

ORIGINAL
TECHNICAL PROPOSAL FOR:
WEST VIRGINIA DEPARTMENT OF TRANSPORTATION

Request for Proposal
CRFP 0803 DOT2600000002
Crash Reporting & e-Citation System

Submitted to:
Department of Administration
John Estep / Purchasing Division
2019 Washington Street East
Charleston, WV 25305-0130
John.w.estep@wv.gov

Submitted by
Michael Snyder
National Sales Director
Cell Phone: 850-232-4846
Email: michael.snyder@smartcop.com

Signed by: Steven J. Williams 2/24/2026
Signature 0F5CB7E5098341C...
Name/Title: Steven J Williams, Executive Vice President Date



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Department of Administration
 Purchasing Division
 2019 Washington Street East
 Post Office Box 50130
 Charleston, WV 25305-0130

State of West Virginia
 Centralized Request for Proposals
 Info Technology

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Doc Description: Crash Reporting and e-Citation System Modernization

Reason for Modification:
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 CHARLESTON WV 25305
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VENDOR

Vendor Customer Code:

Vendor Name : SmartCOP, INC.

Address :

Street : 410 E. Government St.

City : Pensacola

State : Florida

Country : USA

Zip : 32502

Principal Contact : Michael Snyder

Vendor Contact Phone: 850-232-4846

Extension:

FOR INFORMATION CONTACT THE BUYER

John W Estep
 304-558-2566
 john.w.estep@wv.gov

Vendor Signature X *Steve Williams*

FEIN# 59-3668195

DATE March 3, 2026

All offers subject to all terms and conditions contained in this solicitation unless otherwise stated.

ADDENDUM ACKNOWLEDGEMENT FORM
SOLICITATION NO.: CRFP DOT2600000002

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Addendum Numbers Received:
(Check the box next to each addendum received)

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| <input type="checkbox"/> Addendum No. 3 | <input type="checkbox"/> Addendum No. 8 |
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SmartCOP, Inc.

Company

Signed by:
Steven J. Williams

Authorized Signature

2/24/2026

Date

NOTE: This addendum acknowledgment should be submitted with the bid to expedite document processing.

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SmartCOP, Inc.

Company

Signed by:

Steven J. Williams

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Authorized Signature

3/9/2026

Date

NOTE: This addendum acknowledgement should be submitted with the bid to expedite document processing.



WVDOT
CRFP 0803 DOT2600000002
Crash Reporting & e-Citation System

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1. COVER LETTER

John Estep
West Virginia Purchasing Division
2019 Washington Street East
Charleston, WV 25305-0130

Subject: RFP for Crash Reporting and e-Citation Modernization

Dear John:

On behalf of SmartCOP, Inc., I am pleased to provide this response to the Request for Proposal for a modernized Crash Reporting and e-Citation solution for West Virginia Department of Transportation (WVDOT).

We are confident the information provided in this response will clearly demonstrate SmartCOP's ability to meet WVDOT's goals to operate and maintain a modernized state-wide vehicle crash reporting and e-citation system that meets the functionality required and can be used by field law enforcement officers throughout the state. Using our COTS, proven solutions, along with our expertise in successfully implementing and training state and local agencies, is why we believe SmartCOP is the best vendor for this modernization project. Our software solutions are first class, fully scalable, reliable, multi-agency and multi-jurisdictional. More importantly, we are committed to providing WVDOT with excellent service and support.

SmartCOP specializes in statewide law enforcement by integrating the specific reporting requirements and processes into our system. We partnered with the State of Montana to provide a statewide Crash Reporting system that is used by all agencies in the state. In addition, we have partnered with the State of West Virginia DNR, State of Florida Highway Patrol, Georgia Dept of Public Safety, South Carolina Dept of Public Safety, Tennessee Wildlife Resources agency, and Colorado Parks and Wildlife, and their respective agencies to provide Statewide public safety solutions, including crash reporting and e-citations, that meet their specific needs.

SmartCOP will be the primary vendor on this project, and we do not anticipate using subcontractors to fulfill this contract. All work on this project will be handled by our experienced project management and development teams based out of Pensacola, Florida.

The primary contact for this solicitation is:

Michael Snyder
National Sales Executive
410 E. Government St.
Pensacola, FL 32502
850.232-4846
Michael.snyder@smartcop.com

SMARTCOP ADVANTAGES

Fully integrated COTS system

Multi Agency/Multi-Jurisdictional

Offline Reporting Capabilities

Mobile Driver's License App

100% dedication to public safety software

99% Customer Retention Rate

Scalable

Flexible Deployment

25 years' experience providing solutions for statewide LE agencies including:

[West Virginia DNR](#)

[Florida Highway Patrol](#)

[Georgia Dept of Public Safety](#)

[Montana Highway Patrol](#)

[South Carolina Dept of Public Safety](#)

[Tennessee Wildlife](#)

[Colorado Parks and Wildlife](#)

[Kansas Highway Patrol](#)



In closing, we recognize the unique challenges of implementing and maintaining a Statewide Law Enforcement system and we firmly believe that SmartCOP has the solutions, the experience, and the approach to fully meet the present and future goals of West Virginia DOT. We look forward to demonstrating our Crash Reporting and e-Citation solutions.

Sincerely,

A handwritten signature in blue ink that reads "Steven Williams".

Steven Williams
Executive Vice President



2. EXECUTIVE SUMMARY

Overview

It is our understanding that WVDOT is seeking to replace its legacy Crash Reporting and e-Citation system with a modern solution that improves efficiency, eliminates redundancy, is responsive to change, is scalable and can meet the functionality WVDOT is seeking in a new solution. Some of the goals WVDOT has laid out for a new Crash Reporting and e-Citation solution include:

- Crash record data collection by LE.
- Compliant with NHTSA and MMUCC
- Identify location of crash or citation by placing a pin on a map
- Integrated with WV location referencing system
- Integration with 3rd party systems such as barcode readers for license, registration, and VIN
- Ability to work offline when necessary
- Enhanced integration with other WVDOT and State systems including WV Driver's License system, Vehicle Registration system, and WV Unified Court System
- Manage sale of crash reports online
- Business Intelligence Reporting and Analytics
- Edit checks to ensure data integrity
- Enforce cross-field validation rules
- Automatically reveal or hide relevant fields based on selections
- Support complex multi-field logic
- Provide real-time feedback to end user when entry violates a logical rule
- Administrative configurable validation rules
- API for integration with 3rd party CAD and RMS solutions used by local LE

SmartCOP has the experience and know-how in providing traffic crash reporting and e-Citation solutions for state-wide agencies and it is our intent to provide WVDOT with the next generation of solutions. In the pages that follow, SmartCOP will outline in depth how our solutions and services meets WVDOT goals and objectives and proves that we are the best vendor to partner with for this project.

Based on our understanding of the agency's current process we propose an integrated system to streamline and eliminate data redundancy and duplicate entry, such as:

- **For Crash Reports**
 - No need to enter crash reports into a system and then re-enter the same data into a local system.
 - No need to do batched processes to poll in order to import data from multiple databases.
 - A system that receives reports from any local records management system vendor.
 - No need to extract XML data to provide WVDOT.
- **For Citations**
 - No duplicate entry.
 - No need to write paper tickets.
 - No manual entry into court system.
 - No need to manually enter adjudication information.

WVDOT will benefit from the MMUCC (Model Minimum Uniform Crash Criteria) with the use of SmartCOP's Crash module by providing standardized crash reports to meet minimum federal traffic crash requirements. Another benefit of MMUCC compliance is the collection of consistent, reliable crash data that is more effective in identifying traffic safety problems. Electronic traffic crash reporting and citation issuance will greatly increase productivity and efficiency as well as provide WVDOT with standardized data.



SmartCOP's Crash Reporting and e-Citation modules are based on the Microsoft SQL server platform, utilizes .NET and web services technology. They are highly configurable, readily integrates with external systems for sharing data, accepts reports completed by third party applications, and is easily maintained and functionally comprehensive, yet extremely intuitive to the user.

The system's design handles multi-county, statewide use with integrated configuration of county, court, violations, and county specific violations. The end user is presented with an intuitive, single application that allows for faster and more accurate completion of forms, thereby multiplying force availability and capability. The resulting data provides an accurate, single source for analytical and reporting purposes. The maintenance of the system is central with configuration setting changes easily distributed to the end user clients.

Scope of Work

SmartCOP is pleased to present WVDOT with this scope of work for an advanced **Crash Reporting and e-Citation solution**. We continually enhance our software based on customer input, State mandates, and evolving technology standards. Our software helps our customer agencies improve officer safety and enables more efficient use of resources by eliminating duplicate data entry.

Our proposal highlights our extensive record of accomplishment deploying similar solutions for large state and local agencies, showcasing our unparalleled expertise in delivering an integrated, modern, and easy to use solution on time and on budget. **Our solutions are highly configurable, multi-agency, and multi-jurisdictional, that are not only scalable but can also be effectively implemented across expansive geographic regions.**

Our solutions also offers unparalleled flexibility with deployment options including on-premise, remote data center, AWS private cloud, or Hybrid environment. For WVDOT, SmartCOP is proposing a managed, AWS GovCloud environment for both the crash reporting and e-citation that will support a production and test/training environment with Disaster Recovery geographically separated in its own cloud. We will work with WVDOT to provide an infrastructure that will meet the demands and budget of the agency.

Overall, it is clear to us that our solution overwhelmingly meets the requirements set forth by WVDOT.

Proposed Solutions and Services

SmartCOP is proposing a SaaS offering of our Crash and eCitation solutions that complies with and supports both vehicle crash reporting and the recording, issuance and tracking of citations by law enforcement in the field. We meet NHTSA MMUCC Sixth Edition for crash reporting and SmartCOP will comply with West Virginia State Code and Administrative Rules, local municipal ordinances and statutes, rules and regulations, American Association of Motor Vehicle Administrators (AAMVA) policies and standards, and other relevant requirements of NHTSA and Federal Motor Carrier Safety Administration (FMCSA).

The solutions we have included in our proposal will support the goals and objectives of WVDOT and provide the functionality the agency requires. In addition, we will provide full project management, consulting, configuration, installation, interface development, data migration, training services, superior support, and AWS GovCloud managed hosting as part of our full-service delivery.

Our fully integrated systems ensure users only enter data once regardless of where the information is entered.

Solution Differentiators

- ❖ **Commercial-Off-The-Shelf** -SmartCOP offers a COTS product portfolio that is scalable to any size agency.
- ❖ **Seamless Integration** - Solutions designed and developed in-house with seamless integration in a single database.
- ❖ **Multi-Agency/Multi-Jurisdiction** -Solutions that are multi-agency, & multi-jurisdictional.
- ❖ **Offline Report Creation** – Ability to create reports even when there is no connectivity
- ❖ **Crash Reconstruction Reports** – ability to create detailed crash reports involving traffic fatalities.
- ❖ **mDL app for iPhones** -capture driver's mobile driver's license information with an iPhone for report population.

SmartCOP Proposed Crash Reporting & e-Citation Solution



Crash and Citation Management System (CCMS) – SmartCOP's CCMS solution will provide WVDOT with a central database for people, property, places, and vehicles in a single database that enables law enforcement agencies to efficiently manage and track the volume of information received daily.

Crash and Citation Reporting / Field Based Reporting (FBR) - a highly configurable solution designed to meet the unique requirements and preferences of each agency. By tailoring the system to agency-specific workflows, officers can significantly reduce the time spent entering data for citations, notices, and reports. This customization also enhances the accuracy and consistency of generated documents. **A differentiator is that it can operate in a completely disconnected (offline) mode in the field.** FBR includes tools for traffic citations/summons, warnings, crash reporting, arrest reporting, consent to search, radar log, DUI FST documentation, use of force reporting, citizen contact logs, and much more. Our solution complies with NIBRS, NHTSA and MMUCC. FBR is compatible with Windows based tablets and laptops.

Included as part of our Crash and Citation Reporting module:

- **E-Citation System** – The FBR system includes an e-citation system. The system generates traffic summons (citations) that conform with state guidelines. Easily complete the form with information from DMV and NCIC. Includes court scheduling and fine amounts for every county, as well as the capability to complete roadside payment collection by credit card, and many more features that we will highlight in this response. Barcode readers can be used to read Driver's License, Registration, and VIN information from AAMVA compatible states to populate info into the report.
- **Crash Reporting System** - SmartCOP's Traffic Accident / eCrash module provides a complete, **state-compliant crash reporting** solution that is **100% MMUCC compliant**. The e-Crash software can capture data from the agency's RMS or CAD system (with integration) and auto-populate the applicable information into an electronic version of the crash form. Officers can **paste information from State/NCIC into the crash report, print driver's exchange forms, create reconstruction forms**, and use configurable pick lists for streamlined data entry. The system supports **driver's license scanning** and is compatible with various diagramming programs, including full integration with **Easy Street Draw**. Additionally, officers can easily issue citations that result from the crash with the click of a button. Barcode readers can be used to read Driver's License, Registration, and VIN information from AAMVA compatible states to populate info into

the report.

- **SmartFORMS** – FBR app for Apple iOS IPADs.
- **mDL – Mobile Driver’s License.** SmartCOP provides a fully integrated mobile driver’s license (mDL) interface designed specifically for law enforcement agencies, enabling secure acceptance and use of digital driver’s licenses during traffic stops.
 - Direct Integration: Works with SmartCOP’s FBR and SmartMOBILE app.
 - Secure Digital Capture: Officers can securely scan and capture driver’s license data directly from a driver’s mobile device.
 - Automatic Data Transmission: Captured data is transmitted directly into the agency’s system, eliminating manual typing or re-entry.
- **Online Crash Report Sales** – SmartCOP’s SmartWEB online portal will be customized to allow for the sale of crash reports online. Integration into WV State Treasury Merchant Services system is included for collection of fees.



Administration (SmartADMIN) – SmartADMIN provides tools for security and access controls, and enterprise configuration. SmartADMIN is a single, centralized enterprise management module that is used to configure and control access to SmartCOP’s Public Safety software suite. SmartADMIN modules include

- Employee Master File
- System Access/Permissions/ Role Based Permissions
- Configuration Manager



Analytics and Reporting (SmartDATA) – Analytics, dashboarding, and reporting tools. SmartDATA is an indispensable analytic tool that gathers information from all locations within the CCMS server. It is used by agency supervisors, analysts, command staff, and agents/investigators to extract critical data that public safety agencies use every day. It provides visual tools such as pie charts, crime mapping, reports, etc. SmartDATA also allows for exporting of data.



