

# National Inspection Plan

## Background

In December 2004, the Office of the Inspector General (OIG) recommended that the Federal Railroad Administration (FRA) submit to the Secretary of the Department of Transportation (DOT) a comprehensive plan for implementing a program that, among others, makes meaningful use of available data to focus inspection activities. In 2005, FRA issued the National Rail Safety Action Plan, which contains the development and implementation of a new National Inspection Plan (NIP). Under this approach, FRA inspectors focus their efforts on locations that, according to data-driven models, are likely to have safety problems. Like other modal safety administrations within DOT, FRA has few resources for overseeing railroads compared with the scope of its responsibility. The new planning process allows FRA to use its inspectors more effectively and better target the greatest safety risks.

## Overview of the NIP

The purpose of the National Inspection Plan is to optimize FRA's ability to reduce the rates of various types of train accidents, releases of hazardous materials, and casualties from human factor errors. The plan provides guidance to each regional office on how its inspectors, who each specializes in one of the five inspection disciplines, should divide their work by railroad and State. The five FRA disciplines are Track, Operating Practices (OP), Motive Power and Equipment (MP&E), Signal and Train Control (S&TC), and Hazardous Materials (Hazmat).

The NIP is a process that involves three steps (Figure 1). In the first step, FRA headquarters produces an initial baseline plan for each of the agency's eight regions. This plan specifies, by inspection discipline, numeric goals for the level of inspection activity to allocate to each railroad, by State. These numeric goals are derived from models—based on trend analyses of accident, inspection, and other data—that predict, by inspection discipline, locations where train accidents and incidents are likely to occur within each region and provide the optimal allocation of inspection resources to prevent accidents.

In the second step, the regional administrators (RA's) may adjust the goals for their respective regions based on local knowledge and emerging issues. In practice, the regional administrators typically designate their deputy regional administrators (DRA's) in evaluating and adjusting, as necessary, the NIP goals, often with assistance from specialists. The eight FRA regions are shown in Appendix A.

The initial adjustments typically take place in September before the new fiscal year starts. The RA's have another opportunity to make adjustments after six months into the fiscal year. The intent of the mid-year adjustments, if deemed necessary, is to allow regions to respond properly to new and/or unexpected events such as major accidents that would require shifting inspection resources on a short-term basis.

In step 3, once a new fiscal year starts, FRA monitors how the regions are meeting their inspection goals. The NIP is implemented through a web-based interface that allows both the headquarters and the regions to monitor the progress in field inspections during a fiscal year. Due to recent unanticipated developments in the rail industry, the regions are allowed to provide brief explanations on why they are not following their plans.

Within a month after a fiscal year ends, the regions are required to submit explanations for missed NIP goals. A goal is considered being met for each railroad/discipline if the actual inspection activities at the end of a fiscal year are within 2.5 percent of the NIP plan target. Each region will be evaluated based on how well it met the NIP goals as part of the regions' annual performance review.

Figure 1 - NIP Process



