



CSA Safety Measurement System

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A portrait of Marc Moncion, a middle-aged man with thinning hair, wearing a black and white checkered button-down shirt. He is smiling slightly and looking towards the camera. The background is a blurred workshop or factory floor with various equipment and materials.

Marc Moncion

Head of Safety,
Compliance & Regulatory
Affairs

Corporate Profile



- Former DOT/MTO Inspector
- Industry subject matter expert with 25+ years experience.
- Sits on several Federal/State/Provincial regulatory bodies.
- Social media influencer 14,000+ LinkedIn followers and 2,000+ 'Transportation Safety Professionals' Discussion Group.
- Written 3 books on TDG/Hazmat in English & French, and HOS.
- Author 'Ask the Expert' blogs <https://blog.fleetcomplete.com/safety-corner>
- 'Marc's Safety Corner' YouTube
<https://www.youtube.com/user/CompleteInnovations>
- Fully licensed CDL holder, and can drive all types of commercial vehicles

What is Compliance, Safety, Accountability (CSA)?

- Data-driven safety compliance and enforcement program.
- Designed to improve safety and prevent commercial motor vehicle (CMV) crashes, injuries, and fatalities.



Why Does CSA Matter?

- More than 5.5 million truck and bus drivers share the road with more than 250 million motorists in the U.S.
- Preventable crashes cost lives and livelihoods.
- Strong safety practices are good for business and make roadways safer for everyone.



3 Core Components:

1. Safety Measurement System (SMS);
2. Interventions;
3. Safety Fitness Determination(SFD) rating system to determine the safety fitness of motor carriers.



How does CSA affect Motor Carriers?

- Affects motor carriers, including owner-operators, by identifying those with safety problems.
- Prioritizes carriers for interventions such as warning letters and investigations.
- Affects drivers because their safety performance and compliance impact their safety records.
- Driver behavior also impacts carrier's safety record.

Prioritization: How it works?

- Carrier's safety data appears online in FMCSA's SMS.
- FMCSA updates the SMS once a month with data from:
 - Roadside Inspections
 - Driver & Vehicle Violations
 - Crash Reports from the last 2 years
 - Investigation Results



What Does SMS Consider?

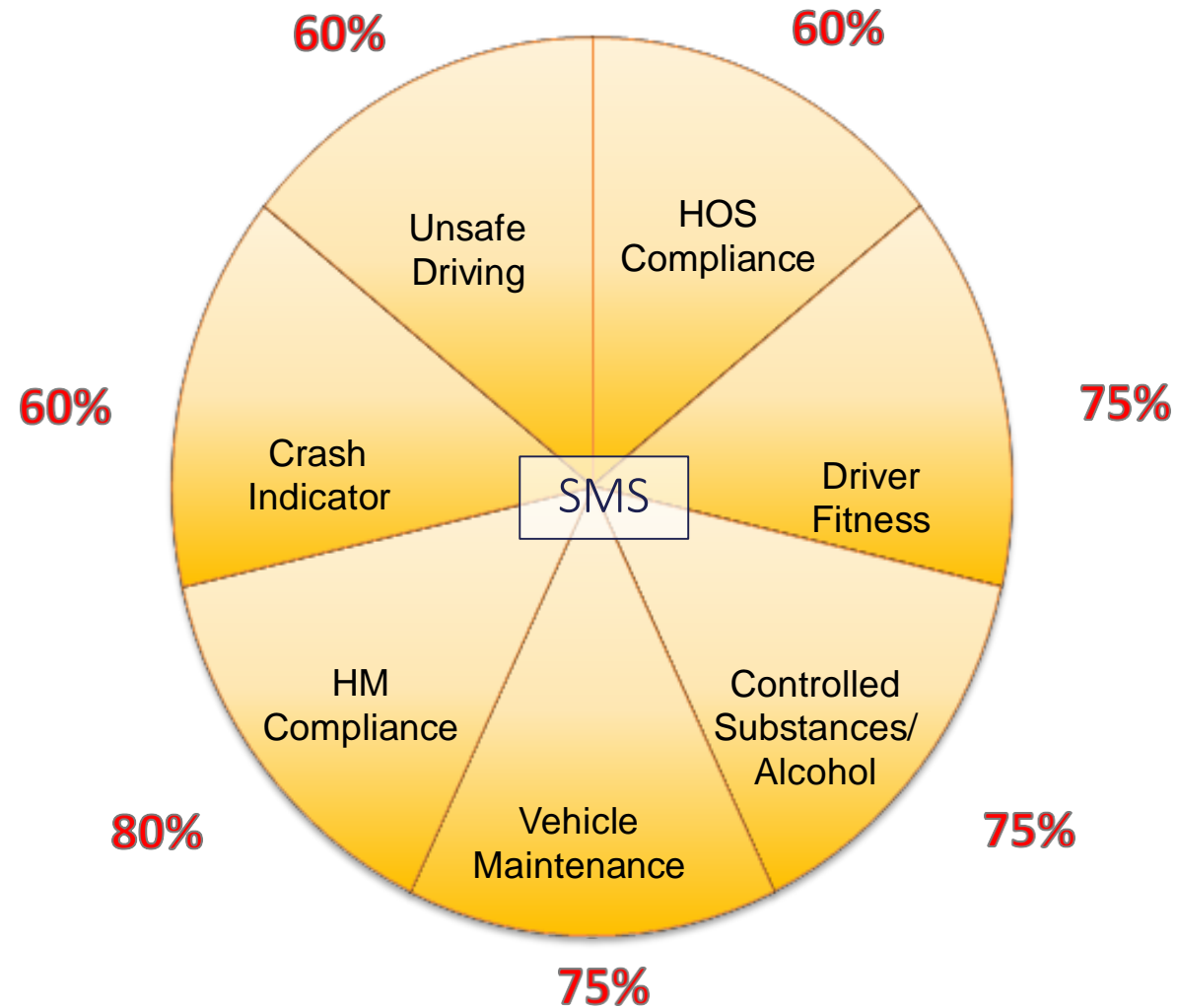
- Number of safety violations and inspections.
- Severity of safety violations or crashes.
- When the safety violations occurred, with recent events weighted more heavily.
- Number of trucks/buses a carrier operates and the number of vehicle miles traveled.
- Acute & Critical Violations found during investigations.

