NTSB that the requirements of the Passenger Equipment Safety Standards at 49 CFR § 238.233 are consistent with this recommendation in that they expressly provide for (but do not require) the dynamic, sled testing of seat assemblies. See § 238.233(g). As NTSB encouraged, FRA worked with the American Public Transportation Association (APTA) in revising APTA's standard for the design, manufacture, and testing of passenger seating to address this recommendation. APTA revised its standard, requiring dynamic testing of seats under a vertical upward load, and a lateral load. See APTA SS-C&S-016-99, Rev. 2, Standard for Passenger Seats in Passenger Rail Cars. APTA's standard does not require a dynamic test in the downward vertical direction, however, as no incident could be identified in which vertical downward loads have caused seat components to detach.	Issue regulations as necessary.
18	04/25/07	R-07-01	NTSB recommended that FRA require railroads ensure that the lead locomotives used to operate trains on tracks not equipped with a positive train control system are equipped with an alerter.	Open – Acceptable Response. An NPRM proposing to require the installation of alerters on new locomotives used as controlling locomotives and operated above 25 mph effective 90 days after publication of the final rule and on all controlling locomotives operated above 25 mph effective January 1, 2016, was issued in December 2010. See 76 Fed. Reg. 2200. Public comments have been received on the NPRM and are currently under consideration by FRA.	Issue regulations as necessary.
19	04/10/08	R-08-05	NTSB recommended that FRA advise railroads of the need to examine their train dispatching systems and procedures to ensure that appropriate safety redundancies are in place for establishing protection and preventing undesired removal of protection for roadway workers receiving track occupancy authority.	Open – Acceptable Response. FRA has included a reference to this objective in its PTC final rule issued on December 30, 2009. See 49 CFR § 236.1015(d)(13) at 75 Fed. Reg. 2598, 2709 (Jan. 15, 2010). FRA believes that properly configured PTC systems will effectively address this need. However, at this time, there are no plans for universal PTC deployment on the general rail system. FRA brought concerns about roadway worker safety to RSAC's attention in September 2008 and will continue to raise them in industry meetings. FRA established a working group (Fatality Analysis Maintenance-of-Way Employees and Signalmen (FAMES)) to study fatalities involving maintenance-of-way (MOW) roadway workers. The working group is currently in the process of drafting recommendations involving train dispatching systems and procedures to ensure that the appropriate safety redundancies are in place for establishing protection and preventing undesired removal of protection for roadway receiving track occupancy authority.	Collect and analyze data. Advise railroads of needed procedures/ safety redundancies. Review PTC Development and Safety Plans to ensure roadway worker protection.

Item No.	Issue Date	Rec. No.	Open NTSB Recommendation	NTSB Classification and Actions Taken by FRA	Actions Needed to Be Taken by FRA
20	04/10/08	R-08-06	NTSB recommended that FRA require redundant signal protection, such as shunting, for MOW work crews who depend on the train dispatcher to provide signal protection.	Open – Acceptable Response. FRA is preparing an NPRM to amend the roadway worker protection requirements in 49 CFR Part 214. As part of the rulemaking process, FRA plans to request extensive comments from the railroad industry on cost effective options that would allow redundant forms of protection for MOW work crews. FRA intends to use those comments to assist in analyzing the feasibility of available options, in order to both satisfy the intent of this recommendation and also to consider future rulemaking based on the outcome of that analysis.	Issue regulations, as necessary.
21	04/10/08	R-08-07	NTSB recommended that FRA revise the definition of "covered employee" under Title 49 of the Code of Federal Regulations, Part 219, for purposes of Congressionally mandated alcohol and controlled substances testing programs to encompass all employees and agents performing safety-sensitive functions as described in Title 49 of the Code of Federal Regulations, Sections 209.301 and 209.303.	Open – Acceptable Response. The NPRM discussed in FRA's response to R-00-01 would also expand Part 219's coverage to include both employees and contractors who perform maintenance of way activities for railroads.	Issue regulations as necessary.

