

Innovative Technology Deployment Program Course Transcript

1 Welcome

1.1 Welcome

Welcome, this presentation provides an introduction to the Federal Motor Carrier Safety Administration's Innovative Technology Deployment Program, called ITD.

This course is designed for State agencies that have a role in monitoring motor carrier compliance with Federal safety regulations, and the vendors that assist States in deploying technologies.

1.2 Navigating this Course

This is an interactive course. Turn on your speakers. Follow the prompts that tell you where to click on screen. Use the Previous and Next buttons at the bottom of your screen to navigate. You can also use the course menu on the left to jump to a particular section. It will take you about 25 minutes to complete this course. Finally, in the top right corner, click on 'Resources' or 'Acronyms' to access the websites referenced in this course and the course transcript, or to view a list of acronyms used in the course.

1.3 Learn about ITD

In this course, you will learn: the purpose and benefits of the ITD Program, and how States advance through the program by first achieving Core compliance and then expanding their technology deployment efforts. You'll be introduced to the process of planning for, and then deploying, technologies.

Finally, we'll introduce you to the roles and responsibilities both within States and at FMCSA.

2 ITD Program Purpose & Benefits

2.1 Purpose

The ITD Program improves safety by empowering States to implement technologies that help them collect and share data on motor carriers more effectively and efficiently. By sharing data, State and Federal safety officials have access to a nationwide repository to help them make informed decisions about which carriers pose the greatest risk to safety, and therefore, should be prioritized for an intervention, such as a roadside inspection.

2.2 Program Goals

- Improve the safety and productivity of motor carriers, commercial vehicles, and their drivers.
- Increase efficiency and effectiveness of commercial vehicle safety programs.
- Enhance security and sharing of commercial vehicle data within States and between States and FMCSA.
- Simplify enforcement operations by automating data collection, transfer, and display.
- Reduce Federal, State, and industry regulatory and administrative costs.
- Achieve nationwide deployment of the ITD Program.

2.3 How States Participate in ITD

ITD is a progressive program that serves each State's technology needs as they change over time.

To apply for Federal High Priority-ITD grant funding, States begin by developing a program plan that identifies their technology goals and needs.

Next, States must work toward achieving ITD Core compliance. This involves deploying foundational systems to uniformly share motor carrier safety and permitting data with FMCSA and other States.

Once a State achieves Core compliance, it can expand its capabilities and request funding for other technology initiatives in alignment with the State's goals. We refer to this as "Expanded ITD."

Nearly all 50 States have achieved Core compliance. They continue to use funding to maintain their systems and deploy additional technologies.

2.4 What ITD Offers States

Innovative highway technology is a valuable tool to improve road safety, but researching available technologies can be confusing and time-consuming. It can also be challenging and costly to integrate new technology with State and Federal IT systems. Fortunately, the ITD Program can help.

States can apply for grant funding from FMCSA to cover the cost of purchasing, installing, and maintaining technologies and systems.

The ITD Team offers expertise to help States implement technologies that meet Federal security and data transfer requirements.

And, by hosting regular meetings and workshops, the ITD Program facilitates sharing of ideas and best practices among States to accelerate the adoption of effective technologies that further FMCSA's safety mission.

3 Core Compliance

3.1 ITD Core Capabilities

There are three things States must do to achieve ITD Core compliance. We refer to these as the ITD Core capabilities.

3.1.1 Safety Information Exchange

States collect data on motor carrier safety performance and credentials, and exchange this data within their State, with other States, and with Federal agencies. By using systems and following uniform protocols that enable efficient data sharing across the Nation, States and FMCSA can access a motor carrier's complete record at any time to determine if the carrier is complying with Federal regulations, and if not, take appropriate action.

3.1.1.1 Process

Here's a high-level look at how most States access and share motor carrier information in real time.

At the center of the process is the Commercial Vehicle Information Exchange Window, known as CVIEW. CVIEW is State-specific software that displays carrier safety, permitting, and credential data from roadside technologies (like license plate readers) and State and national databases. By displaying data through informative dashboards, CVIEW systems help safety officials quickly assess motor carrier compliance with Federal and State regulations.