Professional Services - WVDOT will be provided with a full system implementation and support model to include:

- ◆ Experienced Project Management Services
- ◆ Business Analysis Review
- ◆ Administrative and End-User Training
- ◆ Train the Trainer
- ◆ System and Software Configuration
- ◆ Data Conversion/Migration Services
- ◆ Interface Development Services
- ◆ Functional, Reliability, Acceptance Testing
- ◆ Go-Live Support
- ◆ Post Go-Live Support



Customer Ongoing Maintenance and Support

- ◆ 365/24/7 Customer Support
 - Phone and email support
 - Customer web portal included
- ◆ SmartCOP software updates included



System Architecture – SmartCOP will provide a managed, AWS GovCloud hosting environment for production, testing, and training servers. In addition, SmartCOP will host Disaster Recovery in a geographically separated AWS GovCloud instance. SmartCOP utilizes comprehensive compliance controls within AWS. This includes Discovery & Vulnerability Assessment, Exploitation, Analysis & Reporting via services such as Cloud Watch, GuardDuty,



Inspector, & Security Hub. AWS supports 143 security standards and compliance certifications, including PCI-DSS, HIPAA/HITECH, FedRAMP, GDPR, FIPS 140-2, and NIST 800-171. With AWS, you can easily spin up massive on-demand clusters of computer resources in minutes and quickly gain the information you need to effectively meet mission goals. If the agency prefers to host the production themselves, and have SmartCOP host the test, training, and disaster recovery servers, we can provide a hybrid deployment model.

SmartCOP Qualifications and Experience

SmartCOP, Inc., located in Pensacola, Florida, has been providing public safety software solutions for more than 25 years. Development of SmartCOP software began in 1988 with the first installation of a Civil Process Management application for the Escambia County (FL) Sheriff's Office. Development continued for several more years before the creation of SmartCOP, Inc. in 1999. **SmartCOP has earned a first-rate reputation through our years of experience of implementing our public safety software solution for state and local government agencies and working closely with law enforcement throughout the country.**

SmartCOP offers a fully integrated, multi-agency, COTS, suite of public safety solutions, including **Crash and Traffic Reporting, Mobile Computing, Records Management System, Computer-Aided Dispatch, and Jail Management System**. Our solutions share a single database resulting in the most efficient processing of data across the full product suite.

SmartCOP has deployed similar systems to what WV DOT is requesting. We partnered with the State of Montana to provide a statewide Crash Reporting system that is used by all agencies in the state. This system allows any agency to complete crash reports within our application or to send reports to our system from their own RMS. It requires validation of all data elements and edit checks.

SmartCOP has a proven record of accomplishment for successfully implementing statewide law enforcement solutions. With **twenty-seven (27) state implementations**, we have been long-time partners with state level agencies in **Florida, Georgia, Montana, South Carolina, Kansas, Colorado, and Tennessee**. **In 2025, SmartCOP contracted with WVDNR to provide Evidence Management, and we are now working with them to implement Records Management, Case Management, and Field Based Reporting**. We work closely with our agencies to ensure our software continues to meet all state requirements. We intend to provide the same high-quality solution to WVDOT, and we strongly believe that we are uniquely qualified to perform the work outlined in this RFP. In fact, the solution SmartCOP implemented at the Florida Highway Patrol serves as a model for other state law enforcement agencies across the nation.

We are driven by a singular objective: to wholeheartedly support the missions of the agencies we serve. To achieve this, we go above and beyond to ensure that our clients do not merely view us as a vendor, but as a true partner in their success. Through forging enduring partnerships, we implement and maintain software systems that not only address current needs but also look toward the future. By aligning with agency goals and aspirations, we consistently deliver results that exceed expectations. **SmartCOP is proud to say we have a 99% customer retention rate.**

The examples provided below illustrate SmartCOP's extensive experience in implementing a state-wide crash and citation solution and clearly meets the requirements set forth by WVDOT.



Examples of SmartCOP’s state agency level expertise:

• **State of Florida.** SmartCOP provided the State of Florida with its very first electronic:

- Traffic Crash Report
- Traffic Citation
- Citizen Demographic Report
- Commercial Vehicle Enforcement Citation
- Boat Accident Report (meets all BARD standards)
- Boating Citation
- Resource Citation
- Incident Reports
- Various conservation enforcement reports
- Booking/Arrest Report

Florida Highway Patrol writes hundreds of thousands of citations and crash reports each year using our Field Based Reporting tool.

• **State for Georgia.** SmartCOP provided the State of Georgia with its very first electronic public safety solution as follows:

- Traffic Crash Report
- Traffic Citation
- Incident Report
- Boat Accident Report (BARD)
- Boating Citation
- Resource Citations and Warnings
- And many other more

• **GA Department of Natural Resources (GA DNR)** was completely paper based prior to SmartCOP implementation. The project allowed GA DNR to migrate to its very first electronic:

- Hunting Accident Report
- Boating Accident Report
- Boating Citation
- Incident Report
- And many other reports.

• **State of Montana.** SmartCOP provided the State of Montana with its very first electronic:

- Statewide Traffic Crash Reporting System
- Traffic Citation (Notice to Appear)
- Incident Report
- Boat Accident Report (meets all BARD standards)
- Boating Citation
- Resource Citations and Warnings
- And many other reports mentioned above.

Project Team Experience

SmartCOP will provide all implementation and training services to WVDOT as the prime contractor. SmartCOP does not anticipate using Subcontractors for this project. SmartCOP’s project team consists of dedicated and highly experienced employees that come from several advanced technology corporations as well as public safety backgrounds. Each SmartCOP project is managed with **Executive Oversight** by the Project Implementation Team. The Project Implementation Team is led by a **Senior Project Manager, who is accountable to Executive Oversight**. The Project Team also includes **Business Analyst, Database Administrator, Trainers, and Developers**. The SmartCOP Project Team is comprised of talented employees who bring a wealth of knowledge, both technically and on the proposed products and services. Not only does our team have superior knowledge of our products and services but also of the Public Safety Software industry as a whole.



Executive Oversight



Steven Williams, Executive Vice President, PMP

Steven is a strong leader and manager with over 18 years' experience working for SmartCOP, Steven has worked his way up to becoming SmartCOP's EVP. He earned both an MBA and Master of Science, Information Systems from the University of Colorado and holds a Project Management Professional (PMP) certification. Steven will have direct oversight to the SmartCOP Project Manager.



Juan Fraga, Director of Professional Services

Juan brings a unique understanding and real-world public safety experience to his work at SmartCOP based on his years as a dispatcher for the Pensacola Police Department. Juan has been part of SmartCOP since 2001 and has served in many different positions. As the Director of Professional Services, he manages the implementation team. He also

Project Manager

For each implementation, SmartCOP assigns an experienced **Project Manager**, who serves as the single point of contact for managing the successful implementation of the project. The PM will have oversight from our Executive Vice President, a certified PMP, and the Director of Professional Services. The PM assigned is responsible for reporting project status, accomplishments, obstacles, etc., to the executives on a biweekly basis. The PM for WVDOT will be **Richard Loza**. Richard has 30 years' public safety experience and is highly skilled project manager at managing complex public safety software installations. He came to work at SmartCOP in January of 2023 after retiring with 20 years of service from the United States Navy as a Corpsman and EMT. During his service he worked as an Aerospace Medical Technician culminating with his assignment to the Navy Flight Demonstration Squadron, The Blue Angels. Richard worked as an EMT/ Explorer for Los Angeles County Fire and the Pensacola Police Department as a Dispatcher and Records Clerk. As a Project Manager, Richard has been highly successful managing projects for agencies large and small. Richard is detail-oriented and methodical in his approach to every project he manages. His ability to identify and resolve issues quickly to avoid risks to the project timeline can be accredited to his attention to detail on every project. He will be a great asset for your agency as you transition to the SmartCOP system. Richard holds a bachelor's and master's degree from the University of West Florida.

Juan Fraga will serve as Executive Oversight as well as the Business Analyst for this project. Juan has been with SmartCOP since 2001, and he brings unique understanding and real-world experience based on his years as a dispatcher for Pensacola Police Department. Juan has previously served as a Project Manager and Trainer. Juan served on the implementation teams for Florida Highway Patrol, South Carolina Dept of Public Safety, Tennessee Wildlife Resource Agency, and many more. Juan holds a bachelor's degree from University of West Florida and is a retired US Navy Air Traffic Controller.

Vicki Floyd will be the Training Manager for this project and will work closely with WVDOT project team to develop a detailed training plan that will meet the needs of the agency. Vicki has 30 years' experience with the Santa Rosa County Sheriff's Office before joining SmartCOP in 2003. Vicki has completed well over 100 training installations and has served as both a Project Manager and Training Consultant on earlier projects. Vicki has worked on projects with FHP-Dept of Environmental Protection, Colorado Parks and Wildlife, Gwinnett County Sheriff's Office, and many others and will bring a wealth of knowledge to this project.

Chris Gray will serve as the Database Administrator for this project. Chris has been with SmartCOP since 2005 and has worn many hats within the company. Chris started out as a Support Specialist before moving up to System Analyst, then Customer Support Manager before becoming Database Administrator. Chris is responsible for coordinating the technical team, AWS GovCloud deployment, database sizing and



setup, manages production and training servers, develops interfaces, data conversions, maintains backups and disaster recovery plans. Chris has previously worked on projects with FHP-Dept of Environmental Protection, Montana Highway Patrol, Kansas Highway Patrol, Colorado Parks and Wildlife, and many more. Chris holds an MS, Information Technology from Florida State University, and a bachelor's in communication arts from University of West Florida.

Resumes have been included in Section 7-Project Organization of this proposal.

Proposed Project Organization

See Section 6 Project Execution & Section 7. Project Organization of this response for further details.

SmartCOP's project methodology focuses on utilizing defined industry and program management best practices. We have extensive experience in implementing our solutions into complex public safety agencies. In addition, each project is managed and implemented by highly qualified SmartCOP employees.

SmartCOP methods are process-based and activity-based and include key roles based on the Project Management Body of Knowledge (PMBOK) and the System Development Life Cycle (SDLC).

Our project methodology ensures meticulous resource scheduling and availability throughout every project we undertake. The Project Manager dedicates 50% -75% of their time to meticulously oversee the project, ensuring timely completion of tasks and leading weekly status review calls. This proactive approach allows us to address any issues promptly and secure resources efficiently. Our commitment to the successful and timely implementation of your project is unwavering. We are fully dedicated to providing the necessary resources, time, and attention to ensure seamless project delivery within budget.

Each SmartCOP project is managed with **Executive Oversight** by the **Project Implementation Team**. The Project Implementation Team is led by a **Senior Project Manager**. The Project Team also includes **Business Analyst, Database Administrator, Trainers, and Developers**. The SmartCOP Project Team is comprised of talented employees who bring a wealth of knowledge, both technically and on the proposed products and services. Not only does our team have superior knowledge of our products and services but also of the Public Safety Software industry as a whole.

SmartCOP has extensive experience implementing our solutions in large state agency deployments and we will be providing a phased approach with an initial Pilot implementation. WVDOT will identify the agencies that will be part of the initial pilot. Going forward, the Pilot Phase will serve as a guide for all subsequent phases of the project, until all agencies are brought live on the SmartCOP system.

SmartCOP's 5- Phase Implementation Approach

SmartCOP will follow a 5-Phase Approach for the initial Pilot Phase for WVDOT. The 5 phases include: **Project Initiation, Preparation/Planning, Configuration/Execution, Implementation, and Closing.** A project work plan will be developed defining each task within each phase of the project. A timeline will be provided and attached to each task in order to ensure that the project stays on track. Any deviations from the project timeline will require approval and sign-off from the WVDOT project team.

Subsequent agencies will be brought live in similar fashion, in the order determined by WVDOT. **The goal is to have all agencies live within 27 months of the initial project start date.**

Phase 1 – Project Initiation. The SmartCOP Project Team and WVDOT's Project Team will be established and together a Project Kickoff Meeting will be held. The final scope of work, project work plan, stakeholder engagement plan, team communication plan, change management plan, and risk management plan are among some of the activities that will be finalized during this phase.

Phase 2 – Preparation/Planning Phase. During this phase, our team works together with the agency to create a list of implementation tasks necessary for project success. Tasks include a Business Process



Review, knowledge transfer plan, data conversion/migration plan, testing plan, training plan, go-live deployment plan, and post go-live support plan. Data is collected for data conversion, interfaces are identified and define along with any customizations, site surveys are conducted and system design meetings will be held.

Phase 3 - The Configuration/Execution Phase -Most of the work will occur during the configuration/execution state. In this stage SmartCOP will deploy the AWS GovCloud hosting environment, configure remote connectivity, install and configure software, convert legacy data, develop interfaces, conduct system testing to include (but not limited to) functionality testing, data conversion testing, interface testing, system performance testing, etc. Rework data conversion as needed, resolve any interface and functionality issues documented during testing. Plan go-live and cutover processes,

Phase 4 - The Implementation Phase -This phase occurs in conjunction with the Configuration Phase and consists of constant monitoring by SmartCOP's Project Manager. Tasks include monitoring and updating the project plan to ensure project stays on track, weekly status meetings continue to occur, resolve any project-related issues, train system administrators and end-users, train agency trainers to assist during go-live, testing is complete and accepted, execute cutover and go-live, Post go-live period.

Phase 5: The Closing Phase - The final phase of the project occurs when all tasks are finished, the post go-live period has expired and the project is complete. An essential element of this phase is the conclusion of services by the Implementation Team and the transition of ongoing client support to our Technical Support Team. Tasks include final review and sign off, hand-off meeting to Technical Support, and an introduction to Customer Success Manager.

The SmartCOP Advantage

- ◆ **Dedication to Public Safety Software**
 - SmartCOP is 100% dedicated to developing and supporting public safety software solutions for state, local, and municipal agencies. Our solutions provide a single database of record resulting in the most efficient end-to-end processing of data across the full product suite.
- ◆ **Feature Rich Solutions**
 - Our feature-rich, COTS, integrated, multi-agency, multi-jurisdictional systems are based upon advanced, yet proven technology derived from current industry standards and best practices. Our software suite helps our customer agencies improve officer safety and enables more efficient use of resources by eliminating duplicate data entry.
- ◆ **Technology Leadership**
 - SmartCOP consistently demonstrates the ability to understand and meet our customers' requirements. We consistently provide leading-edge solutions. Whether the agency is seeking an on-premise solution, cloud-hosted, or hybrid, SmartCOP can provide the technical expertise to design the infrastructure that best meets the agency's needs and budget, while maintaining CJIS compliance. We are a partner that represents technology vision and strategy.
- ◆ **Superior Support**
 - The main priority of SmartCOP's Agency Support team is to meet the needs of the agency when problems occur and assist in keeping the system in operation and running smoothly. This is why SmartCOP offers 24-hour support, 7 days a week, 365 days each year. In addition, SmartCOP assigns the agency a **Customer Success Manager** that will work with the agency on any issues, schedule software updates, assist with training needs, and perform periodic site visits.