Item No.	Issue Date	Rec. No.	Open NTSB Recommendation	NTSB Classification and Actions Taken by FRA	Actions Needed to Be Taken by FRA
22	05/22/08	R-08-09	NTSB recommended that FRA review all railroads' internal rail defect detection procedures and require changes to those procedures as necessary to eliminate exceptions to the requirement for an uninterrupted, continuous search for rail defects.	Open – Acceptable Response. FRA has established the Rail and Infrastructure Integrity Division to review all railroads' internal rail defect detection procedures and recommend changes, as needed, to ensure that an uninterrupted, continuous search for rail flaws is conducted by the railroad. In addition, FRA has implemented a rail flaw detection vehicle inspection process as part of its National Safety Program Plan. Moreover, the Rail Integrity Task Force, under the RSAC Track Safety Standards Working Group, has been charged with examining internal rail flaw inspection procedures and systems within the regulated community, identifying any deficiencies in the procedures or systems, and making necessary recommendations to address them. The task force believes that new technologies have been developed for improving rail flaw detection associated with rail surface conditions. The task force has reached consensus on a number of changes to FRA's rail inspection requirements, including recommending a new provision defining minimum requirements for the training of a rail flaw detector car operator. FRA is currently preparing an NPRM for issuance by spring 2012 based on the consensus recommendations.	Issue regulations as necessary.
23	05/22/08	R-08-10	NTSB recommended that FRA require railroads to develop rail inspection and maintenance programs based on damage-tolerance principles, and approve those programs, and include in the requirement that railroads demonstrate how their programs will identify and remove internal defects before they reach critical size and result in catastrophic rail failures. NTSB also recommended that each program take into account, at a minimum, accumulated tonnage, track support, residual stresses in the rail, rail defect growth rates, and temperature differentials.	Open – Acceptable Response. RSAC's Rail Integrity Task Force was formed in 2007 to help provide a common understanding of the requirements for internal rail flaw inspections within the regulated community. Through this task force, FRA is gaining a more thorough understanding of rail inspection and maintenance programs. The task force has reached consensus on a Volpe Center-recommended model for performance-based testing intervals using failure and defect rates, annual tonnage, performance targets, and crack growth. The task force is also examining issues concerning submission of internal flaw detection programs for FRA approval, annual updates to the program, and access to defect and failure data. FRA is currently preparing an NPRM for issuance by spring 2012. Knowledge gained from FRA's continued involvement in these areas will be used to determine any future recommendations for improvement based on damage-tolerance principles. FRA also continues to fund research to enhance rail flaw detection technology.	Issue regulations as necessary.

Item No.	Issue Date	Rec. No.	Open NTSB Recommendation	NTSB Classification and Actions Taken by FRA	Actions Needed to Be Taken by FRA
24	05/22/08	R-08-11	NTSB recommended that FRA require railroads use methods that accurately measure rail head wear to ensure that deformation of the head does not affect the accuracy of the measurements.	Open – Acceptable Response. Through the RSAC process, FRA is identifying and addressing operational limitations of rail flaw test systems that are attributable to the presence of rail head surface and wear conditions. Through the RSAC Rail Integrity Task Force, FRA initiated a study to determine the magnitude and conditions that can result in a "loss of bottom" signal during the test process. The study was completed in 2008 and the task force determined that it is common to find rail defects when there is a "loss of bottom" present. Nevertheless, the study also found that "loss of bottom" incidence is minimal in comparison to total mileage tested, and, because of the limited magnitude of the problem, the task force did not recommend further action. Although sufficient studies are not available that would provide FRA with sufficient criteria to designate a critical rail head wear maximum for all rail sections used by railroads, the Rail Integrity Task Force has recommended requiring the rail flaw detector car operator to categorize the size of transverse-oriented defects to reflect the amount of rail head loss present in a rail specimen. Rail head wear is a crucial factor in the development of rail defects and rail service failure, and the task force has also reached consensus that it be used in determining performance-based testing intervals. FRA is continually involved with the current rail flaw detection technology used by the railroads through its Rail Integrity Group, and is also funding additional research to pursue new development in the laser-based ultrasonic and guided waves technologies. Until rail flaw detection technology is developed that will consistently circumvent the influence of rail head surface and wear conditions, FRA believes it is possible that we could continue to see adverse effects on the accuracy of test measurements, and positive identification of all defects below a critical threshold will have detection limitations.	RSAC has reached consensus that this NTSB recommendation be closed.
25	04/02/09	R-09-01	NTSB recommended that FRA establish uniform signal aspects that railroads must use to authorize a train to enter an occupied block, and prohibit the use of these aspects for any other signal indication.	Open – Acceptable Response. FRA is addressing this issue on a case-by-case basis wherever it may be found that a railroad is using more than one name and indication for a single aspect on a single line segment where crews would be subject to potential misunderstanding of the action to be taken. Where PTC is to be implemented, this condition will be relieved by the PTC onboard display indicating the correct action to be taken at each successive wayside signal location.	Continue outreach efforts.