States may design their own CVIEW, or use a vendor-developed solution to transfer data to national databases, such as:

• The International Registration Plan, or IRP, clearinghouse, which regulates compliance with commercial vehicle registration requirements.

- The International Fuel Tax Agreement, or IFTA, clearinghouse, which tracks if a carrier has paid all required fuel taxes and facilitates payments to the associated jurisdictions.
- And FMCSA's Safety and Fitness Electronic Records system, known as SAFER, which maintains a "Company Snapshot," including the current IRP and IFTA record for all CMVs, the carrier's safety record, and data from vehicle inspections across the country.

3.1.1.2 Requirements

States meet the Safety Information Exchange requirements by:

- 1. Requiring all safety inspectors to use FMCSA's roadside inspection software, or an equivalent system, to collect inspection information and transfer it to SAFER.
- 2. Connecting to SAFER to exchange carrier and vehicle safety data with other States and FMCSA.
- 3. And, by using a CVIEW that displays State and national data in one location to assist safety officials.

3.1.1.3 Data Quality is a Top Priority

Securely exchanging data between State CVIEWs or CVIEW equivalent systems and FMCSA's SAFER database is the foundation of FMCSA's ITD Program.

FMCSA sets data quality standards, works with States to identify and resolve data issues when they occur, and collaborates among States to continuously improve data quality overall.

3.1.2 Electronic Credentials Administration

A second Core capability supports accurate, timely reporting of credential data by automating the application, processing, and issuance of motor carrier credentials associated with vehicle registration and fuel tax payment.

To achieve Core compliance, States must: enable electronic registration, conduct at least 10% of transactions electronically, and participate in both the IRP and IFTA clearinghouses. The clearinghouses share information and automate funds settlement across jurisdictions.

Additionally, States must be ready to extend these electronic processing capabilities to other credentials, such as intrastate carrier registration, titling, and oversize/overweight permitting.

3.1.3 Electronic Screening (e-screening)

The final ITD Core capability is the use of electronic screening technology to collect vehicle information while the vehicle is traveling at roadway speeds, as it approaches an inspection site.

Electronic screening systems verify vehicle size, weight, and credential information, and interface with FMCSA's Inspection Selection System. The technology then flags vehicles with potential compliance issues to pull in for an inspection, while allowing others to bypass without undergoing an inspection.

Screening vehicles for common compliance issues ahead of the inspection site helps enforcement officers focus inspections on the highest risk operators.

To achieve ITD Core compliance, States must implement e-screening at one fixed or mobile inspection site, and be ready to replicate this functionality at additional sites.

3.2 Core Compliance Certification Process

After a State has deployed the three required Core capabilities, the ITD Team will work with the State to prepare for Core certification by reviewing the State's data, technologies, and roadside processes. Next, the State will complete an ITD Core compliance checklist. When all requirements are met, the State will receive an ITD Core certification letter.

As long as a State maintains Core compliance, it may apply for ITD grant funding to support Core systems, as well as expand its ITD capabilities. FMCSA will decertify States that do not maintain ITD Core compliance.

4 Expanded ITD

After achieving Core compliance, States can request grant funding to expand their ITD capabilities by leveraging additional cutting-edge technologies to maximize their safety impact. This is known as Expanded ITD.

FMCSA, together with public and private stakeholders, initially identified 40 Expanded ITD capabilities. These capabilities are organized into four groups:

- Driver Information Sharing
- Enhanced Safety Information Sharing
- Smart Roadside
- and Expanded Electronic Credentialing

By continually augmenting your State's ITD capabilities, you can increase your efficiency, and better focus resources where they will have the greatest safety impact.

4.1 Driver Information Sharing

Given that high-risk drivers are involved in a disproportionate number of crashes, States can further improve safety by expanding their CVIEW to include information about CMV drivers.

Doing so improves the enforcement officer's ability to check driver credentials for safety problems, and get high-risk drivers off the road. Card-swiping devices and biometrics may be used to collect commercial driver's license information even more efficiently.