3. SMARTCOP'S PROPOSED SOLUTION

Provide a detailed narrative description of the Vendor's proposed solution which describes how the Vendor's proposed solution addresses the requirements of WVDOT as outlined in this RFP. Utilize screen shots and other visuals as appropriate.

In the following pages, we have provided detailed descriptions of the solutions we will be providing WVDOT including **Crash and Citation Reporting, Administrative Solution, and Reporting and Analytics** and how they meet the goals and objectives set forth by WVDOT.

WVDOT Crash Reporting Goals/Objectives	SmartCOP Response
A solution that supports crash record data collection by law enforcement in the field.	Supported. Crash and Citation Reporting offers a crash module that support crash data collection, diagramming, reporting, and transmitting crash reports.
Compliant with NHTSA and MMUCC.	Supported. Crash reporting is compliant with NHTSA and MMUCC.
Ability to identify location of crash or citation by placing a pin on a map.	Supported. SmartCOP supports ESRI based mapping and/or integration to WVDOT Location Referencing System
Integrated with WV location referencing system that will automatically locate the crash but ability to override if required.	Supported with integration. We will provide integration to WV location referencing system for locating a crash.
Integration with 3 rd party systems such as barcode readers for license, registration, and VIN to populate information on crash report or citation.	Supported with integration. SmartCOP has the expertise to deliver integration with barcode readers for license, registration, and VIN, and populate information onto crash reports and citation. In addition, mDL our iPhone app has ability to capture mobile driver's license information and populate the reports.
Ability to work offline if necessary	Supported. With FBR, officers in the field can continue to create reports, even when connectivity is lost.
Enhanced integration with other WVDOT and State systems including WV Driver's License system, Vehicle Registration system, and WV Unified Court System	Supported with integration. We are experienced with integrating into state systems, including court systems.
Provide capability of agencies to opt in to sell crash reports and manage the sale of crash reports and price.	Supported. SmartWEB application with modification to base code. SmartCOP will provide capability to manage the sale of crash reports online and integrate with WV State Treasury.
Provide robust and intuitive reporting solution that provides state and LE agencies w/ business intelligence.	Supported. With SmartDATA, we can provide robust reporting and analytics solution that offers custom dashboard, searches, and ad-hoc reporting.



<p>Provide solution that implements logical edit checks to ensure data integrity.</p> <ul style="list-style-type: none"> Enforce cross-field validation rules. Automatically reveal or hide dependent fields Ensure only contextually valid values are available Support complex multi-field logic Real-time feedback to end users on entry errors Allow admin config of validation rules 	<p>Supported through system configuration and validation checks.</p>
<p>Provide API to allow integration between system and local LE agency's CAD and RMS, and other state /local partners-Per Attachment C</p>	<p>Supported with SmartCOP API. SmartCOP has an API that allows integration between systems. Please see responses to Attachment C later in this section.</p>
<p>Attachment A – Crash and Citation Modernization Requirements Completion</p>	<p>Completed. Please see responses in Xcel workbook and Section 4 of this response.</p>

Crash and Citation Management System (CCMS)

SmartCOP's CCMS solution will provide WVDOT with a central database for people, property, places, and vehicles in a single database that enables law enforcement agencies to efficiently manage and track the volume of information received daily.

Multi-Agency Functionality

SmartCOP's CCMS system is both a multi-agency and multi-discipline solution. Our solution meets the agency's preferred functionality of making the system available to other local, and state law enforcement agencies including state judicial systems, Commercial Enforcement officers, Conservation Enforcement Officers, Environmental officers, Agricultural Enforcement, and other law enforcement agencies.

- o Accommodates multiple agency jurisdictions through a unique report numbering system.
- o Accommodates agency specific system configurations.
- o Reporting tools for individual agencies
- o Each agency can have their own system administrator for adding and removing system users.

Field Based Reporting - Crash and Citation Reporting

The **Field Based Reporting (FBR)** module provides the mobile officer with all the tools needed to perform discovery, documentation, and reporting tasks. Each agency may create their own unique validations (edit rules) that control the accuracy of the data being entered by the officer. Only when an officer has completed a report that passes all edit rules will the report be available for a supervisor to approve. This supervisory approval may also be completed from the mobile environment.

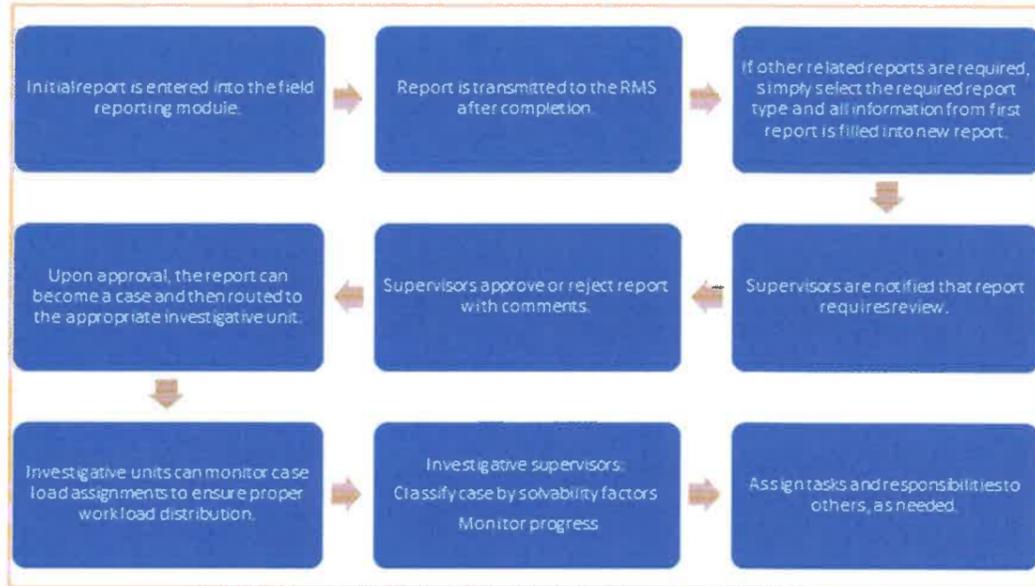
SmartCOP's Field Based Reporting module integrates with the Crash and Citation Management System, and 3rd party RMS solutions, and can operate in a completely disconnected (offline) or limited connectivity state.

This allows users to write reports, issue citations and warnings without delay and then transmit these reports when data connection becomes available. Officers can perform all their reporting duties in a disconnected mode. Officers may search within their locally stored data as well as enter data on forms/reports. When in a disconnected mode, all FBR information is stored securely on the local machine, awaiting transmission to the FBR server once a connection is established.

Customizable Workflows

The system can be configured with built-in workflows that can be utilized to ensure that reports are sent to the appropriate location and assigned. Each report can have a unique approval process and varying level of approval based on agency requirements.

For example, crash reports can have multiple levels of approval/review if desired, and the agency can determine which level the report is deemed approved vs. when it needs additional review. Also, several report types provide a separate review process that allows records personal the ability to review the contents to ensure that they meet state reporting needs prior to sending them to the state.



Crash Report

SmartCOP's Traffic Accident / eCrash module provides a complete, **state-compliant crash reporting** solution that is **100% MMUCC compliant**. In addition, SmartCOP's crash reporting solution will comply with West Virginia State Code and Administrative Rules, American Association of Motor Vehicle Administrators (AAMVA) policies and standards, and other relevant requirements of NHTSA and Federal Motor Carrier Safety Administration (FMCSA).

The e-Crash software captures data from the RMS/mobile data system and auto-populates the applicable information into an electronic version of the crash form. Officers can **paste information from State/NCIC**, print driver's exchange forms, and use configurable pick lists for streamlined data entry.

The system supports **driver's license scanning** and is compatible with various diagramming programs, including full integration with [Easy Street Draw](#).

As part of the Crash Report module, we also provide the ability to create a **Reconstruction Report** for detailed crash reporting involving traffic fatalities.

Additional reporting includes **Tow Receipt, Inventory forms, Speed Device Logs, and Citizen Contact logs**.

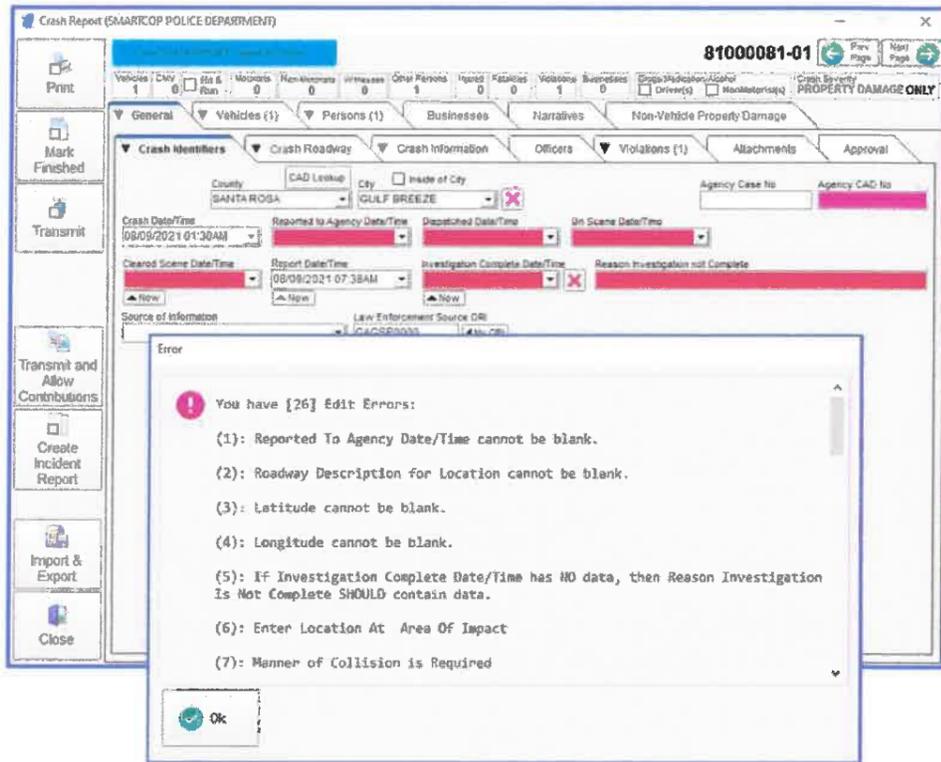
Plus, officers can easily issue citations that result from the crash with the click of a button.

Accident Report Input Form

Crash Report with integrated diagramming software

Crash Report Validation

The Traffic Crash Report utilizes the validation component that ensures the information on the report submission is compliant with all investigation standards, all state standards and meets all MMUCC compliance standards.



An example showing validation errors on a traffic accident report

Certain printouts can be configured to be an exception and may be printed. This includes a Driver Exchange Form for a Traffic Crash. This supports the normal “investigation” process for a Traffic Crash. The user would normally gather information on the crash, enter in certain “exchange” information, and print the exchange information for the participants, clear the scene, and then later complete the official report. Note: A full traffic crash report cannot be provided until the report review and approval process is completed.

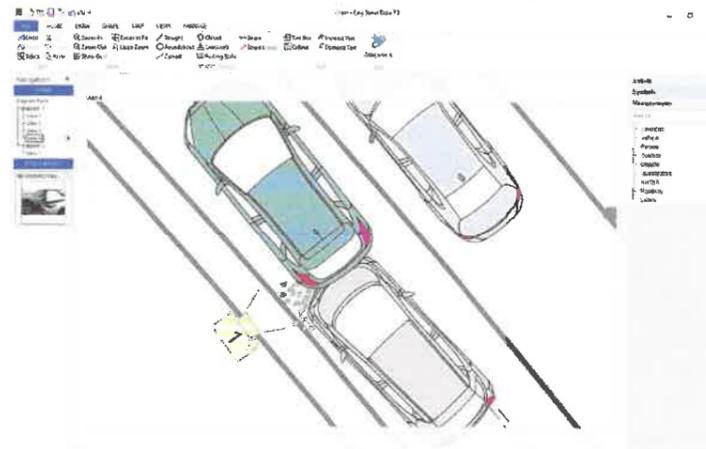
As with all reports/forms in the FBR system, the Traffic Crash Report can only be finalized and submitted for review and approval after the report has successfully met all Error Validation rules.

Easy Street Draw

Discover the Leading Crash Diagramming Software for Law Enforcement on the Market.

Easy Street Draw makes crash diagramming fast, easy, and accurate. Designed for law enforcement, state agencies, police, sheriffs, and more, it helps turn complex crash details into clear, professional diagrams in minutes.

The software is simple to use and integrates SmartRMS. Easy Street Draw ensures speed and accuracy in documenting crash scenes effortlessly.





Crash Report Online Sales

SmartCOP is providing the capability to manage the sale of crash reports online. SmartCOP's SmartWEB solution will be configured to provide WVDOT LE agencies with the ability to sell crash reports online. The user will be able to link to SmartWEB page, through the agency's website. Agencies can choose to opt-in or opt-out of this feature. In addition, the LE agency will be able to set their own price for crash reports.

The agency will be able to choose the types of crash reports, photos, and attachments that are available for sale online and which ones are not. For example, an agency may want to withhold a crash report that ends in fatality while the investigation is happening.

SmartCOP will integrate this module with WV State Treasurer's Office merchant services systems for collection of fees.