Item No.	Issue Date	Rec. No.	Open NTSB Recommendation	NTSB Classification and Actions Taken by FRA	Actions Needed to Be Taken by FRA
26	04/02/09	R-09-02	NTSB recommended that FRA study the different signal systems for trains, identify ways to communicate more uniformly the meaning of signal aspects across all railroad territories, and require the railroads to implement as many uniform signal meanings as possible.	Open – Acceptable Response. See FRA's response to R-09-01.	Continue outreach efforts.
27	04/02/09	R-09-03	NTSB recommended that FRA require that emergency exits on new and remanufactured locomotive cabs provide for rapid egress by cab occupants and rapid entry by emergency responders.	Open – Acceptable Response. FRA shares the NTSB's concern that means of rapid egress and rescue access be provided for locomotive cabs. FRA regulations require that locomotives manufactured on or after January 1, 2009, provide for emergency egress. See 49 CFR § 229.206. FRA has also funded research into locomotive egress and crew rescue. Moreover, FRA has developed and disseminated a training video titled, "Locomotive Emergency Response Operations," to local emergency responders throughout the country and is exploring additional educational opportunities. FRA will present this recommendation and its actions to RSAC's Locomotive Standards Working Group for further consideration.	Continue educational efforts. Consult with RSAC.

Item No.	Issue Date	Rec. No.	Open NTSB Recommendation	NTSB Classification and Actions Taken by FRA	Actions Needed to Be Taken by FRA
28	09/22/09	R-09-21	Require all railroads that use audio frequency track circuits in their train control systems to examine track circuits that may be susceptible to parasitic oscillation and spurious signals capable of exploiting unintended signal paths and eliminate those adverse conditions that could affect the safe performance of their train control systems. This work should be conducted in coordination with their signal and train control equipment manufacturers.	Open – Acceptable Response. FRA has surveyed all FRA-regulated railroads to determine their possible use of audio frequency track circuits for train detection. FRA field personnel contacted appropriate representatives of every railroad to determine their awareness of this recommendation and the circumstances involved in the Washington Metropolitan Area Transit Authority (WMATA) accident that precipitated it. Various railroads reported using a form of audio frequency track circuits; however, all but one instance involved uses of a totally different nature that did not implicate the same safety concerns. In one instance, the Southeastern Pennsylvania Transportation Authority (SEPTA) was found to use the same type of circuitry, but only on a branch line. Further, SEPTA was fully aware of the NTSB's findings and recommendations related to the WMATA accident and had already tested each such circuit. In addition, SEPTA had already revised its associated circuitry testing procedures so as to identify any similar condition, and had enhanced its monitoring of the circuitry by increasing the periodic testing interval from yearly to monthly. FRA believes that the purpose of the recommendation has been fulfilled.	None.
29	09/22/09	R-09-22	Require all railroads that use audio frequency track circuits in their train control systems to develop a program to periodically determine that electronic components in their train control systems are performing within design tolerances.	Open – Acceptable Response. See FRA's response to R-09-21.	None.