SMS & 7 BASICs

- The BASICs help carriers to understand where they're having safety problems so they can correct them.
- Each BASIC addresses specific requirements in FMCSA's regulations.



BASIC Thresholds



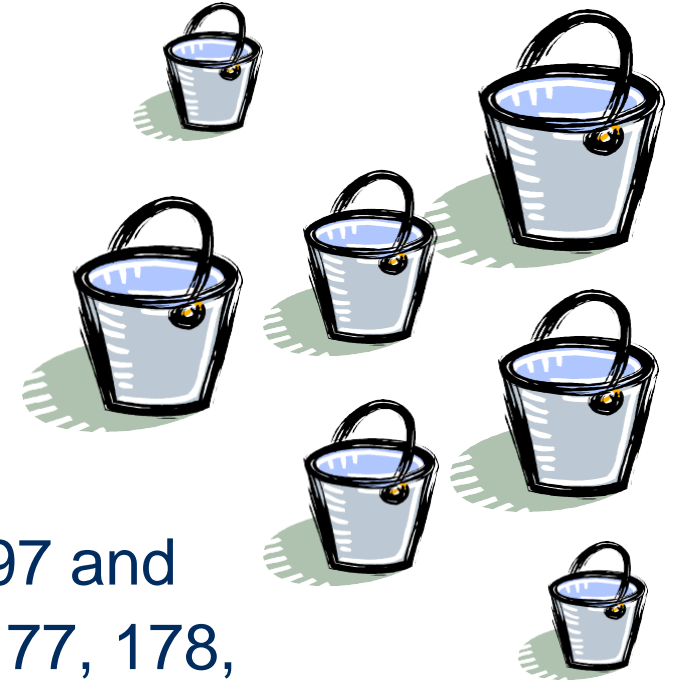
SMS Methodology

- Gather 24 months of on-road safety event data (i.e., inspections, citations, crashes) to create a safety event history for a carrier.
- Places each carrier violation and/or crash into a BASIC.
- Converts BASIC data into a quantifiable measure/rate.
- Develops a % rank for each BASIC based on each carrier BASIC measure.



BASIC Data Components

1. Unsafe Driving (Parts 392 & 397)
2. Hours-of-Service (HOS) Compliance (Parts 392 & 395)
3. Driver Fitness (Parts 383 & 391)
4. Controlled Substances/Alcohol (Parts 382 & 392)
5. Vehicle Maintenance (Parts 392, 393 & 396)
6. Hazardous Materials (HM) Compliance (Part 397 and HM Regulations (HMRs) Parts 171, 172, 173, 177, 178, 179 and 180)
7. Crash Indicator



BASIC Measures

1. Time Weighting/Timeframe – More recent events are more relevant.

AGE OF VIOLATION	WEIGHT
≤ 6 MONTHS	3
6 – 12 MONTHS	2
12 - 24 MONTHS	1

2. Severity Weighting – Increases weighting of violations shown to create a greater risk of crash involvement/consequence.