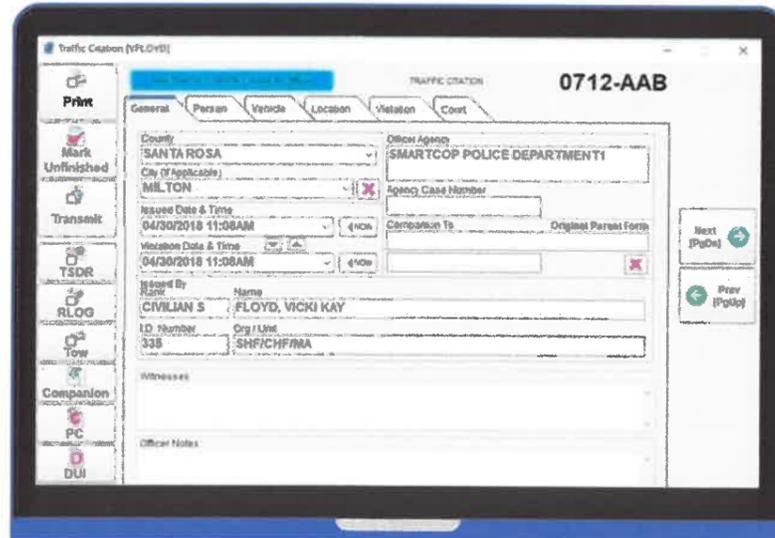
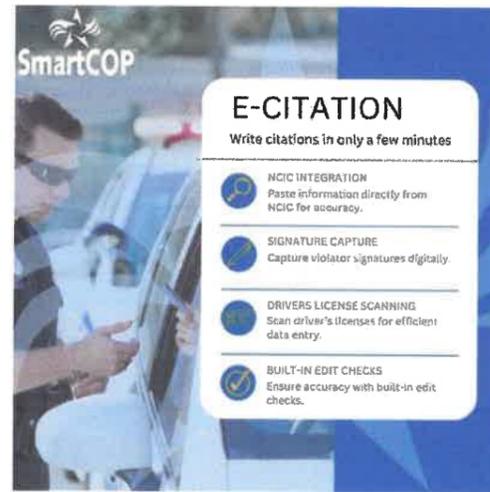
E-Ticketing System (Citations)

The FBR Client and FBR Server system includes an e-ticketing system. The system generates traffic summons (citations) that conform with state guidelines. Easily complete the form with information from DMV and NCIC. Includes court scheduling and fine amounts for every county, as well as the capability to complete roadside payment collection by credit card.

SmartCOP's e-Citation system supports the recording, issuing, tracking, and reporting of citations in compliance with state laws. Citations include motor vehicle citations, DNR citations, and public service citations.

Features include:

- Powerful search tools combine local and state queries for easy report population
- NCIC, state, and local warrant searches
- Offline ticket entry and data entry validation
- Swipe driver licenses with card reader
- Street name pre-population using GIS/GPS with click of a button
- Officer electronic signature
- Ticket history available for repeat offenders
- Data entry defaults
- Comprehensive data edit rules and validation
- Automatically calculate fine amounts based on violation and county
- Issue multiple citations during same traffic stop in a matter of seconds (few clicks)
- Bluetooth capability for wireless printing



Create Citations on a Laptop or iPad



◆ **Software for Life**

- Software for Life Policy SmartCOP is committed to providing clients with the best investment possible through our comprehensive maintenance and support agreement. This means you always have access to the latest features, security enhancements, and performance optimizations, keeping your operations efficient and up to date. All software upgrades are provided to all agencies on an active maintenance plan for no additional costs.

◆ **Dedicated Team & Leadership**

As a company, we are a flat and nimble organization. The overall organization is one of cooperation and cross-communication. SmartCOP's team of dedicated and highly experienced employees come from several advanced technology corporations as well as public safety backgrounds. In fact, the SmartCOP solution is the design of a former law enforcement professional, currently the Vice-President of Product Strategy.

◆ **Sourcewell Awarded Vendor**

SmartCOP holds an active cooperative purchasing agreement with Sourcewell, providing government agencies and entities with a simplified solution to meet RFP procurement requirements. Through a competitive RFP process, SmartCOP was awarded a contract with Sourcewell in 2021, and again in 2025.





Security Access Profile - SmartCOP is a permission-based system whereby system users are required to have a username and password, providing access control at the application and data level. The username is linked to a security profile that determines what information a user can view, edit, add, and delete, and what reports a user can print. The system administrator has full control of what a user can and cannot do in the system.

Additionally, the customer has the option to integrate desktop application access into Windows Active Directory, allowing for a single login to provide application access authentication.

SmartCOP conforms to the FBI/CJIS Security Policy requirements for access to criminal justice information by requiring each user accessing the system to have a unique username and strong, encrypted password, and Two-Factor Authentication which must be changed on a periodic basis.

Role Based Permissions: Role based access is available and controls user permissions for the agency defined roles. For example, agencies can determine permission settings for resource officers in general. The agency decides what permissions a resource officer will be given and can then apply that "role" to any new user that needs those permissions thus eliminating the need to configure individual permissions for each user.

The personnel module, Employee Master File includes the creation of user profiles for each employee accessing the SmartCOP system. User profiles contain a login name, password, and security settings. Every system user is required to have a username and password. When a user logs in to any application, the security settings are verified for their login name. If they have access to the application, functionality will be limited as set in their user security profile.

Only personnel with appropriate security access can change security levels for users.

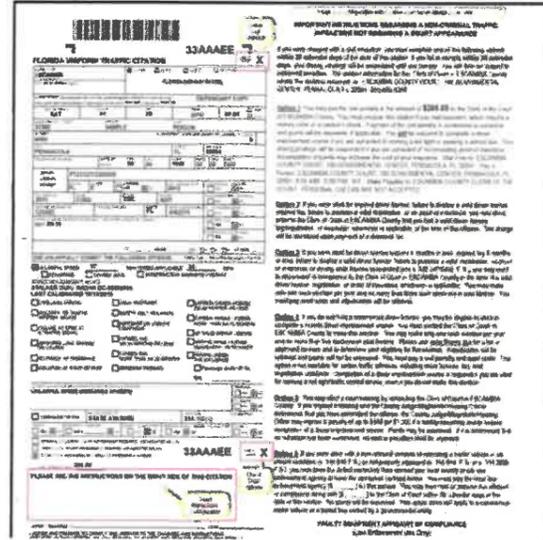
Security access levels can be set per application (CCMS, FBR, Employee Master File, etc.) or per menu option (set access levels, change unit ID, report approval, etc.). For each security option, different levels of access may be granted. A read-only access level can also be set. This allows personnel access to information without the ability to modify it. For example, an officer can be given full access to view/edit reports but not approve them.



- Secure data sharing
- Designed for laptops & Windows tablets
- Court scheduling
- Payment Collection

Traffic Enforcement Reports

- E-Citation
- Traffic Citations
- DUI Citations
- Traffic Warnings
- Vehicle Pursuit
- E-Crash
- Traffic Crash Reports (MMUCC compliant)
- Vehicle and Vessel Tow Receipt
- Racial Profiling Tracking
- Radar Log (multiple device tracking)



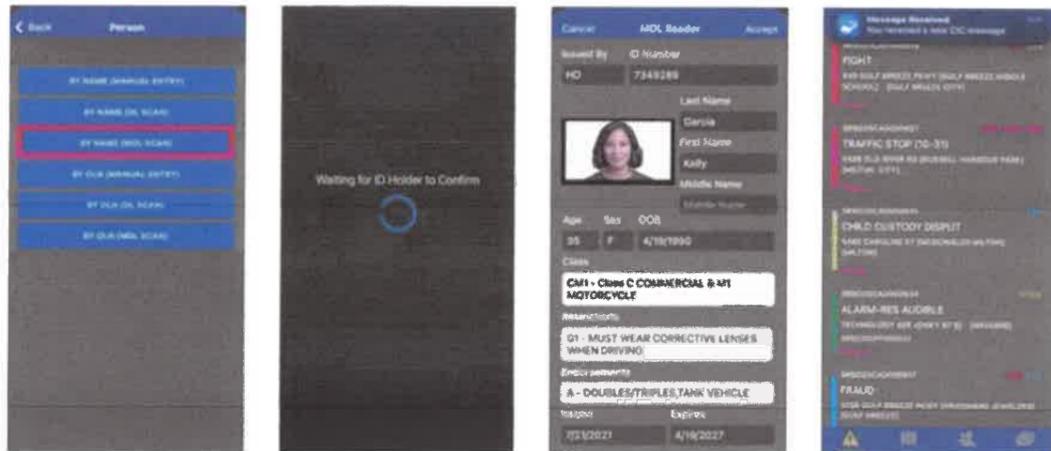
Speed Device Log

Each officer can keep a log of their speed measurement devices and the daily calibration checks. Every citation that is written can be automatically added to the log. The log can then be printed for support in court.

Mobile Driver's License (mDL)

SmartCOP provides a fully integrated mobile driver's license (mDL) interface designed specifically for law enforcement agencies, enabling secure acceptance and use of digital driver's licenses during traffic stops.

- Direct Integration: Works with SmartCOP's FBR.
- Secure Digital Capture: Officers can securely scan and capture driver's license data directly from a driver's mobile device.
- Automatic Data Transmission: Captured data is transmitted directly into the agency's system, eliminating manual typing or re-entry.





Administrative Module (SmartADMIN)

SmartCOP's Administration Module (SmartADMIN) is a single centralized enterprise management module that is used to configure and control access to Crash and Citation Reporting, Analytics and other features. Users must have special administrative permissions to access the centralized enterprise management functions.

SmartADMIN consists of the following modules:

Employee Master File – used for personnel management, the Employee Master File tracks, records personnel information, and plays an integral role in the entire suite. All applications use information from the Employee Master File to assign officers to reports and other records and to identify personnel and equipment. In addition, security profiles for each employee are created in this application. Paging and ID Cards are also supported in the Employee Master File.

Personnel details such as name, Unit ID, Vehicle ID, PIN, or badge number can be used to locate specific personnel and/or units.

Personnel records include the following details:

- Name (Last, First, Middle) Title
- Agency
- Troop
- District
- Default Zone Assignment
- Hire date
- Termination Date and Reason
- Radio/Unit ID
- Personnel identification #
- Social Security Number
- Security Access Profile
- Sworn/Non-Sworn
- Rank
- Badge number
- Vehicle ID/tag number
- Home address, telephone numbers
- Race, Sex, Date of Birth, Blood Type
- List of special skills (K9, bilingual, etc.)
- Emergency contact information
- State/NCIC certification date
- Remarks



EXAMPLE OF PERSONNEL MANAGEMENT APPLICATION



Analytics and reporting (SmartDATA)

SmartDATA is an indispensable, analytical tool used by agency supervisors, analysts, executives, and command staff to manage and extract critical data that public safety agencies use every day. SmartDATA allows users to Find, View, Map, Analyze, Report, Extract, Measure and Compare data from anywhere in the SmartCOP system. Map-based information is provided and enables command staff to quickly make informed decisions about where to focus personnel and other resources.

SmartDATA is a single point of access to all data collected and stored by the SmartCOP integrated suite of applications, including CCMS, FBR, and Employee Master File, and turns that data into meaningful information that provides insight and enhances decision making. Data is represented in a grid, graphical display (pie charts, graphs, etc.), and multi-layer maps. Data can be printed, exported (xls, .xlsx, .csv, .txt, .html, .xml) or mapped.

- ◆ Find
- ◆ View
- ◆ Map
- ◆ Analyze
- ◆ Report
- ◆ Extract
- ◆ Measure
- ◆ Compare

Interactive Dashboard

SmartCOP's Analytics and Reporting software is an indispensable dashboard application used by agency supervisors, analysts, and command staff to manage and extract critical data for comprehensive reporting. This application offers real-time data visualization. SmartDATA allows the agency to make informed decisions and effectively allocate resources as well as help to identify trends and patterns in policing.

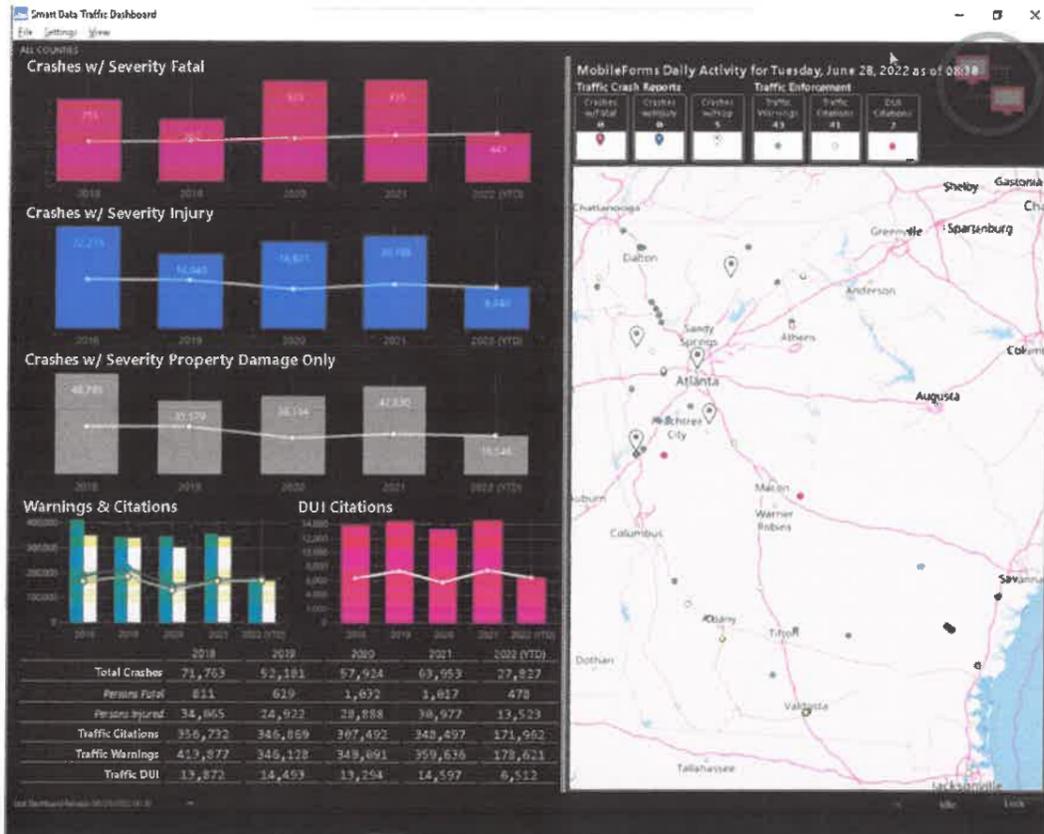
Customizable Reports

The single data entry format of SmartCOP's Analytics and Reporting software allows personnel to access their entire database in one search and utilize all relevant records for customized reports. Using Crystal Reports, agencies can create a report and then add the report to the SmartREPORTS module.

Due to the open architecture and available data dictionary, the agency can also utilize third-party tools such as Crystal Reports to query and report on anything in the system.

Features include:

<ul style="list-style-type: none"> ◆ Intelligence-led policing ◆ Intuitive data analytics and extraction package ◆ Geared to agency supervisors, analysts, and command staff ◆ Agency controlled permissions ◆ Instant access to data from CCMS ◆ Supports xls, .xlsx, .csv, .txt, .html, .xml export formats ◆ Data can be printed, exported, or mapped ◆ Built-in workflows ◆ Ad-Hoc/Crystal Reports ◆ Auto-Generate reports ◆ Custom Dashboards 	<ul style="list-style-type: none"> ◆ Platform for quickly building and sharing interactive reports and dashboards ◆ Quick data retrieval ◆ Dynamic reports and dashboards ◆ In-depth analysis ◆ Performance monitoring ◆ Historical data accessibility ◆ Comprehensive reports ◆ Search by individual employee, a supervisor's direct reports, or supervisor's chain of command ◆ Activity Reports ◆ Link Analysis ◆ Pre-defined canned reports
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Link Analysis

When reports are entered by users, the SmartCOP system automatically links entities together within the system. For example, when two persons are added to a report and a relationship is established, the system will connect the two persons by their relationship and make this information available to searchers. A user can then search for a person and see all other people, vehicles, businesses, incident reports, etc., that they have been associated.