Item No.	Issue Date	Rec. No.	Open NTSB Recommendation	NTSB Classification and Actions Taken by FRA	Actions Needed to Be Taken by FRA
30	2/23/2010	R-10-01	NTSB recommended that FRA require the installation, in all controlling locomotive cabs and cab car operating compartments, of crash- and fire-protected inward- and outward-facing audio and image recorders capable of providing recordings to verify that train crew actions are in accordance with rules and procedures that are essential to safety as well as train operating conditions. The devices should have a minimum 12-hour continuous recording capability with recordings that are easily accessible for review, with appropriate limitations on public release, for the investigation of accidents or for use by management in carrying out efficiency testing and systemwide performance monitoring programs.[5]	Open – Acceptable Response. FRA recognizes the value of voice and image recording for accident investigation purposes, and believes that the information gathered could also play a constructive role in a concerted risk reduction effort having the support of employee representatives and progressive carrier management. However, FRA is aware of the significant privacy concerns implicated by this recommendation, and believes that the use of voice and image recording for railroad disciplinary purposes would erode morale and offer manifold opportunities for selective enforcement and possible retaliation against employees for reasons not related to safety. FRA is exploring options that will seek to affirm NTSB's interest in accident investigation and prevention, while avoiding unwarranted publication of private conversations and guarding against further erosion of working relationships among employees and their supervisors and managers. For example, FRA has formed a RSAC working group to develop strategies and programs that prevent unauthorized use of electronic devices (cell phones, pagers, etc.) during safety-critical rail operations. This committee includes representatives from the Federal Government (FRA), industry (AAR, ASLRRA, APTA), and labor (BLET, UTU, BRS). Additionally, FRA is in the process of developing a Risk Reduction Program regulation for freight railroads, and a System Safety Management regulation for use by passenger railroads with the assistance of the RSAC. The regulations would require certain railroad carriers to establish programs that systematically evaluate railroad safety risks on their systems and manage those risks in order to reduce the numbers and rates of railroad accidents, incidents, injuries, and fatalities. Using this information, carriers will conduct assessments of safety performance against safety objectives. Further, FRA is actively pursuing understanding of critical safety errors through the Confidential Close Call Reporting System pilot projects currently underway on four railroads.	Identify and pursue appropriate options to promote accident investigation and prevention through the use of audio and image recording devices.

[5] Id.

Item No.	Issue Date	Rec. No.	Open NTSB Recommendation	NTSB Classification and Actions Taken by FRA	Actions Needed to Be Taken by FRA
31	2/23/2010	R-10-02	NTSB recommended that FRA require that railroads regularly review and use in-cab audio and image recordings (with appropriate limitations on public release), in conjunction with other performance data, to verify that train crew actions are in accordance with rules and procedures that are essential to safety.[6]	Open – Acceptable Response. See FRA's response to R-10-01.	Identify and pursue appropriate options to promote accident investigation and prevention through the use of audio and image recording devices.
32	12/12/05	R-05-14	NTSB recommended that FRA require that, along main lines in non-signaled territory, railroads install an automatically activated device, independent of the switch banner that will, visually or electronically, compellingly capture the attention of employees involved with switch operations and clearly convey the status of the switch both in daylight and in darkness.	Open – Acceptable Alternate Response. See FRA's response to R-06-07. FRA and the RSAC Dark Territory Working Group have determined that it would be inappropriate to issue Federal regulations requiring the implementation of safety technologies in non-signaled territory at this time. However, this recommendation will be partially addressed in implementing the mandate for railroads to install PTC, as many thousands of miles of track segments currently non-signaled will require switch position monitoring by which to provide input to the PTC systems that will be installed. The areas required to install PTC include routes where either passenger or intercity commuter service is provided, or routes on Class I railroads having in excess of 5 million gross tons of traffic annually and over which any poisonous-inhalation-hazard materials are transported.	Issue regulations as necessary.

[6] Id.