4.2 Enhanced Safety Information Sharing

As part of maintaining Core compliance, many States focus on improving the quality of their data by verifying data, correcting errors, and purging outdated information. Funding is available through Expanded ITD to enhance these efforts.

States also work to give drivers access to real-time safety information about truck parking availability and work zone delays, while making safety compliance information available to carriers so that they can proactively improve their operations.

4.3 Smart Roadside

States can further improve their roadside safety monitoring by investing in technologies that enable remote enforcement personnel to collect and review data more quickly and accurately.

These efforts may include:

- Building wireless interfaces to national and State databases such as SAFER, MCMIS, CDLIS, and the State's CVIEW.
- As well as, improving virtual weigh station capabilities. Virtual weigh stations are roadside facilities that collect vehicle data at a location that is monitored by personnel in another location, enabling States to use their enforcement staff most effectively. These stations use technologies such as weigh-in-motion systems, cameras, wireless communications, and license plate readers to collect data.

4.4 Expanded Electronic Credentialing (e-credentialing)

After establishing automated processing of IRP and IFTA credentials to achieve Core compliance, many States leverage this efficient approach for other types of permitting, such as trip, hazardous materials, and oversize/overweight permitting.

States may use Expanded ITD funding to create consolidated web portals that offer motor carriers a convenient way to register and pay for all permits in one place using a single username and password.

5 ITD Planning and Deployment Process

Here's an overview of how States typically engage with the ITD Program.

- First the State must develop and submit an ITD Program Plan and Top Level Design (known as the PP/TLD) summarizing the actions they will take, and the resources needed, to achieve Core compliance. The program plan is only required for States applying for ITD grant funding. States may work on achieving Core compliance over multiple years, and must update their Program Plan at least every five years.
- Next, the ITD Program will review the plan. If the plan is accepted, the State becomes eligible for grant funding; however, approval of the program plan is not a guarantee that each project will be funded. States can apply for FMCSA grant funding once per year.
- The State then deploys their planned technologies to become ITD Core compliant.
- The ITD Program will conduct a review, and certify the State as Core compliant.
- The ITD Program will periodically review the State's ITD capabilities to ensure they maintain Core compliance, and offer tips to improve the efficiency and effectiveness of the State's program.
- After becoming Core certified, the State may choose to amend their ITD Program Plan to include Expanded ITD capabilities.
- Once the ITD Program accepts the Expanded ITD Program Plan, the State may also apply for funding to support Expanded ITD efforts.

6 Roles & Responsibilities

6.1 State

Because the ITD Program supports different technologies with the common goal of improving how motor carrier information is shared among States, the program engages many entities within the State, such as:

- The Department of Revenue,
- The Registry of Motor Vehicles,
- And, roadside safety compliance officials, to name a few.

The offices that manage ITD elements may vary from State to State.

Each entity is responsible for identifying, deploying, and maintaining specific technologies to serve their purpose, and may work with different vendors to do so, but their data are integrated through the State's CVIEW.

It is the role of the State ITD Program Manager to coordinate among these State offices to manage the program budget, submit quarterly activity reports, and connect State leads with ITD resources.

If the State also receives Federal funding to support ITD activities, the State Program Manager, or a separate grant manager, is responsible for fulfilling grant requirements.

6.2 FMCSA

States are supported by both the ITD Team and a local contact from the FMCSA Division Offices in each State.

The ITD Team:

- Administers the grant program
- Maintains ITD architecture and standards, including SAFER
- Provides technical expertise to States and their vendors
- And, hosts monthly meetings and annual workshops to facilitate idea sharing among States, vendors, and FMCSA.

Each FMCSA Division Office provides one-on-one support for their State ITD Program Manager:

- To help the State submit its ITD Program Plan and grant application
- To ensure that the State submits quarterly activity reports, and
- To monitor the State's use of ITD grant funding.

7 Contact the ITD Program Office

7.1 Contact Information

Thank you for taking the time to learn about FMCSA's Innovative Technology Deployment Program. Together, we can effectively apply technologies to improve CMV safety for everyone on our Nation's roadways.

Please visit the ITD Program website to access additional information and resources, or email questions to the ITD Team. To learn more about ITD funding opportunities, visit FMCSA's grants website.