BASIC Measures

3. Severity Weight Cap – Limits the total severity weight a single inspection can have in a BASIC
4. Violation Cap – Cited section number only counts once per inspection
5. Segmentation – (Crash Indicator and Unsafe Driving) Segments carrier population into by peer groups of like minded size

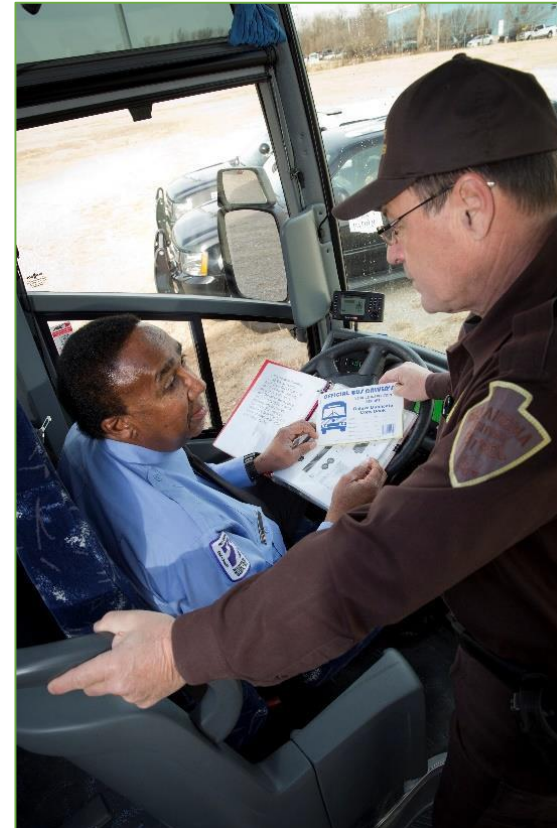


1. Unsafe Driving

Operation of a CMV in a dangerous or careless manner

Examples:

- Speeding
- Reckless Driving
- Improper Lane Change
- Following Too Closely



2. HOS Compliance

Operation of a CMV by drivers who are ill, fatigued, or not compliant with the HOS regulations

Examples:

- HOS
- Form and manner
- Operating a CMV while ill or fatigued (all Part 395)



3. Driver Fitness

Operation of a CMV by a driver who is unfit to operate due to lack of experience, or medical qualifications

Examples:

- Failure to have a valid and appropriate Commercial Driver's License and Hazmat Certificate.

4. Controlled Substances / Alcohol

Operation of a CMV while impaired due to alcohol, illegal drugs, and misuse of prescription medications or over-the-counter medications

Examples: Use or possession of controlled substances or alcohol



5. Vehicle Maintenance BASIC

Failure to properly maintain a CMV or prevent shifting loads

Examples:

- Brakes
- Lights
- Other Mechanical Defects
- Failure to Make Required Repairs
- Improper Load Securement



6. Hazmat Compliance

Unsafe Handling of Hazardous Materials on a CMV



Examples:

- HM package not properly loaded & secured on vehicle
- Shipping papers not provided or do not include shipping name or class/division of the HM
- Placards/markings not provided or affixed to packages and vehicles that require them

7. Crash Indicator



- Histories or patterns of high crash involvement, including frequency and severity
- Based on reported crash records in the U.S.

Prioritization: On-Road Performance

Calculation	<ul style="list-style-type: none">• Only considers individual carrier performance• Based on carrier violations or crashes weighted by time and severity	<ul style="list-style-type: none">• Based on carrier's BASIC measure• Groups and ranks carrier by BASIC with carriers that have similar safety events (i.e., inspections, inspections with violations, crashes) into a safety event group
Scale	<ul style="list-style-type: none">• Lower the measure, better the performance	<ul style="list-style-type: none">• 0-100, with 100 indicating worst performance

Prioritization: Serious Violations

- Examples of Serious Violations*
 - §395.8(e) False reports of records of duty status
 - §382.305(b)(2) Failing to conduct random controlled substances testing on drivers
 - §383.51(a) Knowingly allowing, requiring, permitting, or authorizing a driver to drive who is disqualified to drive a CMV

*For a complete list of all Serious Violations and updated descriptions, view the Serious Violations spreadsheet:

<https://bit.ly/2NJ2m4V>

What Your Clients and Their Drivers Should Know?