Item No.	Issue Date	Rec. No.	Open NTSB Recommendation	NTSB Classification and Actions Taken by FRA	Actions Needed to Be Taken by FRA
33	08/28/97	R-97-15	NTSB recommended that FRA require all passenger cars have either removable windows, kick panels, or other suitable means for emergency exiting through the interior and exterior passageway doors where the door could impede passengers exiting in an emergency and that FRA take appropriate emergency measures to ensure corrective action until these measures are incorporated into minimum Passenger Car Safety Standards.	Open – Unacceptable Response. On May 12, 1999, FRA published the Passenger Equipment Safety Standards for rail passenger service. 64 Fed. Reg. 25660. These regulations addressed kick-out panels in doors for trains traveling 126 to 150 mph (Tier II passenger equipment), but did not address kick-out panels in doors for trains traveling at or below 125 mph (Tier I passenger equipment). These regulations did address egress through doors and windows for Tier I passenger equipment, and on February 1, 2008, FRA published a final rule amending the Passenger Equipment Safety Standards to further enhance egress requirements. 73 Fed. Reg. 6412. FRA researched the viability of integrating removable panels/windows into end-frame doors in cab cars and multiple-unit locomotives, focusing on developing requirements and design concepts. It was found that if removable panels/windows were to be placed in such doors, the panels/windows would have to withstand substantial loading forces to maintain the integrity of the end-frame structure and meet existing FRA regulations. FRA's RSAC Emergency Preparedness Task Force reviewed this recommendation, together with the results of FRA's research, and, through the Passenger Safety Working Group, reported its own recommendations for removable panels in certain interior doors to the full RSAC on February 20, 2008, which in turn accepted the task force's recommendations. The RSAC recommendations apply to new passenger cars and an NPRM will be published on January 3, 2012. The Task Force considered but did not recommend retrofit requirements for existing equipment, due primarily to limitations posed by the design of existing doors, which have a horizontal structural member that provides rigidity and is located approximately at the vertical center of the door significantly limiting both the size and location of a removable panel or window. Although there are existing windows in the upper half of the doors, these are not sufficiently large for many adults to pass through and would be difficult to access in many situations due to such location. In addition, because the removable windows and panels contemplated by industry for use in compliance with such a requirement would be designed in much the same fashion as emergency window exits with gaskets that could be removed with a handle, the door pockets would require modification to fit the protrusions in the door created by the handle. The NTSB has classified this recommendation as "Open – Unacceptable Response" pending FRA efforts to implement this recommendation in all passenger cars, both new and existing.	Issue regulations as necessary.

Item No.	Issue Date	Rec. No.	Open NTSB Recommendation	NTSB Classification and Actions Taken by FRA	Actions Needed to Be Taken by FRA
34	08/28/97	R-97-17	NTSB recommended that FRA require all passenger cars contain reliable emergency lighting fixtures that are each fitted with a self-contained independent power source and that FRA incorporate the requirements into minimum Passenger Car Safety Standards.	Open – Unacceptable Response. On May 12, 1999, FRA published the Passenger Equipment Safety Standards, which required emergency lighting for passenger cars ordered on or after September 8, 2000, or those placed into service for the first time on or after September 9, 2002. Subsequently, FRA worked with APTA to develop industry standards to improve emergency lighting systems in all passenger cars, including the survivability of the systems. See APTA SS-E-013-99, Rev. 1, Standard for Emergency Lighting System Design for Passenger Cars. On February 20, 2008, RSAC's Passenger Safety Working Group recommended proposed rule language to the full RSAC body that would incorporate this new APTA standard by reference. The full RSAC accepted the working group's recommendations, and FRA will publish an NPRM on January 3, 2012. The Task Force evaluated the feasibility of equipping fixtures with self-contained power sources that were independent of the main car battery and concluded that maintenance would be very costly due to the high number of power sources. The Task Force examined other methods for addressing the issue of emergency lighting system reliability and assisted APTA in revising APTA SS-E-013-99, Standard for Emergency Lighting System Design for Passenger Cars, to better address those situations in which an emergency lighting system may be most beneficial. APTA added four requirements that address NTSB's recommendation to FRA regarding emergency lighting survivability for new passenger cars. The NTSB has classified this recommendation as "Open – Unacceptable Response," pending efforts not only to implement emergency lighting in existing passenger cars but also to provide that those systems operate on a power source independent of the main car battery.	Issue regulations as necessary.