Additionally, the system will automatically link all associated reports together based on the case number. When a case report is viewed, all other report types, including other case reports, will be presented and viewable to the user.

Audit Logs

Audit logs generated include password reset, account creation, change in account status, successful & failed login attempts, file access, file modification, deletion, and transfer. Firewall event logs include established VPN connections, VPN session length, idle-timeout & disconnects, login attempts, intrusion prevention and detection pertaining to all firewall policies, config changes. Logs are retained for 1 year.

In addition, within the SmartCOP system there is an audit/tracking system which captures, and record additions, modification, and deletions made in the MCT, CCMS, FBR systems to include when the transaction occurred, the nature of the transaction/change, and who made the change.

Report Date / Time	Report Number	Report Case / CAD Number	Reporting Officer Rank / ID	Reporting Officer Name
05/31/2019 12:28:01		SRSO19OFF000002 / SRSO19CAD000001	CAPTAIN /	SNYDER, MICHAEL E

Date / Time	Sup#	Report Status	Event Type	Record Type	Description	Event By
05/31/2019 12:28:05	01	New Report	ADD REPORT	REPORT	NEW Offense Report CREATED	SNYDER, MICHAEL E
05/31/2019 12:28:05	01	New Report	ADD RECORD	OFFICER	SNYDER, MICHAEL E	SNYDER, MICHAEL E
05/31/2019 12:29:06	01	New Report	ADD RECORD	CHARGE	784.07.2a (COUNTS: 1) S, MISDEMEANOR, F, ASSLT, ON OFFICER FIREFIGHTER EMT ETC	SNYDER, MICHAEL E
05/31/2019 12:30:56	01	New Report	ADD RECORD	PERSON	(SUSPECT) ABBOTT, TANIKA ROSE	SNYDER, MICHAEL E
05/31/2019 12:32:06	01	New Report	ADD RECORD	PROPERTY	(EVIDENCE) FIREARM HANDGUN (SEMI-AUTO) GLOCK 27	SNYDER, MICHAEL E
05/31/2019 13:14:57	01	New Report	ADD RECORD	PERSON	(VICTIM) WILLIAMS, JASON DONOVAN	SNYDER, MICHAEL E
11/06/2019 10:18:56	01	New Report	ADD RECORD	REPORT PICTURE		SNYDER, MICHAEL E
11/06/2019 10:26:52	01	New Report	ADD RECORD	REPORT PICTURE		SNYDER, MICHAEL E
11/06/2019 10:26:59	01	New Report	ADD RECORD	REPORT PICTURE		SNYDER, MICHAEL E
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11/06/2019 13:26:25	01	New Report	ADD RECORD	ATTACHMENT		SNYDER, MICHAEL E
01/26/2021 14:59:57	01	New Report	ADD RECORD	ATTACHMENT		SNYDER, MICHAEL E
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01/26/2021 15:58:52	01	New Report	ADD RECORD	NARRATIVE	(INTERVIEW) SUBJECT INTERVIEW	SNYDER, MICHAEL E
01/27/2021 10:21:24	01	New Report	ADD RECORD	OFFICER	WILLIAMS, TOM T	SNYDER, MICHAEL E
01/27/2021 10:39:55	01	New Report	ADD RECORD	TASK	(INTERVIEW) (3 (MEDIUM)) (NOT STARTED) (INTERVIEW PERSON ACROSS FROM THE HOUSE IN QUESTION)	SNYDER, MICHAEL E
01/27/2021 10:43:02	01	New Report	ADD RECORD	TASK	(FOLLOW-UP) (NOT STARTED) (FOLLOW-UP ON THE STATUS OF INVESTIGATION)	SNYDER, MICHAEL E
01/27/2021 12:11:17	01	New Report	ADD RECORD	JOURNAL	(INVESTIGATIVE NOTES) INITIAL INVESTIGATOR NOTES	SNYDER, MICHAEL E
01/27/2021 14:58:44	01	New Report	ADD RECORD	VEHICLE	(IMPOUNDED) (FL) (CK076) (2011) (BUIC) (SIL)	SNYDER, MICHAEL E
02/01/2021 09:29:41	01	New Report	ADD RECORD	NARRATIVE		SNYDER, MICHAEL E
02/01/2021 09:35:16	01	New Report	ADD RECORD	FOLLOWUP REQUEST	(INVESTIGATIVE FOLLOWUP) (PENDING)	SNYDER, MICHAEL E
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02/03/2021 12:39:53	01	New Report	ADD RECORD	ATTACHMENT		SNYDER, MICHAEL E
02/03/2021 12:41:50	01	New Report	DELETE RECORD	ATTACHMENT		SNYDER, MICHAEL E
02/03/2021 13:44:47	01	New Report	ADD RECORD	TASK	(FOLLOW-UP) (3 (MEDIUM)) (NOT STARTED) (INTERVIEWS SOMEONE)	SNYDER, MICHAEL E
02/03/2021 13:58:03	01	New Report	ADD RECORD	BUSINESS	(COMPLAINANT) WALMART	SNYDER, MICHAEL E
02/03/2021 14:06:24	01	New Report	ADD RECORD	PROPERTY	(EVIDENCE) DIGITAL	SNYDER, MICHAEL E

Attachment C

Interface ID	Interfacing System	Interface Partner	Information Exchange	Direction	WV DOT Notes	SmartCOP Response
CR-1	Location Referencing System (LRS)	WVDOH	WV DOT road network and associated feature inventory and attribute information. Utilize location to locate crash on road network and prepopulate road inventory information to extent possible.	Bi-directional		Supported with integration.
CR-2	West Virginia Driver License System	WVDMV	Driver license, identifying and other information for West Virginia drivers. Can be utilized to pre-populate information on driver and passengers with driver license or ID cards	Bi-Directional		Supported. Included in pricing-DMV Interface. Additionally, System supports reading mDL from driver's phones.
CR-3	West Virginia Vehicle Registration System	WVDMV	Vehicle and vehicle owner information for vehicles registered in West Virginia	Bi-directional		Supported. Included in pricing. DMV Interface.
CR-4	VIN Software	Third-Party	Information on involved vehicles from VIN application	Bi-directional	Subscription for third-party VIN solution shall be included as part of Vendor solution.	Supported. Included in pricing. VIN Verification.
CR-5	State Crash Records Database	WVDOH	Full crash report following approval of report by law enforcement agency	Bi-directional (based on acknowledgements)	Include functionality that supports the ability to update information that has changed in vendor solution. Should include record-level message-level acknowledgment of receipt	Supported. Included in pricing. E-Crash Transmittal Interface.
CR-6	WVOT -WV Identity Mgmt System	WVOT	Confirm user access and roles and responsibilities. Provides single sign-on for WV DOT, West Virginia State Police (WVSP), and State Courts.	Bi-Directional		Supported. Included in pricing. Single Sign-On for WV.



ATTACHMENT C

Interface ID	Interfacing System	Interface Partner	Information Exchange	Direction	WVDOT Notes	SmartCOP Response
CR-7	Local Agency Identity Mgmt System -	Multiple Local Agencies	API to support option for a local agency to integrate the local agency identity management solution with the crash reporting application to confirm user access and roles and responsibilities	Bi-Directional (based on acknowledgements)	Software capability: Implementation of a general purpose API for one agency as a pilot included in scope. Any additional agencies	Supported with Integration. Included in pricing.
CR-8	Local Agency RMS – multiple 3 rd parties	Multiple third parties and local agencies	Application program interface (API) to export crash reporting information for import into a local law enforcement agency records for management system	Bi-directional (based on acknowledgements)	Software capability Implementation of a general purpose API one agency as a pilot included in scope.	Supported with integration. Included in pricing. Crash Report Receiver API.
CR-9	EMS Run Form. Dept of Health	Dept of Health	Emergency Medical System trip information associated with a crash	Bi-directional	Run number should be validated and data returned for a valid and matching EMS run report. Crash report and EMS run report should match on certain variables to be defined as part	Supported with integration. Included in pricing.
CR-10	Commercial Motor vehicle applications.	Federal Motor Carrier Safety Admin (FMCSA)	Commercial vehicle information, commercial driver information including electronic logbook data, etc.	Bi-directional	Specific data to exchange to be identified through discussions with FMCSA during system design.	SmartCOP is familiar and has interfaces in place in other states for querying FMCSA as well as IFTA. We will work with agency to quote and implement once the state identifies which queries they would like to make available.

Interface ID	Interfacing System	Interface Partner	Information Exchange	Direction	WV DOT Notes	SmartCOP Response
CR-11	Sale of Crash Reports,	State Treasury Office	Vendor solution will offer user reports for purchase, and the STO will collect the funds.	Bi-directional	STO will receive description of the purchase and amount to be charged, collect the funds from the end user, and acknowledge back to the sales function within the Vendor's solution that funds have been received (and that the reports may now be released to the user) Note: STO will handle disbursement of funds to the appropriate agencies.	Supported with custom development and integration. Included in pricing.
CT-1	WVDOH Location Referencing System	WVDOH	WV DOT road network and associated feature inventory and attribute information. Utilize location to locate citation on road network and prepopulate road inventory information to extent possible.	Inbound		Supported with integration to LRS. Included in pricing.
CT-2	WVDMV-WV Driver's License System.	WVDMV	Driver license information for West Virginia drivers. Can be utilized to pre-populate information on driver being issued citation.	Inbound	New driver license system targeted for implementation by July 2028. Assumption is that the new e-Citation application will integrate with the new Driver License System.	Supported. Included in Pricing. DMV Interface.
CT-3	WVDMV - Vehicle Registration system	WVDMV	Vehicle and vehicle owner Vehicle information for vehicles registered in West Virginia Can be utilized to pre-populate vehicle information for vehicle driven by driver being issued citation.	Inbound		Supported. Included in Pricing. DMV Interface.



ATTACHMENT C

Interface ID	Interfacing System	Interface Partner	Information Exchange	Direction	WV DOT Notes	SmartCOP Response
CT-4	WV Unified Court System	WV Supreme Court	Transmission of citations to court of jurisdiction	Outbound	Targeted implementation, depending on the implementation of the planned replacement Court System	Supported. Included in pricing. Court Citation interface.
CT-5	WV Unified Court System	WV Supreme Court	Adjudicated Citations	Inbound	Targeted implementation, depending on the implementation of the planned replacement Court system.	Supported. Included in pricing. Court Citation interface.
CT-6	Municipal Courts	Multiple	General Purpose API to support transmission of citations to local municipal court to eliminate need to enter citations for courts who have a system that can receive data electronically	Outbound	Provide functionality for one local municipal court to demonstrate functionality; single format that each court system would be required to accommodate.	Supported. Included in pricing. Citation Export API
CT-7	Municipal Courts	Multiple	General Purpose API to receive adjudicated citations from local municipal courts with a system that can submit data electronically	Inbound	Provide functionality for one local municipal court to demonstrate functionality; single format that each court system would be required to accommodate.	Supported with integration. Included in pricing.
CT-8	WV Driver's License System	WV DMV	Adjudicated citations for West Virginia drivers posting to West Virginia driver record	Outbound	New driver license system targeted for implementation by July 2028.	SmartCOP is familiar and has interfaces in place in other states. We will work with agency to quote and implement.
CT-9	WV Driver's License System	WV DMV	Adjudicated citations for out of state drivers transmitted to their state of record via WVDMV solution using AAMVANet	Outbound	Note: New driver license system targeted for implementation by July 2028. Vendor's solution will be the trigger for the action (that the WVDMV system will act u on	SmartCOP is familiar and has interfaces in place in other states. We will work with agency to quote and implement.



ATTACHMENT C

Interface ID	Interfacing System	Interface Partner	Information Exchange	Direction	WVDOT Notes	SmartCOP Response
CT-10	WV Identity Mgmt System	WVOT	Confirm user access and roles and responsibilities. Provides single sign-on for WVDOT, West Virginia State Police WVSP and State Courts.	Bi-Directional		Supported. Included in pricing. Single Sign-on for WV.
CT-11	Local Agency Identity Mgmt System	Multiple Local Agencies	API to support option for a local agency to integrate the local agency (law enforcement and municipal courts) identity management solution with the e-Citation application to confirm user access and roles and responsibilities	Bi-Directional	Software capability. Implementation of a general purpose API for one agency as a pilot included in scope. Any additional agencies would be managed as a scope change. Provide functionality for one local agency to demonstrate functionality.	Supported. Included in pricing.
CT-12	Local Agency records Management System	Multiple third parties and local agencies	Application program interface (API) to export citation information for import into a local law enforcement agency records management system	Bi-Directional (based on acknowledgements)	Software capability. Implementation of a general purpose API for one agency as a pilot included in scope. Any additional agencies would be managed as a scope change.	Supported. Included in pricing. Citation Export API
CT-13	DNR Records Mgmt System -	DNR	Application program interface (API) to export citation information for import into a local law enforcement agency records management system	Bi-Directional (based on acknowledgements)		Supported. Included in pricing. Citation Export API
CT-14	DNR Licensing & Citations Systems -	DNR	Licensing and Citation Data Exchange	Bi-Directional	Note: DNR integration should be	Support. Included in pricing



Product Roadmap

Multiple times a year, SmartCOP releases upgrades to our products that enhance functionality of our solutions. We understand the importance of continuing to enhance our products and provide this in the form of software updates. We constantly improve SmartCOP software applications with new features based on market changes and customer requests.

SmartCOP does not generally disclose its product roadmap plan; however, here are some items that SmartCOP has been working on and has recently released or plans to release in the near future. Please note that this information is proprietary and confidential and should not be released.

- **Mobile Driver’s License (mDL) for Android** –SmartCOP has developed an app for the Apple iOS platform that will allow field officers to capture the information from a mobile driver’s license and populate the citation or crash report. SmartCOP is now working on an Android version of this application.
- **SmartPhone:** Ability to create reports and citations on Apple iOS and Android Smartphone.
- **Ability to run the vehicle tag/plate from a photo.** This feature will allow the officer to take a photo of the license plate from his phone and it run it through NCIC.
- **Hexagon Commercial Vehicle Permits Interface**
- **AI Narrative Integration** – SmartCOP is working on an AI functionality that will allow narrative generation assistance such as from Bodycam footage and voice recordings. This is still in the early stages of development.