- Motor carriers are accountable for their drivers' violations
 - All inspections and violations your drivers receive while they work for you remain part of your carrier record for 24 months (regardless of whether they continue operating for you)
 - Carriers do not inherit past violations of a newly hired driver
- Roadside inspection data remain part of a driver's record for 3 years, crash data for 5 years

Reviewing Safety Data in the SMS

What safety data can you view?

Public	<ul style="list-style-type: none">• BASIC information for all carriers, except for the Hazardous Materials (HM) Compliance & Crashes• Driver names are not included
Carriers (Logged In)	<ul style="list-style-type: none">• All BASIC information, including (HM) Compliance & Crashes• Driver names per inspection and crash data
Drivers	<ul style="list-style-type: none">• Public view of all carriers


<https://csa.fmcsa.dot.gov/login.aspx>

United States Department of Transportation

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 **FMCSA**
Federal Motor Carrier Safety Administration

LOGIN |

 **CSA**
Compliance • Safety • Accountability

Get Road Smart.

HOME ABOUT YOUR ROLE HELP CENTER WHAT'S NEW SMS RESULTS SMS PREVIEW

Home > Login

U.S. DOT# & PIN

U.S. DOT#:

U.S. DOT# PIN:

Motor carriers can log in using their U.S. DOT Number and FMCSA-issued **U.S. DOT Number Personal Identification Number (PIN)**, NOT their Docket Number PIN. If you are experiencing PIN issues, visit our [PIN Help page](#) for additional assistance.

In the coming months, access by U.S. DOT Number and U.S. DOT Number PIN will be disabled on SMS and motor carriers will need to log in using the [FMCSA Portal](#). To prepare for this transition, [register](#) for a Portal account today.

LOGIN

FMCSA PORTAL LOGIN

User ID:

Password:

Motor carriers and enforcement users can now log in using their Portal ID and Password.

- [Register for a Portal account](#)
- [Forgot your Password?](#)
- [Forgot your User ID?](#)
- [Unlock your Account?](#)

Motor carriers, if you need additional access assistance, please call 1-800-832-5660.