Item No.	Issue Date	Rec. No.	Open NTSB Recommendation	NTSB Classification and Actions Taken by FRA	Actions Needed to Be Taken by FRA
35	09/16/98	R-98-56	NTSB recommended that FRA include in the Passenger Car Safety Standards a requirement for positive seat securement systems to prevent the disengagement and undesired rotation of seats in all new passenger cars purchased after January 1, 2000, and require the incorporation of such a system into existing passenger cars when they are scheduled for overhaul.	Open – Unacceptable Response. This recommendation arose from investigation of Amtrak accidents in which seats were found to have rotated, raising concern that undesired seat rotation may pose a risk of passenger injury. Subsequently, Amtrak improved its seat-locking mechanism. FRA's Passenger Equipment Safety Standards also addressed seat securement in passenger cars but did not address seat rotation per se. Nonetheless, undesired seat rotation has been identified in Amtrak accidents as recently as 2004. FRA's Office of Railroad Policy and Development has examined alternative seat-locking designs and conducted dynamic testing of prototype seat-locking systems in cooperation with Amtrak. FRA also notes that APTA's Standard for Passenger Seats in Passenger Rail Cars addresses seat rotation. See APTA SS-C&S-016-99, Rev. 2, Section 5.3.1. Yet, FRA and NTSB accident investigations have not established a nexus between undesired seat rotation and passenger injuries. Further, any system to inhibit passenger disengagement of the seat-locking mechanism—whether by inadvertent or intentional passenger action —should not place employees at risk of injury when rotating the seats in their desired orientation. The NTSB has classified this recommendation as "Open – Unacceptable Response." NTSB believes that FRA should further act to ensure that seats are secure from undesired rotation, either by issuance of a regulation for positive seat securement or development an acceptable alternative to ensure that seats cannot disengage from their locking mechanisms.	Discuss further with industry.

Item No.	Issue Date	Rec. No.	Open NTSB Recommendation	NTSB Classification and Actions Taken by FRA	Actions Needed to Be Taken by FRA
36	03/21/02	R-02-05	NTSB recommended that FRA require railroads to conduct ultrasonic or other appropriate inspections to ensure that rail used to replace defective segments of existing rail is free from internal defects.	Open – Unacceptable Response. On March 8, 2006, FRA issued Safety Advisory 2006-02 in response to this recommendation. See 71 Fed. Reg. 11700. The purpose of this advisory was to reduce the number of rail defects that occur when second-hand rail is used and to recommend practices for testing, classifying, and reusing second-hand rail. However, NTSB responded that FRA's advisory be revised to recommend that all railroads conduct ultrasonic or other appropriate inspections to ensure that all rail used as replacement rail is tested and determined to be free from internal defects. Subsequently, FRA has worked intensively on this issue through the Rail Integrity Task Force of RSAC's Track Safety Standards Working Group, which is helping to revise the requirements for rail integrity, including replacement rail. The Rail Integrity Task Force reached consensus on an addition to 49 CFR § 213.237 addressing inspection requirements for rail used to replace defective segments. FRA is currently preparing an NPRM for issuance by spring 2012. FRA has also established the Rail and Infrastructure Integrity Division to review all railroads' internal rail defect detection procedures and recommend changes, as needed, to ensure that an uninterrupted, continuous search for rail flaws is conducted by the railroad. The NTSB has advised that it will consider reclassifying the status of this recommendation pending development of proposed regulatory language to address this issue.	Issue regulations as necessary.

Item No.	Issue Date	Rec. No.	Open NTSB Recommendation	NTSB Classification and Actions Taken by FRA	Actions Needed to Be Taken by FRA
37	08/15/03	R-03-12	NTSB recommended that FRA, in cooperation with the Transportation Security Administration (TSA), develop and implement an accurate passenger and crew accountability system for all long-distance, overnight, and reserved passenger trains that will immediately provide an accurate count and identity of the people on board the train in case of emergency at any time during the trip.	Open – Unacceptable Response. FRA entered into an agreement with TSA and Amtrak to fund a study through the Volpe Center to examine what available technologies exist to develop an accurate passenger train manifest. In December 2005, FRA published a report that concluded that an improved passenger manifest was possible, but the costs would be very substantial and benefits would be questionable. FRA has informed NTSB staff that FRA concurs with the findings of the report. Although Amtrak's passenger manifest information is generally reliable, the presence of numerous station stops, many of which are at locations where no Amtrak personnel are employed, and the difficulty of monitoring individual passengers with a limited onboard staff, make full accomplishment of the Board's laudable objective presently unachievable. Further, given the potential presence of members of the general public in the vicinity of any accident scene, prudent emergency response will continue to include rapid and thorough surveys of the entire scene to verify that all affected persons have been identified and evaluated for medical attention. NTSB has advised FRA that it continues to believe in the feasibility of this recommendation and has classified the recommendation as "Open – Unacceptable Response."	Continue dialogue with NTSB