Note: SmartCOP does not sunset our product lines.

Maintenance and Support Program

The main priority of SmartCOP’s Agency Support team is to meet the needs of the agency when problems occur and assist in keeping the system in operation and running smoothly. SmartCOP will assign a Customer Success Manager to provide Post Go-Live account management.

Customer Success Manager

The role of the Customer Success Manager is to assist with an easy transition from the Implementation team to the Support team. The Customer Success Manager’s Role is to maintain communication with customers and build a relationship with the agency, discuss any issues the agency is having, inform the agency of any new products and software releases, schedule software updates, assist with training needs, be an escalation point for the agency should there be an issue with support response times, and perform periodic site visits.

Agency Support Team

The Agency Support Team works problems in a priority order and the more information that can be provided when a problem is reported, the quicker a solution can be found. Prompt agency service and resolution are especially important to SmartCOP.

We understand our agencies value their time and expect to have their issues and needs addressed immediately.

In order to ensure prompt support service, SmartCOP adheres to the following principles:

*The
Customer
Success
Manager’s
Role is to
maintain
communication
& build a
relationship with
WVDOT*

- Listen to our agency's concerns
- Respond as quickly as possible
- Think long term – an agency is for life
- Provide proper training for our staff so they know all the software products

SmartCOP support is available 24/7/365 via a toll-free number for an immediate response by a qualified support technician.

Agencies can contact SmartCOP support department via the following methods:



Our technical support department can be reached via a toll-free number at any time. On-call support staff is available outside normal business hours, weekends, and holidays. Customers with a critical support issue after hours will have their call returned within 15 minutes. Non-critical calls will be returned the next business day.



Our technical support department can be reached via e-mail at support@smartcop.com. SmartCOP promptly responds to e-mail inquiries from 7:00 a.m. – 5:00 p.m. (CT) Monday through Friday.



Customers can log support calls and check status through our Customer Web Portal.

When a support call is received, a SmartCOP support technician works with agency personnel to immediately resolve user problems. The support technician will be able to address your issues, including connecting to your system to examine the problem when necessary.

The technician also has access to other SmartCOP support personnel if required. Issues that cannot be resolved immediately are prioritized and escalated.

There are three basic levels of support offered, as described below. In addition to the basic levels, SmartCOP offers email support capability so questions that require supporting documentation can be communicated immediately.

Tiered Support

Used for:

- General questions
- Basic training
- Configuration questions



Includes the following Help Desk Capabilities:

- Fielding all end user requests for assistance
- Creating service requests or trouble tickets for tracking an issue from the initial report through the closure
- Identification of the source of the issue

Referring issues to second-Tier support groups, third-party providers, or in-house application development and support areas for resolution

- Coordinating all warranty or maintenance support with the correct software or hardware vendor

- Maintaining a database of problems and their resolutions used to resolve future issues

When a call is received, a SmartCOP call taker works with the agency to immediately resolve errors using our knowledge base of resolutions. When such resolution is not possible, the call is escalated to Tier 2 or Tier 3 support.



Used for:

- Application errors
- Table errors
- Networking issues
- System lock up or failure



Used for:

- Officer Safety
- Communications Failures
- Incorrect data or information returned to MDC users

With Tier 3 Support, SmartCOP's lead engineer determines the severity of the call and assigns it to the appropriate engineer for resolution. When the call is completed, the engineer notifies the support desk of the solution and notes the solution in the knowledge base. The agency is notified as to resolution and any instructions for correcting the problem.

In the event of system failure, efforts would first be made to bring the system online using telephone support. Further efforts toward resolution would be made using remote access such as dial-up connectivity (if available). As a last resort, SmartCOP staff could arrive on-site within 24 hours to assist with bringing the system back up.

Average Response Times

The average response time is 15 minutes or less. SmartCOP maintains 24-hour software support. When a call is received during normal business hours of 8:00 a.m. to 5:00 p.m. (CT), the response time is immediate. Depending on the nature of the issue and the assigned priority, the call is elevated as needed until resolution.

When a call is received after normal business hours, an on-call support person will return the call within fifteen minutes. It should be noted that priority calls and emergency calls take precedence over routine requests for information.

For non-critical support issues received after 5:00 p.m. or on weekends and holidays, users have the option of contacting support via e-mail or voice mail, which will be returned the following business day.

Response time is defined as the amount of time it takes SmartCOP support staff to return a support call.



Emergency Support Provisions

SmartCOP Support is available 365/24/7. All emergency calls that include Total System Failure and Critical Failures as defined above, will immediately be escalated and staff will work on the issue until there is a resolution.

SmartCOP Support Response Times			
Priority Level	Description	Response Time	Resolution Time
Level One	Total System Failure – occurs when the System is not functioning and there is no workaround; such as a central server is down or when the workflow of an entire agency is not functioning. Issues affecting officer safety.	Telephone conference within (1) hour of initial voice notification.	Staff is assigned and dedicated until issue is resolved
Level Two	Critical Failure – Critical process failure occurs when a crucial element in the system is not functioning that does not prohibit continuance of basic operations and there is usually no suitable work around. Note that this may not be applicable to intermittent problems.	Telephone conference within (3) Standard Business Hours of initial voice notification.	Product patch is immediately initiated. Fix is work-loaded and provided to agency once available.
Level Three	Non-Critical Failure – Non-critical part or component failure occurs when a system component is not functioning, but the system is still useable for its intended purpose, or there is a reasonable workaround.	Telephone conference within (6) Standard Business Hours of initial notification.	Fix is work-loaded in the next product patch and provided to agency once available.
Level Four	Inconvenience – An inconvenience occurs when system causes a minor disruption in the way tasks are performed but does not stop workflow.	Telephone conference within (2) Standard Business Days of initial notification.	Fix is work-loaded on an upcoming release and provided to agency once available.
Level Five	Enhancement Request - Agency request for an enhancement to system functionality.	Determined by SmartCOP product management.	Request is evaluated to determine feasibility and fit. Agency is notified if request is accepted. Accepted requests are work-loaded into future product release



Integration Support

Unlike many other vendors, the SmartCOP system has a unique open architecture, allowing easy integration of third-party software without the use of expensive middleware or customization. Other companies use proprietary formats, forcing customers to work within their system and file format. **Our open architecture facilitates interfacing to other databases, whether data from 3rd party CAD/RMS systems, public safety agencies, local courts, or state information such as the Motor Vehicles Division.** SmartCOP exchanges information from the CCMS to data sharing systems utilizing NIEM-compliant exchange methodologies and is already connected to LinX and N-Dex in numerous locations including other state agencies. SmartCOP cooperates with the agency and other vendors to provide interfaces streamlining public safety mission. Data can be shared among state, county, and municipal public safety agencies. In our 25+ plus years providing public safety software solutions, SmartCOP has written 100's of interfaces for state and local agencies. We seamlessly integrate with State/NCIC, NIBRS, State systems, court systems, and many more.

The system contains an interface manager tool that allows personnel to manage interfaces that are in place and changes that are necessary in their configuration. Since the system is built on Microsoft SQL server, most 3rd party tools that can access SQL server can access the system. Note: all interfaces are reviewed and approved by SmartCOP support staff to ensure data integrity.

API

SmartCOP also has system APIs available that assist in the exchange of information to external systems.

We will provide comprehensive API documentation and ensure real-time and historical data access and support various data types. Additional documentation can be provided in an interactive Workbook version to include in the Developer's Kit. Also provided in the Developer's Kit is an application to mimic the CCMS Webservice used by SmartCOP. This application will provide simulated data for testing applications which leverage the webservice.

Interface Development

Developing and deploying interfaces to 3rd party systems is a team effort. SmartCOP will develop, deliver, and test contracted interfaces as detailed in the project plan. WVDOT will need to provide network connections so that SmartCOP can send and/or receive data from the 3rd party application. With bi-directional interfaces, cooperation from the 3rd party vendor is usually required to make the two systems communicate and send/receive data.

Interface development tasks include:

- **Initiation & Planning.** Initiation activities will be covered within the overall project plan and developed upon award and contracts.
- **Requirements.** Key contacts and data elements will be identified, confirmed, and mapped to the application database.
- **Installation/Construction.** Interface program(s) will be developed, including transformation rules (if any). Iterative development and prototyping are used to ensure that interfaces function correctly in a production setting. Unit, system, and integration testing will be conducted and then deployed to production for system acceptance testing.

The system uses Microsoft SQL Server as the database software, version 2019+. Any reporting engine capable of connecting to this database engine can be used outside of the application as deemed necessary by the Agency.

- **User Acceptance Testing Validation.** Full production functionality will be confirmed with the Agency.



Support and Maintenance:

Interfaces are covered under the maintenance agreement. As 3rd parties change their systems, SmartCOP support will make corresponding changes to said 3rd party interface.

Software Upgrades

Multiple times a year, SmartCOP releases upgrades to our solutions that enhance functionality and provide maintenance updates. Upgrades consist of three types: Major, Minor, and Priority.

Major releases contain significant new development and enhancements to the applications. Major releases typically include database changes in addition to enhancements that affect the version number of the software. SmartCOP will typically release a major update one to two times each year.

It is important to note that SmartCOP goes to great lengths to ensure that upgrades to the product do not disrupt the daily operation of the users. Agency administrators have ample time to review new features and decide whether to implement. In addition, new software releases can be installed on the agency's test/training server for testing prior to upgrading the production environment.

Minor revisions typically occur on a quarterly basis and include a limited number of enhancements along with minor modifications.

Priority updates are not dependent upon a fixed development or scheduling cycle. Priority maintenance repairs are performed as required or as needed and involve issues relating to officer safety, compliance with state mandated requirements, or issues affecting the software that require immediate attention.

When an update is available, the Customer Success Manager will notify the agency that an update is available and coordinate a schedule to install the update. Since SmartCOP will be managing the Cloud Hosted servers, SmartCOP will perform updates at the direction of the agency.

Since our product is an off-the-shelf product and our annual maintenance agreement includes upgrades and releases of our software, our intent is for all customers to be on the same version. However, we understand that some variation is necessary and therefore we support 2 major versions of the product.

Interface Support – As part of the software upgrade, SmartCOP will work with the agency to test interfaces, after any software update, to ensure that they interfaces are functioning properly and information is flowing as required.

Additional Functionality

The additional functionality listed here, we are providing above and beyond the requirements identified by WVDOT. This includes:

- **Mobile Driver's License (mDL) (included in proposal)**– as detailed above, SmartCOP has included mDL application in our proposal to provide WVDOT the ability to capture mobile driver's license information from drivers from any state that comply with the AAMVA standard for mDL.
- **Speed Device Log** - Each officer can keep a log of their speed measurement devices and the daily calibration checks. Every citation that is written can be automatically added to the log. The log can then be printed for support in court.
- **Tow Log / Vehicle Inventory** - Ability to document the wrecker assignment in a dedicated log. The log will track all pertinent incident information, wrecker company assigned, vehicle, storage location, and if vehicle has been placed on a hold.
- **Additional Reporting**
 - **Traffic Warning** – Allows LE to write a traffic warning instead of citation during a traffic stop.
 - **Citizen Assist** – Allows LE to document assistance or interaction with the public. Can easily create a tow receipt from the report with click of the button, when there is a disabled vehicle.



- **Consent to Search**-written consent form for LE officer to obtain permission to search a vehicle during a traffic stop.

SmartCOP also offers these additional modules, priced separately. We are happy to provide more information and pricing to WVDOT if interested.

◆ **Commercial Vehicle Enforcement Report (Optional)**
Report Types Include:

Commercial Vehicle Enforcement Citation

- Safety Violations
- Integrated to Safespect / ASPEN
- Overweight Violations
 - Gross Weight
 - Axle Weights
- Integrated vehicle permitting systems
- Integration with other Field Based Reports

Commercial Vehicle Violation Payment Management System (Optional)

- Track and enter payments for Commercial Citations
- Create payment notifications to carriers automatically
- Automatically create 'Hot List' for violators who have exceeded the payment period

◆ **Commercial Citation Payment System (Optional)**

Commercial Citation Payment System is an added feature that would allow the state to track and enter payments for commercial citations, create payment notifications to carriers automatically, and create a "hot list" for violators who have exceeded the payment period.

- The system can increase the efficiency of the payment staff and accuracy of the payment processing (balanced daily payment reports).
- The system closely follows all Generally Accepted Accounting Principles, including requiring transactions (payment/refund/journal) to modify any citation balance, thereby providing a complete audit trail for each citation up to disposition.
- SmartCOP integrates the payment of Commercial Citations directly into the Citation record, thereby ensuring each and every payment, no matter the payment method, is immediately



posted to the Commercial Citation(s).

- o Any other type of payment adjustment or transaction is also real-time. This includes refunds, NSF payments, overpayments, underpayments, payment plans, review board reductions or credits, payment voids, citation voids, etc. The result is all HotList queries by CMV Troopers are real time. Additionally, SmartCOP provides any positive HotList results to any LE, Trooper (or State Officer) who is running a CMV vehicle tag, VIN, or DOT Number from their MDC Terminal.

◆ Issued Property Management (Optional)

Issued Property functions records and manages information about equipment used by an agency. The system generates a unique identifying number for each item. Purchase and warranty information, inspection, expiration, and unit or employee assignment can be recorded for each item. Employee Master File records are used when assigning equipment to specific employees.

Equipment and supplies assigned to personnel may be tracked for the various bureaus, divisions, and sections, and may include:

- o Uniforms/clothing
- o Ammunition and ordinance
- o Weapons
- o Radio equipment
- o Office supplies

In addition, fixed assets such as office furniture, equipment and other items may be recorded within the system. Inventory of equipment assigned to departmental vehicles is maintained; however, the assignment of this equipment to a vehicle is accomplished using the Fleet Management module.

If the Department uses a bar-coding system to track inventory, equipment may be entered into the system as a new record using a bar code scanner. Similarly, the bar code may be scanned to locate the associated equipment record in the system.

Data entry fields for property items include:

- o Make
- o Model
- o Year Purchased
- o Purchase via grant money
- o Year for replacement
- o Vendor Information
- o Expiration date
- o Assigned employee if any

◆ Fleet Management (Optional)

The system offers a **Fleet Management System** that tracks Department vehicle usage, maintenance activities and schedules, operation and maintenance costs, and work order completion scheduling. The system provides reporting that supports the completion of comparative analyses on a variety of cost items, such as comparing the relative costs incurred over time for two vehicles of the same type. In addition, tracking of a vehicle's Total Cost of Ownership (TCO) is tracked and reported.