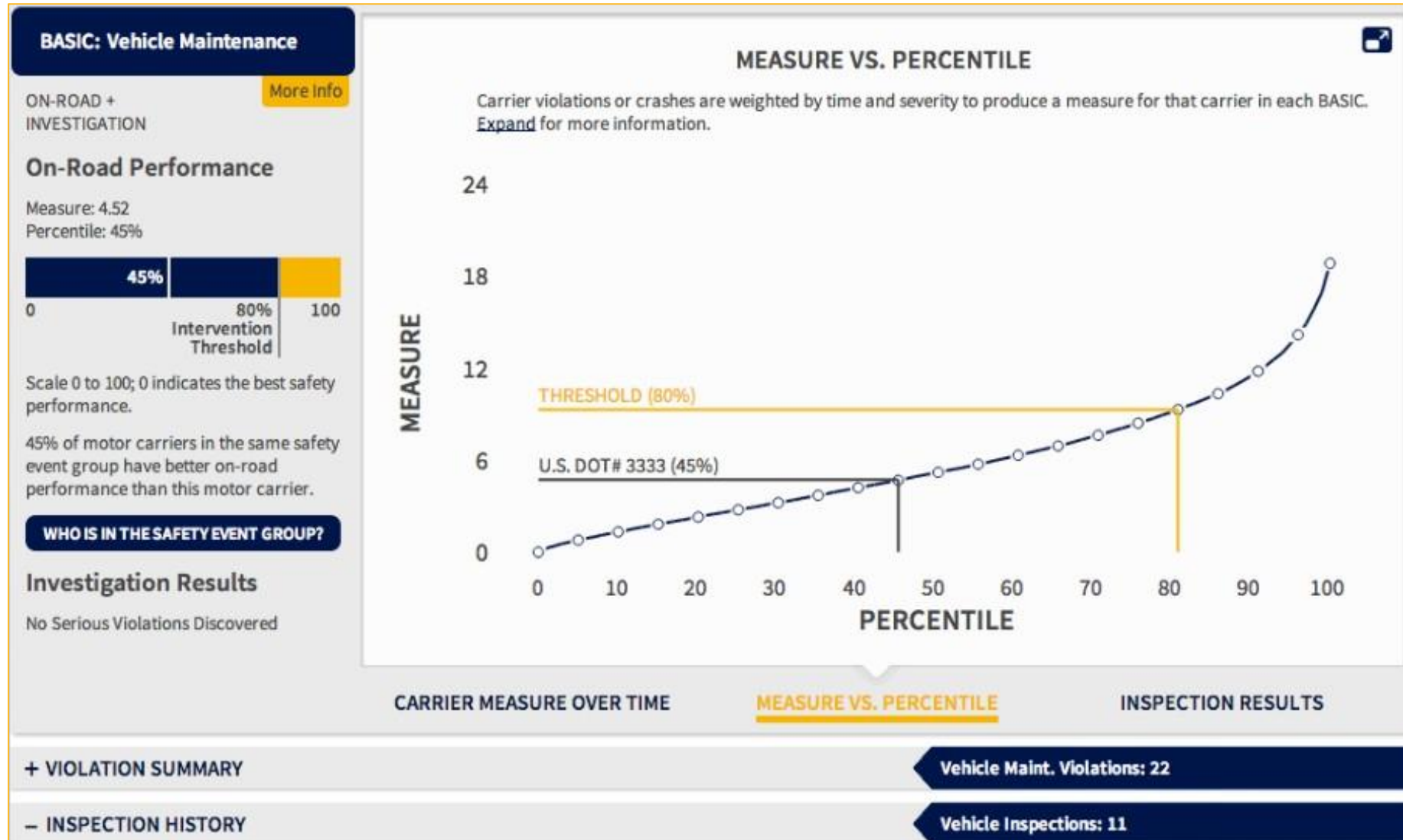
LOGIN

WARNING:

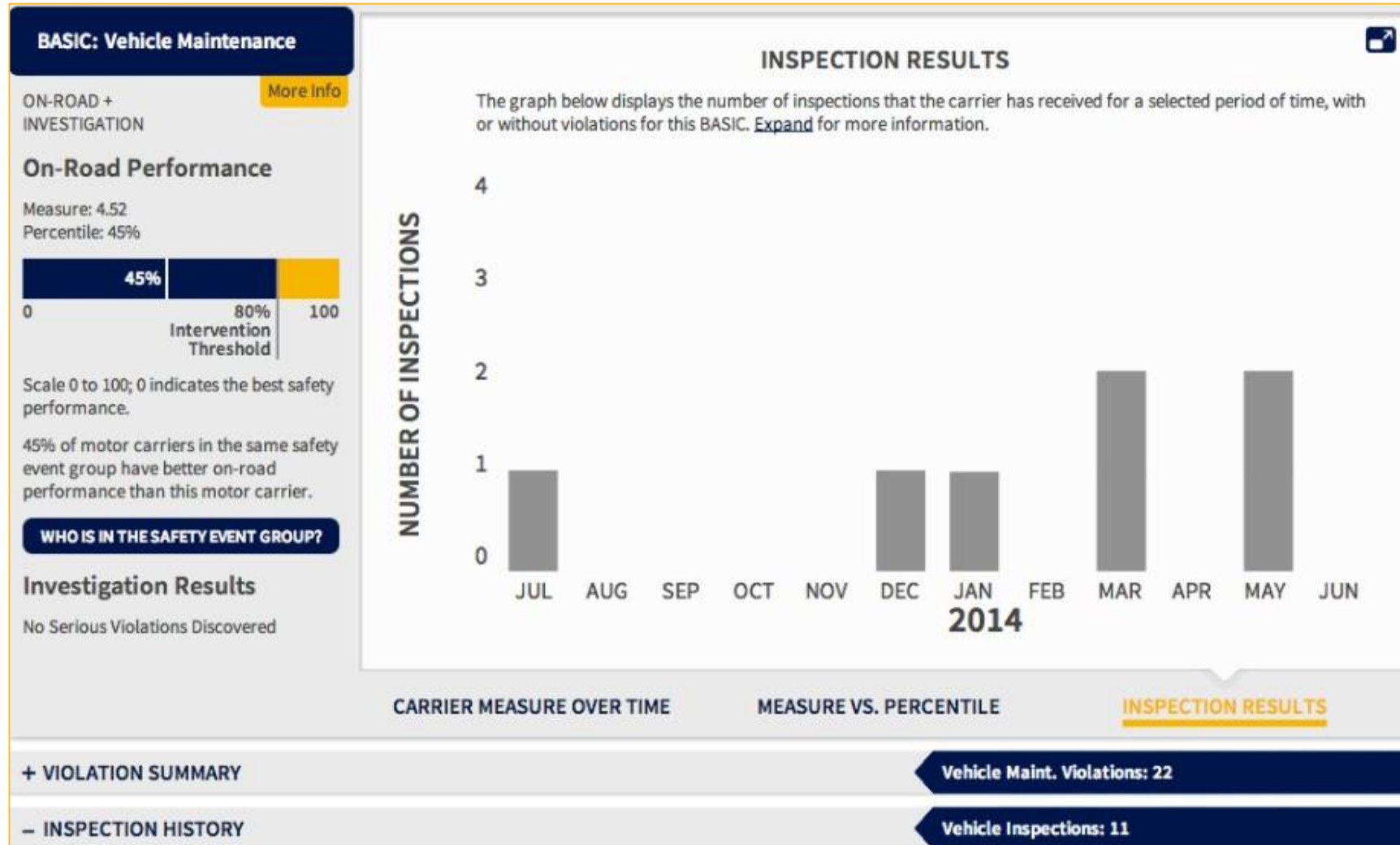
You are accessing a U.S. Government information system. This information system, including all related equipment, networks, and network devices, is provided for U.S. Government-authorized use only. Unauthorized or improper use of this system is prohibited, and may result in civil and criminal penalties, or administrative disciplinary action. The communications and data stored or transiting this system may be, for any lawful Government purpose, monitored, recorded, and subject to audit or investigation. By using this system, you understand and consent to such terms.