Item No.	Issue Date	Rec. No.	Open NTSB Recommendation	NTSB Classification and Actions Taken by FRA	Actions Needed to Be Taken by FRA
38	03/15/04	R-04-01	NTSB recommended that FRA require all railroads with continuous welded rail (CWR) track include procedures (in the programs that are filed with FRA) that prescribe on-the-ground visual inspections and non-destructive testing techniques for identifying cracks in rail joint bars before they grow to critical size.	Open – Unacceptable Response. On October 11, 2006, FRA published a regulation that required railroads to establish a program for the periodic visual inspection of joint bars in CWR track by January 1, 2007. See 71 Fed. Reg. 59677. However, the regulation did not require non-destructive testing of joint bars on a periodic basis. FRA stated that there was insufficient engineering data to establish the effectiveness of non-destructive testing techniques as applied to joint bars in the service environment. FRA and the AAR (through the Transportation Technology Center) are working on non-destructive testing techniques that may be useful in the future. Meanwhile, FRA has successfully demonstrated optical recognition technology designed to identify very small joint bar cracks on a production basis, and that technology is now being commercialized. In addition, new technology was recently developed by a non-destructive test company in the United States that has the capability to perform a dynamic ultrasonic inspection of the upper portion of the joint bar structure. However, the effectiveness and accuracy of this technology is limited due to only the top portion of the joint bar being tested. No further technological advancements have been identified that will consistently identify cracks associated with joint bars. On August 25, 2009, FRA published a final rule to enhance requirements for CWR generally. See 74 Fed. Reg. 43002. Nevertheless, NTSB has advised FRA that, to fully meet the intent of the recommendation, the required inspection procedures need to include nondestructive testing techniques for identifying cracks in rail joint bars.	Develop and issue a specific regulation if determined necessary, when suitable technology becomes available.

Item No.	Issue Date	Rec. No.	Open NTSB Recommendation	NTSB Classification and Actions Taken by FRA	Actions Needed to Be Taken by FRA
39	11/23/05	R-05-10	NTSB recommended that FRA require train crews call out all signal indications over the radio, including clear signals, at all locations that are not equipped with automatic cab signals with enforcement of a positive train control system.	Open – Unacceptable Response. FRA's RSAC reviewed this recommendation, but there was significant opposition on the grounds of impracticality, radio congestion, and other factors. FRA notes that the mandate for PTC contained in the RSIA should lead to this becoming a moot issue in PTC territories. FRA recognizes that the purpose of this recommendation is to ensure that personnel responsible for safe train movements are actively engaged in responding appropriately to all signals governing their movements. FRA will explore further an alternative approach in connection with resolution of this recommendation and the recommendation concerning audio and image recording (Rec. No. R-10-01, which superseded Rec. No. 07-03), if possible, refining options previously presented to and discussed in two RSAC working groups.	Determine whether an alternative solution can be implemented.
40	06/29/06	R-06-10	NTSB recommended that FRA prohibit the use of after-arrival track warrants for train movements in dark (non-signaled) territory not equipped with a positive train control system.	Open – Unacceptable Response. FRA's RSAC Operating Rules Working Group met with NTSB staff while studying after-arrival track warrants. FRA prepared a draft rule that would strictly limit use of after-arrival track warrants and discussed it extensively with the working group. The working group was not able to reach a resolution. Nevertheless, FRA's final rule on PTC provides that PTC systems will enforce contingencies in mandatory directives issued in non-signaled territory, eliminating the hazard in PTC territory. See 75 Fed. Reg. 2598, 2701.	Issue regulations as determined necessary.