Fleet Management records and manages information about every vehicle used by an agency. New and used fleet vehicles, including purchase/warranty information, scheduled maintenance, fuel purchases, and equipment assigned to a vehicle are recorded here. The person or unit to which a vehicle is assigned is also tracked. Fleet Management also tracks the person or unit to which a vehicle is assigned, using Employee Master File records to assign equipment to specific employees.



SmartCOP Licensing

SmartCOP offers flexible pricing models including a Purchase model and Subscription (SaaS) Model. SmartCOP has provided WVDOT with SaaS pricing in the Cost Workbook.

SmartCOP is offering an **Enterprise License** Model for West Virginia DOT.

- Enterprise License: SmartCOP’s Enterprise License is unlimited for all West Virginia law enforcement officers and supporting staff.
- The Enterprise License is scalable, allowing WVDOT to add new LE agencies, LE officers, and supporting staff as needed with no additional costs.

SmartCOP Solutions included in Cost Proposal	License Type
Traffic Records Management System with Citation and Crash Reports Features List: Master Name, Master Business, Master Vehicle, Consent to Search, Citizen Assist	<u>Enterprise Site License</u> Unlimited
Field Based Reporting Features: Crash Reporting, Citations, Consent to Search, Tow Log, Citizen Assist.	Unlimited for all West Virginia Law Enforcement officers
Mapping Solution (integration to Location Referencing System)	Unlimited for all West Virginia Law Enforcement officers
SmartADMIN - Administrative Module Features List: Employee Manager, Permissions, Configuration Manager SmartDATA – Analytics and Reporting	<u>Enterprise Site License</u> Unlimited
mDL (Mobile Driver’s License) for iOS iPhone	<u>Enterprise Site License</u> Unlimited
Trancite Easy Street Draw Client	<u>Enterprise Site License</u> Unlimited users

Excerpt from SmartCOP Subscription License and Services Agreement.

License. Licensor hereby grants to Licensee a limited, non-exclusive, non-transferable license to use and configure the Software Products in object code format solely for Licensee’s internal operations (the "License") for the term set forth in Section 8.1 and subject to the terms and conditions set forth in this Agreement, in consideration for the payment of the fees specified in the Product Schedule & Pricing (attached as Appendix 1), including Annual Subscription Fees. The License includes the right to use and configure only those Software Products listed in the Product Schedule & Pricing (attached as Appendix 1) hereto. Licensee may license additional Software Products through a written amendment to this Agreement specifying an additional subscription fee and signed by both parties. The Software Products may, if applicable, include Other Products that are provided in connection with the software Products pursuant to authority granted to Licensor by such third parties or through sublicense agreements with Licensee.

Req. #	Category	Sub-Category/ Field Name	Business (Functional) Requirement	MVUCC Safe Required?	MVUCC Reference Information	Priority H = High M = Medium L = Low	Vendor Response	Core Modules	Third Party Solutions	Comments/Notes
Crash1	CRASH LOCN	Crash Record Number	<p>Provide support for the creation of a unique crash report identifier (also referred to as the State Case Number) maintained in the statewide crash data repository. This should be the key element to identify a crash record in the State's crash database, should maintain consistency with the existing Crash Record Number (a 10-character data field).</p> <p>Note:</p> <ul style="list-style-type: none"> The unique crash report identifier (also referred to as the State Case Number) maintained in the statewide crash data repository. This should be the key element to identify a crash record in the State's crash database. 			H	Meets the requirement out-of-the-box	Field Based Reporting		
Crash2	CRASH LOCN	Secondary Crash	<p>Provide support for the entry and maintenance of an identifier for entry and maintenance of a Secondary Crash Indicator.</p>			H	Meets the requirement out-of-the-box	Field Based Reporting		
Crash3	CRASH LOCN	DOHCounty	<p>Provide support for the entry and maintenance of a county identifier in which the crash occurred.</p>			H	Meets the requirement out-of-the-box	Field Based Reporting		
Crash4	CRASH LOCN	Crash Location	<p>The system shall provide support for the entry and maintenance of crash location information using a geo-locating tool. This geo-locating tool must be integrated with the State's Linear Referencing System (LRS). The officer must have the ability to override the LRS provided geo-location information as needed.</p> <p>Overview of the required functionality:</p> <p>Provide system support or assistance to law enforcement officers entering crash reports via a geo-locating tool. Generally, law enforcement should be able to open a Location Selector within the crash reporting system, centered on their current location and supported by the current WV LRS dataset (a static snapshot). The system should snap the clicked point to the nearest valid LRS route within the configured tolerance. A temporary marker would appear, allowing the officer to visually confirm the selection. A sidebar or pop-up panel would show derived attributes (route, sub-route, county, latitude, longitude, milepost, direction, etc.), and the officer could review and revise any inaccurate data points. As the officer drags the pin on the map, the LRS attributes would update to reflect their appropriate values. If the officer manually updates the route or milepost, the map would highlight the corresponding segment but would not move the marker unless explicitly requested. If system connectivity is down or the LRS service is unavailable, the tool should rely solely on a locally stored static snapshot of the LRS to calculate attributes.</p>			H	Meets the requirement out-of-the-box	Field Based Reporting		
Crash5	CRASH LOCN	Crash Location (Lat and Long)	<p>Provide support for the entry and maintenance of the Longitude and Latitude coordinates for the crash location. This functionality should conform to the functionality description provided above in the geo-locating tool and be one of the values retrieved from the WV LRS, but also could be overridden by the officer.</p> <p>Note:</p> <ul style="list-style-type: none"> The Lat and Long must be validated (minimally to confirm that the coordinates are within the WV state borders and conform to WVDOT LRS, except in cases where the crash originates on an offroad location (private property crash)) 			H	Meets the requirement out-of-the-box	Field Based Reporting		
Crash6	CRASH LOCN	DOH-Highway Class	<p>Provide support for the entry and maintenance of the type of facility on which the crash occurred (e.g., Interstate, US, WV, County/HARP, City Street, State Park/Forest Road, Private Road, Private Property/Off-Road, or Other). This functionality should conform to the functionality description provided above in the geo-locating tool and be one of the values retrieved from the WV LRS, but also could be overridden by the officer.</p>			H	Meets the requirement out-of-the-box	Field Based Reporting		

Crash7	CRASH LOCN	DOHRoute	Provide support for the entry and maintenance of the route number on which the crash occurred. This functionality should conform to the functionality description provided above in the geo-locating tool and be one of the values retrieved from the WV LRS, but also could be overridden by the officer.	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash8	CRASH LOCN	DOHSubroute	Provide support for the entry and maintenance of the subroute number on which the crash occurred. This functionality should conform to the functionality description provided above in the geo-locating tool and be one of the values retrieved from the WV LRS, but also could be overridden by the officer.	H	Meets with modification to Base Code	Field Based Reporting	SmartCOP has implemented this capability in other states and can make appropriate changes to application to support WV
Crash9	CRASH LOCN	DOHSupplemental Designation	Provide support for the entry and maintenance of a special designation of the route on which the crash occurred (e.g., Not Applicable, Alternate, Spur, Ramp, North, South, East, West, Truck Route, Toll, or Other). This functionality should conform to the functionality description provided above in the geo-locating tool and be one of the values retrieved from the WV LRS, but also could be overridden by the officer.	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash10	CRASH LOCN	DOHMilepost	Provide support for the entry and maintenance of the milepost at which a crash occurred. This functionality should conform to the functionality description provided above in the geo-locating tool and be one of the values retrieved from the WV LRS, but also could be overridden by the officer.	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash11	CRASH LOCN	DOHRamp	Provide support for the entry and maintenance of a field that identifies the entrance or exit ramp on which the crash occurred. This functionality should conform to the functionality description provided above in the geo-locating tool and be one of the values retrieved from the WV LRS, but also could be overridden by the officer.	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash12	CRASH LOCN	DOHStreet/RoadName	Provide support for the entry and maintenance of the Municipal Street name on which a city street crash occurred. This functionality should conform to the functionality description provided above in the geo-locating tool and be one of the values retrieved from the WV LRS, but also could be overridden by the officer.	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash13	CRASH LOCN	DOHIntersectingStreet	Provide support for the entry and maintenance of the nearest intersecting street to municipal street on which a city street crash occurred. This functionality should conform to the functionality description provided above in the geo-locating tool and be one of the values retrieved from the WV LRS, but also could be overridden by the officer.	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash14	CRASH LOCN	DOHOther Description of Location	Provide support for the entry and maintenance of an additional description of the crash location. This functionality should conform to the functionality description provided above in the geo-locating tool and be one of the values retrieved from the WV LRS, but also could be overridden by the officer.	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash15	CRASH LOCN	DOHRelation to Junction	Provide support for the entry and maintenance of the location of the first harmful event of a crash in relation to a specific type of junction. This functionality should conform to the functionality description provided above in the geo-locating tool and be one of the values retrieved from the WV LRS, but also could be overridden by the officer.	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash16	CRASH LOCN	DOHNon-Interchange Junction Type	Provide support for the entry and maintenance of an indicator that specifies whether the crash is the first harmful event and occurs in a Non-Interchange Area. This functionality should conform to the functionality description provided above in the geo-locating tool and be one of the values retrieved from the WV LRS, but also could be overridden by the officer.	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash17	CRASH LOCN	DOHInterchange JCT Type	Provide support for the entry and maintenance of an indicator that specifies whether the first harmful event occurs in an Interchange Area. This functionality should conform to the functionality description provided above in the geo-locating tool and be one of the values retrieved from the WV LRS, but also could be overridden by the officer.	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash18	CRASH GENERAL INFO	Quality Control Review Date	Provide support for capturing the date and time of the Crash Data Quality Review Date for the crash record (this is by/for the Crash Record Number).	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash19	CRASH GENERAL INFO	Crash Amended (Date and Time)	Provide support for capturing the dates and times of the Crash Data record (this is by/for the Crash Record Number).	H	Meets the requirement out-of-the-box	Field Based Reporting	

Crash20	CRASH GENERAL INFO	Date and Time Crash Last Amended	Provides support for easily identifying the date and time of the last change or update made to the crash record (by Crash Record Number).			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash21	CRASH GENERAL INFO	Investigation Completed	Provide support for an Y/N indicator specifying whether the investigation has been completed for the crash record (this is by/for the Crash Record Number). However, allow an authorized user the capability of re-opening and make additional/final revisions.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash22	CRASH GENERAL INFO	Investigation Completion Date	Provide support for capturing the investigation complete date and time (this is by/for the Crash Record Number).			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash23	CRASH GENERAL INFO	Reporting Agency Record Number	Provide support for the entry and maintenance of an agency-specific indicator that identifies a crash report. If the crash report is being entered by a law enforcement officer, this field should be auto-filled based on the law enforcement officer's credentials, but should also be allowed to be changed. Note: • Default for auto-filled number should be 'Off', and only able to be turned off/on by the administrator for the agency.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash24	CRASH GENERAL INFO	Number of Vehicles Involved	Provide support for the entry and maintenance of an indicator that specifies the total number of vehicles involved in the crash. The number of vehicles involved will range from 1-n and each of these Vehicle Numbers (i.e., 1-n) should be present in the crash record in order for the crash record to be considered complete.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash25	CRASH GENERAL INFO	Number of Non-Motorists Involved	Provide support for the entry and maintenance of an indicator that specifies the total number of Non-Motorists involved in the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash26	CRASH GENERAL INFO	Number of Fatal Injuries	Provide support for the entry and maintenance of a field that records the total number of fatal injuries occurring as a result of the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash27	CRASH GENERAL INFO	Number of ABC Injuries	Provide support for the entry and maintenance of a field that records the total number of nonfatal injuries occurring as a result of the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash28	CRASH GENERAL INFO	Date of Crash	Provide support for the entry and maintenance of the date on which the crash occurred.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash29	CRASH GENERAL INFO	Time of Crash	Provide support for the entry and maintenance of the time at which the crash occurred.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash30	CRASH GENERAL INFO	Date of Roadway Clearance	Provide support for the entry and maintenance of the date of first recordable awareness when all traffic lanes became available for normal traffic flow. This field should be enterable and maintain consistency and work in tandem with the Time of Roadway Clearance field.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash31	CRASH GENERAL INFO	Time of Roadway Clearance	Provide support for the entry and maintenance of the time of first recordable awareness when all traffic lanes became available for normal traffic flow. This field should be enterable and maintain consistency with the Date of Roadway Clearance field.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash32	CRASH GENERAL INFO	Date Reported to Law Enforcement	Provide support for the entry and maintenance of the date on which the crash was reported, and law enforcement was dispatched to the scene.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash33	CRASH GENERAL INFO	Time Reported to Law Enforcement	Provide support for the entry and maintenance of the time at which the crash was reported, and law enforcement was dispatched to the scene, be updated in tandem with the Date Reported to Law Enforcement.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash34	CRASH GENERAL INFO	Date of Law Enforcement Arrival	Provide support for the entry and maintenance of the date on which law enforcement arrived at the scene. (Note: This field should allow for law enforcement arrival to occur the next day when the crash occurs close enough to midnight for this to become the next day, and should be validated to ensure it is at or after the Time Reported to Law Enforcement.)			H	Meets the requirement out-of-the-box	Field Based Reporting	