SMS Screenshots



SMS Screenshots



SMS Screenshots

<input checked="" type="radio"/> Vehicle Inspections 11			(or)			<input type="radio"/> With Vehicle Maint. Violations (7) <input type="radio"/> Without Vehicle Maint. Violations (4)		
Report			Vehicle			Measure = $\frac{\text{Sum of the Total Weight (TotW)}}{\text{Sum of the Time Weight (TiW)}}$		
Inspection Date	Number	State	Plate Number	Plate State	Type	Severity Weight (SW)	Time Weight (TiW)	Total Weight (TotW)
5/16/2014	NM1234567890	NM	AM12345	CA	Truck Tractor	0	3	0
4/24/2014	VA0987654321	VA	AM12345	CA	Truck Tractor	2	3	6
Violation: 393.9 Inoperative required lamps						2		
3/11/2014	OK1122334455	OK	AM09876	CA	Truck Tractor	0	3	0
2/27/2014	MA0099887766	MA	AM00112	CA	Truck Tractor	5	3	15
Violation: 393.9 Inoperative required lamps						2		
Violation: 393.95(b) No spare fuses as required						2		
Violation: 393.78 Windshield wipers inoperative/defective						1		
Sum of Violation Weight => Inspection Severity Weight (SW)						5		
1/1/2014	AR2233445566	AR	AM55667	CA	Truck Tractor	0	3	0
11/21/2013	AR1112223334	AR	AM88775	CA	Truck Tractor	9	2	18
Violation: 393.78 Windshield wipers inoperative/defective						1		
Violation: 393.209(e) Power steering violations						6		
Violation: 393.9 Inoperative required lamps						2		
Sum of Violation Weight => Inspection Severity Weight (SW)						9		
7/5/2013	SCA999888777	SC	AM88775	CA	Truck Tractor	4	2	8
Violation: 396.17(c) Operating a CMV without proof of a periodic inspection						4		
3/29/2013	MD2000777444	MD	AM78906	CA	Truck Tractor	29	1	29
Violation: 396.7 Unsafe operations forbidden (OOS)						3 + 2 (OOS)		
Violation: 396.5(b) Oil and/or grease leak						3		
Sum of measure weights						77	23	104
PERFORMANCE MEASURE LAST MONTH As of 5/30/2014			$\frac{\text{TotW}}{\text{TiW}} = \frac{104}{20} = 5.20$					
PERFORMANCE MEASURE THIS MONTH As of 6/20/2014			$\frac{\text{TotW}}{\text{TiW}} = \frac{104}{23} = 4.52$					
*** The sum of all violation severity weights (violation weight + out-of-service) for this inspection has been capped at 30.								
+ INVESTIGATION RESULTS						Vehicle Maint. Serious Violations: 0		

Then What?