Item No.	Issue Date	Rec. No.	Open NTSB Recommendation	NTSB Classification and Actions Taken by FRA	Actions Needed to Be Taken by FRA
41	04/25/07	R-07-02	NTSB recommended that FRA assist PHMSA in developing regulations to require that railroads immediately provide to emergency responders accurate, real-time information regarding the identity and location of all hazardous materials on a train.	Open – Unacceptable Response. DOT regulations require that information on the identity and location of hazardous materials shipments on a train be maintained for the benefit of emergency responders. However, with FRA's encouragement, AAR issued a circular offering to provide hazardous materials information on the top 25 commodities to local emergency response organizations to assist in training and preparing for emergencies. The most current version of the circular (Circular No. OT-55) is available on the AAR/Bureau of Explosives Web site at http://boe.aar.com/. In addition, with FRA's encouragement, CSX Transportation, Inc., and Chemtrec established a real-time information process that provides car content and train consist information on a "one-call" basis. PHMSA is also actively researching the feasibility of implementing an electronic system of hazardous materials communications, including determining the feasibility of communicating hazardous materials information electronically to emergency responders. FRA and PHMSA continue to evaluate the information obtained through these efforts to determine if additional regulations are necessary.	Issue regulations, as necessary.

Item No.	Issue Date	Rec. No.	Open NTSB Recommendation	NTSB Classification and Actions Taken by FRA	Actions Needed to Be Taken by FRA
42	05/022/08	R-08-12	NTSB recommended that FRA assist PHMSA in its evaluation of the risks posed to train crews by unit trains transporting hazardous materials, determination of the optimum separation requirements between occupied locomotives and hazardous materials cars, and any resulting revision to Title 49 of the Code of Federal Regulations, Section 174.85.	Open – Unacceptable Response. In 2005, FRA issued a report to Congress titled, "Safe Placement of Train Cars," in which FRA did not find it necessary to disturb the established and very effective in-train placement and separation requirements for cars containing hazardous material. (The report is available on FRA's Web site at http://www.fra.dot.gov/downloads/safety/safe_placement_report_june1605.pdf.) FRA responded to the NTSB's recommendation by citing this report, as well as the facts of the underlying accident giving rise to the recommendation, the safe history of unit train hazardous materials transportation, and PHMSA and FRA rulemaking activities involving tank cars transporting hazardous materials, with the request that this recommendation be classified as "Closed – Acceptable Action." NTSB subsequently classified this recommendation as "Open – Unacceptable Response," citing specific concerns with unit trains transporting hazardous materials. FRA is working with PHMSA to conduct further research to study the effectiveness of using buffer cars to separate the crew from hazardous materials cars in unit trains transporting hazardous materials. FRA is also participating in an AAR Tank Car Committee Working Group looking at potential operational changes designed to improve the safety of unit trains transporting hazardous materials. Pending the outcome of these efforts, FRA will work with PHMSA to determine whether a rulemaking is needed to clarify and/or revise the current DOT requirements related to the use of buffer cars.	Conduct research. If necessary clarify and/or revise the requirements on buffer car use.

EXHIBIT C. OPEN RAIL SAFETY RECOMMENDATIONS BY THE OFFICE OF INSPECTOR GENERAL (OIG)

(AS OF DECEMBER 30, 2011)

Item No.	Issue Date	Report Title and No.	Open OIG Recommendation	Actions Taken by FRA	Actions Needed to Be Taken by FRA
1	02/24/09	Enhancing the Federal Railroad Administration's Oversight of Track Safety Inspections CR-2009-038	FRA should revise its track safety regulations for internal rail flaw testing to require the railroads to report all track locations (milepost numbers and track miles) covered during internal rail flaw testing.	The Rail Integrity Task Force of RSAC's Track Safety Standards Working Group has been charged with examining internal rail flaw inspection procedures and systems within the regulated community, identifying any deficiencies in the procedures or systems, and making necessary recommendations to address them. FRA has also established the Rail Integrity Group as part of its Track Division to review all railroads' internal rail defect detection procedures and recommend changes, as needed, to ensure that an uninterrupted, continuous search for rail flaws is conducted by the railroad. FRA agrees that its track safety regulations should be revised to require railroads to report all track locations covered during internal rail flaw testing. Within the task force, consensus has been reached on a revision to 49 CFR § 213.241 (Inspection records) on enhancing FRA access to documentation that confirms a continuous test was performed on all tracks where required. Task force recommendations were accepted by the full RSAC membership in September 2010, and FRA is currently preparing an NPRM for issuance by spring 2012.	Issue regulations as necessary.