- After a measurement is determined, your client is placed in a peer group (e.g., other carriers with similar numbers of inspections).
- Percentiles from 0 to 100 are then determined by comparing the BASIC measurements of the carrier to the measurements of other carriers in the peer group.
- A percentile 100 indicates the worst performance in that peer group.

What Can You Do?

- Leverage the profile scores to focus on specific Fleet Complete Solutions to bridge the compliance gap.
- Help educate your client on their CSA profile scores
- Check the website for information and updates on all your leads, opportunities and current clients.

<http://csa.fmcsa.dot.gov>

What Can You Do?

- Raise your Client's Safety Compliance Awareness
- Review inspections and violation history over the past 2 years
- Review BASIC assessments, and help your client to address their safety problems with a Fleet Complete solution
- Educate your clients how their drivers performance impacts not only their own driving record but the carrier's CCS's safety assessment

DataQs: Improving Your Safety Data

Allows carriers/drivers to file a Request for Data Review (RDR) to identify concerns about data in FMCSA's data systems that may be incomplete or incorrect

Forwards your RDR to the appropriate office for resolution

Gives you updates on the status of your RDR, from submission through resolution

DataQs: Improving Your Safety Data

When filing an RDR, remember to:

Write a specific and detailed explanation

Attach relevant supporting document(s):

Example: include a lease agreement if you are an owner-operator with a valid lease agreement with another company

Ensure your contact information is accurate

Check the status of your RDR frequently (additional information may be requested)

Consult the DataQs guide for additional tips:

https://dataqs.fmcsa.dot.gov/Data/Guide/DataQs_Users_Guide_and_Best_Practices_Manual.pdf

Requests for Data Review (RDRs)

- RDRs can only be submitted for violations that were erroneously reported or incorrectly documented during the inspection
- Examples of improper requests:
 - “Driver fired”
 - “Crash not our fault”
 - “Driver caused the violation”
 - “An owner-operator or another carrier committed the violation while they were leased to our operation”

CSA's Three Core Components

Safety Interventions Process

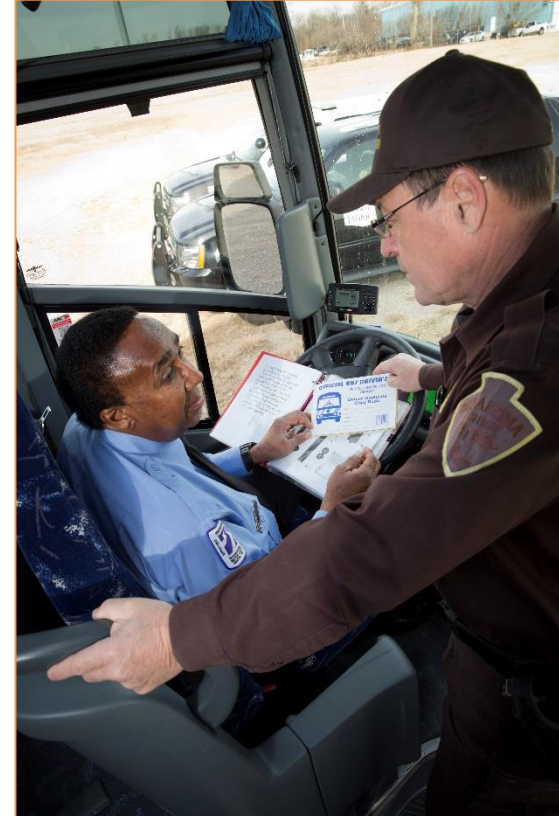
Safety Interventions Process

CSA Interventions

- Wide array of interventions FMCSA uses to address safety problems—before crashes occur

Safety Management Cycle (SMC)

- A process to help pinpoint safety problems and take corrective action



CSA Interventions

Warning Letter

- Alerts carriers to safety issues and consequences of failing to correct them
- Chance to improve without further FMCSA intervention

Investigation

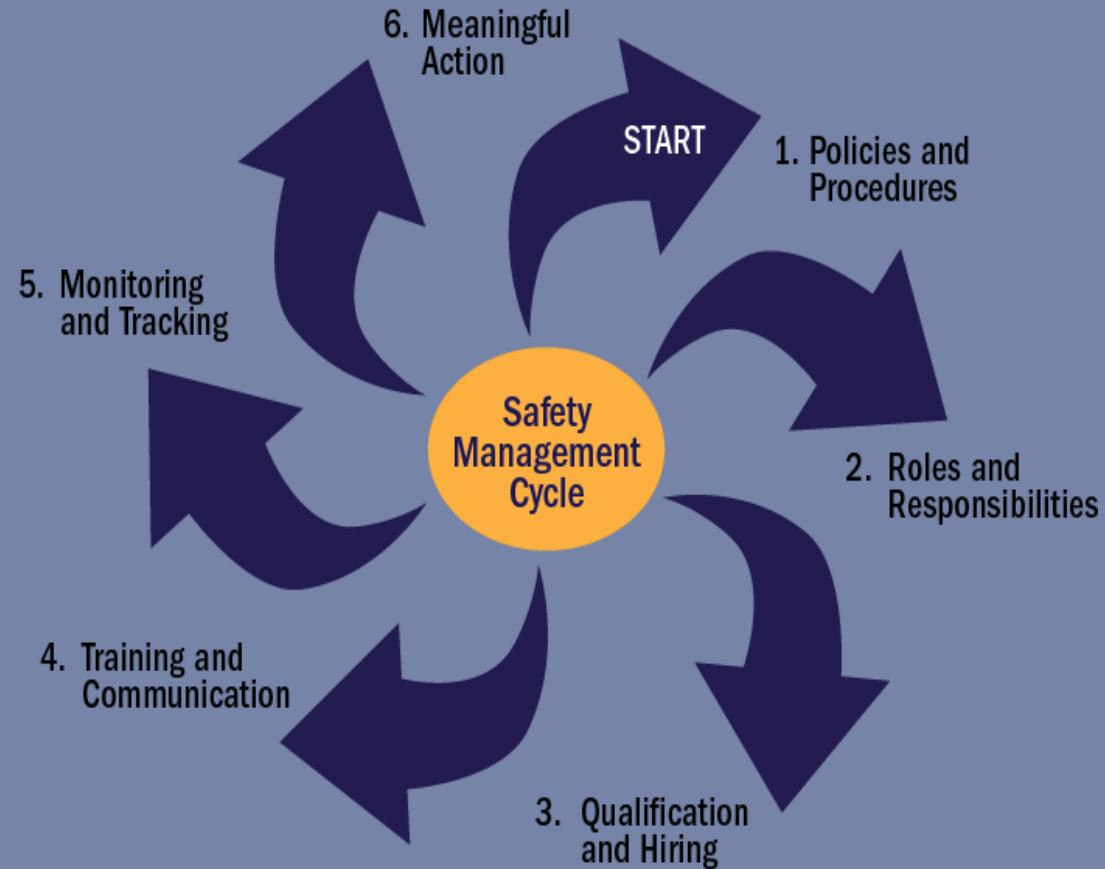
- Offsite (done remotely): conducted via documentation requests; addresses emerging safety problems
- Onsite Focused (at your business site): focuses on specific compliance areas
- Onsite Comprehensive (at your business site): addresses compliance across a carrier's entire operation

CSA Interventions

Follow-on Corrective Action

- Cooperative Safety Plan: voluntary improvement plan
- Notice of Violation (NOV): violations severe enough to warrant formal action, but not a civil penalty
- Notice of Claim (NOC): violations severe enough to warrant assessment and issuance of civil penalties
- Out-of-Service Order (OOSO): deemed “unfit” to operate; requires you to cease motor vehicle operations immediately

What is the Safety Management Cycle (SMC)?



Step-by-step process consists of six SMPs

How You Can Use the SMC?

- Identify trends by reviewing your violations and crash history in the SMS
- Detect potential process breakdowns that may contribute to violations by analyzing each Safety Management Process (SMP) (start with no.1 Policies and Procedures)
- Assess why these breakdowns occur
- Identify safety improvement practices
 - Safety Investigators may walk carriers through the SMC during investigations and carriers can use the tool on their own
- Find tools for using the SMC: http://csa.fmcsa.dot.gov/about/smc_overview.aspx

Staying Connected

- Visit the Motor Carrier Resource Center at:
<http://csa.fmcsa.dot.gov/?carriersafety>
- Sign up for important updates via the CSA Website at:
<https://csa.fmcsa.dot.gov/WhatsNew/Article?articleId=543351>
- Contact FMCSA if you have questions or feedback at:
http://csa.fmcsa.dot.gov/CSA_Feedback.aspx or by calling 877-254-5365
- Download Get Road Smart brochures, pocket cards, posters, and factsheets at: <http://csa.fmcsa.dot.gov/?toolkit2>, or order by calling the InfoLine at 877-254-5365



Questions ???

Find your Answers at:

<https://blog.fleetcomplete.com/safety-corner>