Crash35	CRASH GENERAL INFO	Time of Law Enforcement Arrival	Provide support for the entry and maintenance of the time law enforcement arrived at the scene and would work in tandem with the Date of Law Enforcement Arrival. See Date of Law Enforcement Arrival validation criteria.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash36	CRASH LAW ENFORCEMENT LOCN	RR Crossing #	Provide support for the entry and maintenance of a field that indicates if the first harmful occurs at a Railroad Crossing and the number of the crossing. This functionality should conform to the functionality description provided above in the geo-locating tool and be one of the values retrieved from the WV LRS, but also could be overridden by the officer.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash37	CRASH CONDITIONS	Manner of Collision	Provide support for the entry and maintenance of a field to identify the manner in which two motor vehicles in transport initially came together. This data element should identify the orientation of the two Motor Vehicles In-Transport when they are involved in the FIRST HARMFUL EVENT of a collision crash. If the FIRST HARMFUL EVENT is not a collision between two motor vehicles in-transport, it is classified as such.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash38	CRASH CONDITIONS	Environmental Contributing Circumstance 1 - 3	Provide support for the entry and maintenance of a field to identify the Environmental Contributing Circumstances, i.e., environmental conditions that may have contributed to the crash.	Y	Refer to MMUCC 4th Edition (C14, Contributing Circumstances, Environment)	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash39	CRASH CONDITIONS	Weather Condition 1 - 2	Provide support for the entry and maintenance of a field to identify the prevailing atmospheric conditions that existed at the time of the crash.	Y	Refer to MMUCC 6th Edition Data Element Name: C10, Atmospheric Conditions (Definition)	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash40	CRASH CONDITIONS	Light Condition	Provide support for the entry and maintenance of a field to identify the Light Condition, i.e., the type / level of light that existed at the time of the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash41	CRASH CONDITIONS	Road Surface Condition	Provide support for the entry and maintenance of a field to identify the roadway surface condition at the time of the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash42	CRASH CONDITIONS	Road Surface Type	Provide support for pulling the roadway surface type from the WVDOT LRS System, but allow the user to override if the officer on site sees that the information is incorrect. The field is to identify the roadway surface type for the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash43	CRASH CONDITIONS	Road Surface Type - Other	Provide support for pulling the roadway surface type from the WVDOT LRS System, but allow the user to override if the officer on site sees that the information is incorrect. The field is to identify the roadway surface type for the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash44	CRASH CONDITIONS	First Harmful Event Location	Provide support for the entry and maintenance of a field to identify the location of the first injury or damage producing event as it relates to the roadway for the crash.	Y	Refer to MMUCC 6th Edition Data Element Name: C8, Location of First Harmful Event	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash45	CRASH CONDITIONS	First Harmful Event	Provide support for the entry and maintenance of a field to identify the first injury or damage producing event that characterizes the crash type.	Y	Refer to MMUCC 6th Edition Data Element Name: C7, First Harmful Event	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash46	CRASH CONDITIONS	Road Contributing Circumstance 1-3	Provide support for the entry and maintenance of a field to record the condition of the road which may have contributed to the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash47	CRASH CONDITIONS	Road CC - Shoulder Problem	Provide support for the entry and maintenance of a field to record the condition of the road related to a shoulder problem that may have contributed to the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash48	CRASH CONDITIONS	Road CC - Traffic Control Device Problem	Provide support for the entry and maintenance of a field to record the condition of the road related to a traffic control device problem that may have contributed to the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash49	CRASH CONDITIONS	Road CC - Work Zone Activity Type	Provide support for the entry and maintenance of a field to record the condition of the road related to a work zone activity type that may have contributed to the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	

Crash50	CRASH CONDITIONS	Road CC - Other Related	Provide support for the entry and maintenance of a field to record the condition of the road which may have contributed to the crash.				H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash51	CRASH CONDITIONS	Road CC - Work Zone Activity Type Related	Provide support for the entry and maintenance of a field to record the condition of the road related to a work zone activity type that may have contributed to the crash.				H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash52	CRASH CONDITIONS	School Zone Related - Flashers	Provide support for the entry and maintenance of a field that indicates whether the crash occurred within the boundaries of a school zone or as a result of a back-up of traffic in a school zone.				H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash53	CRASH CONDITIONS	School Zone Related - Type of Sign	Provide support for the entry and maintenance of a field to indicate the type of sign(s) present at the school zone.				H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash54	CRASH CONDITIONS	School Zone Related - Flashers	Provide support for the entry and maintenance of a field to indicate whether the school zone signing had flashing lights and whether they were active at the time of the crash.				H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash55	CRASH CONDITIONS	School Zone Related - SZ Speed Limit	Provide support for the entry and maintenance of a field to identify the speed limit posted in an active school zone.				H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash56	CRASH CONDITIONS	Work Zone Related	Provide support for the entry and maintenance of a field to indicate whether the crash occurred in or was related to a construction, maintenance, or utility work zone, regardless of the presence of workers at the time of the crash. Also, should indicate if the crash resulted from traffic backed-up past the first warning sign of a work zone.	Y	REFER TO MMUCC 6th Edition Data Element Name: C15. Work Zone Element Definition: A crash that occurs in or related to a		H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash57	CRASH CONDITIONS	Work Zone - Workers Present	Provide support for the entry and maintenance of a field to indicate the presence of workers within a work zone at the time of a work zone related crash.				H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash58	CRASH CONDITIONS	Work Zone - WZ Speed Limit	Provide support for the entry and maintenance of a field to record the posted work zone speed limit.				H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash59	CRASH CONDITIONS	Work Zone - Location of Crash	Provide support for the entry and maintenance of a field to identify the location of the crash within the work zone in relation to the Traffic Control Plan.				H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash60	CRASH CONDITIONS	Work Zone - Type of Work Zone	Provide support for the entry and maintenance of a field to identify the type of work zone traffic control plan in place within a work zone.				H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash61	CRASH CONDITIONS	Work Zone-Law Enforcement Present	Provide support for the entry and maintenance of a field to identify whether law enforcement was present within a work zone.	Y	Refer to MMUCC 6th Data Element Name: C17. Related Factors		H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash62	CRASH CONDITIONS	Related Factors - Crash Level	Provide support for the entry and maintenance of a field to identify all other factors related to the crash.	Y	Refer to MMUCC 6th Data Element Name: C17. Related Factors		H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash63	CRASH REPORTING	Police Reported	Provide support for the entry and maintenance of a Y/N field to indicate whether this crash report was completed and signed by a law enforcement officer or representative appointed by the law enforcement agency (e.g., a non-sworn officer).	Y	Refer to MMUCC 6th Data Element Name: 53. Police-Reported		H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash64	CRASH REPORTING	State Reportable Crash	Provide support for the entry and maintenance of a field to indicate whether the crash meets the State's threshold for a reportable crash and is required to be reported by State law. Note (acceptable values): • No - This crash does not meet the State's threshold for a reportable crash and is not required to be reported by State law. • Yes - This crash meets the State's threshold for a reportable crash and is required to be reported by State law.				H	Meets the requirement out-of-the-box	Field Based Reporting	

Crash65	CRASH REPORTING	Reported By	Provide support for the entry and maintenance of a field to identify the affiliation of the person completing the crash report.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash66	CRASH REPORTING	Photos Taken	Provide support for the entry and maintenance of a field to indicate whether pictures of the crash were taken.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash67	CRASH REPORTING	Photos Taken - By Whom	Provide support for the entry and maintenance of a field to indicate who took the pictures of the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash68	CRASH REPORTING	Video Taped	Provide support for the entry and maintenance of a field to indicate whether video of the crash was taken.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash69	CRASH REPORTING	Video Taped - By Whom	Provide support for the entry and maintenance of a field to indicate who took video of the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash70	CRASH REPORTING	Investigating Officer Name	Provide support for the entry and maintenance of a field to identify the officer responsible for completing the report along with contact information.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash71	CRASH REPORTING	Investigating Officer Number	Provide support for the entry and maintenance of a field to the officer number responsible for completing the crash report and provides contact information.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash72	CRASH REPORTING	Investigating Officer Phone	Provide support for the entry and maintenance of a field to capture the phone number for the investigating officer responsible for completing the crash report.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash73	CRASH REPORTING	ORI Number	Provide support for the entry and maintenance of a field to capture the ORI Number of the agency responsible for the crash report.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash74	CRASH REPORTING	Investigating Officer Agency	Provide support for the entry and maintenance of a field to record/identify the agency responsible for the crash report.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash75	CRASH REPORTING	Assisting Officer 1 - 3	Provide support for the entry and maintenance of a field to identify any additional officers assisting with the crash investigation.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash76	CRASH REPORTING	Reconstructed	Provide support for the entry and maintenance of a field to record whether the crash was reconstructed (or not). Include a pop-up note if 'yes' to remind investigator that this initial report needs submitted and not to wait on reconstruction report.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash77	CRASH REPORTING	Reconstructed - By Whom	Provide support for the entry and maintenance of a field to identify who reconstructed the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash78	CRASH REPORTING	Date of Submission	Provide support for the entry and maintenance of a field to record the date (and time) the crash form was submitted.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash79	VEHICLE INFO	Vehicle Number	Provide support for the entry and maintenance of a field to capture a number that uniquely identifies the vehicle involved in the crash. Vehicles involved in the crash are to be numbered from 1 to n. Finalizing a crash record must validate that there is information for "n" vehicles captured in the crash record. Do not allow an "n+1" vehicle to have information entered unless this field (Vehicle Number) supports the logical entry of the vehicle's information, thus requiring the value in this field to be adjusted.	Y	Refer to MMUCC 6th Data Element Name: V1. Motor Vehicle Number Element (Definition: Motor vehicle number assigned to uniquely identify each motor vehicle involved in the crash)	H	Meets the requirement out-of-the-box	Field Based Reporting	

Crash80	VEHICLE INFO	Reporting Agency Record Number	Provide support for the entry and maintenance of a field to capture the agency-specific, unique identifier (for a year) that identifies a crash report. The system must ensure that the Reporting Agency Record Number is unique to the agency (i.e., it can match the Reporting Agency Record Number for another agency) --- that is, the system must prevent the creation of duplicate identifiers under the same agency. The number is provided by the agency itself, not inferred or calculated by the system.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash81	VEHICLE INFO	Vehicle Type	Provide PDF417 barcode scanning for all 50 states and automatically fill in field values from the vehicle registration or license plate. Fill in appropriate fields with the scanned information.				Meets the requirement out-of-the-box	Field Based Reporting	Can read information from AAMVA compatible states
Crash82	VEHICLE INFO	Vehicle Type	Provide support for the entry and maintenance of a field to identify the vehicle's function at the time of the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash83	VEHICLE INFO	Hit and Run	Provide support for the entry and maintenance of a field to indicate whether the vehicle and/or the driver of the vehicle departed the crash scene without stopping to render aid or report the crash.	Y	Refer to MMUCC 6th Edition Data Element Name: V39. Hit-and-Run Element	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash84	VEHICLE INFO	Driver Presence	Provide support for the entry and maintenance of a field to indicate whether a vehicle was being operated by a driver at the time of the crash.	Y	Refer to MMUCC 6th Edition Data Element Name: D1. Driver Presence (Definition: A data element that Refer to MMUCC 6th Edition Data Element Name: V21. Special Use Element (Definition: The type Refer to MMUCC 6th Edition Data Element Name: V23. Emergency Response Element (Definition: Refer to MMUCC 6th Edition Data Element Name: V22. Bus Use Element (Definition: The common type of	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash85	VEHICLE INFO	Special Function	Provide support for the entry and maintenance of a field to identify whether a vehicle's was being used for a special purpose at the time of the crash.	Y		H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash86	VEHICLE INFO	Emergency Motor Veh Use	Provide support for the entry and maintenance of a field to identify whether an official motor vehicle that was involved in the crash was on an emergency response.	Y		H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash87	VEHICLE INFO	Vehicle Used as Bus	Provide support for the entry and maintenance of a field to identify whether vehicle(s) involved in the crash was being utilized as a bus.	Y		H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash88	VEHICLE INFO	Travel Speed	Provide support for the entry and maintenance of a field to indicate the estimated travel speed of the vehicle at the time of the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash89	VEHICLE INFO	GVWR or GCWR	Provide support for the entry and maintenance of a field to identify the Gross Vehicle Weight Rating or Gross Combination Weight Rating indicating the weight recommended by the vehicle's manufacturer to be the maximum operational weight for the unit or the maximum operational weight for a combination of units. Note: • When a crash report falls under FMCSA requirements, the system should either hide/show the FMCSA-required fields for data entry.	Y	Refer to MMUCC 6th Edition Data Element Name: Y14. Power Unit Gross Vehicle Weight Rating Element (Definition: The value specified by the manufacturer as the recommended maximum loaded weight of a single motor vehicle.)	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash90	VEHICLE INFO	Number of Axles	Provide support for the entry and maintenance of a field to record the number of axles on the vehicle involved in the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	

Crash91	VEHICLE INFO	Total Occupants	Provide support for the entry and maintenance of a field to indicate the total number of occupants of this vehicle.	Y	Refer to MMUCC 6th Edition Data Element Name: Y20, Total Occupants in Motor Vehicle Element.	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash92	VEHICLE INFO	Max Occupants	Provide support for the entry and maintenance of a field to indicate the maximum number of individuals the vehicle passenger compartment of this vehicle is designed to hold.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash93	VEHICLE INFO	Displaying Haz Mat Placard	Provide support for the entry and maintenance of a field to indicate whether the vehicle was displaying a hazardous materials placard at the time of the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash94	VEHICLE INFO	Modified Vehicle	Provide support for the entry and maintenance of a field to indicate whether the vehicle has been modified from its original factory designed state.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash95	VEHICLE INFO	Transport for Commerce	Provide support for the entry and maintenance of a field to indicate whether vehicle's primary use is for the transportation of goods, property, or people for commerce.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash96	VEHICLE INFO	Number of Trailing Units	Provide support for the entry and maintenance of a field to identify the number of units trailing the power unit in a combination vehicle.	Y	Refer to MMUCC 6th Edition Data Element Name: Y17, Vehicle Trailing Element (Definition: identify whether this vehicle	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash97	VEHICLE INFO	Related Factors - Vehicle Level Element	Provide support for the entry and maintenance of a field to capture factors related to this vehicle to facilitate identifying and tracking ongoing or emerging issues associated with these vehicle characteristics.	Y	Refer to MMUCC 6th Edition Data Element Name: V44, Related Factors - Vehicle Level Element (Definition: Records factors	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash98	VEHICLE CREDENTIALS	Owner Names	Provide PDF417 barcode scanning for all 50 states and automatically fill in field values from a driver's license. Provide support for the entry and maintenance of a field to identify the individual(s) to whom the vehicle is registered.	Y	Refer to MMUCC 6th Edition Data Element Name: V4, Vehicle Owner and Address (Definition: The name	H	Meets the requirement out-of-the-box	Field Based Reporting	Can read information from AAMVA compatible states
Crash99	VEHICLE CREDENTIALS	Owner Address	Provide support for the entry and maintenance of a field to identify the point of contact for vehicle owner(s) in the form of an address.	Y	Refer to MMUCC 6th Edition Data Element Name: V4, Vehicle Owner and Address (Definition: The name	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash100	VEHICLE CREDENTIALS	Owner Home Phone	Provide support for the entry and maintenance of a field to record the vehicle owner's phone number in order to contact them following the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash101	VEHICLE CREDENTIALS	Owner Other Phone	Provide support for the entry and maintenance of a field to record an alternate phone number for contacting the vehicle owner following the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash102	VEHICLE CREDENTIALS	Vehicle Make	Provide support for the entry and maintenance of a field to record the vehicle make. This value should be auto-populated based on the entry of a valid VIN.	Y	Refer to MMUCC 6th Edition Data Element Name: Y10, Motor Vehicle Make Element (Definition: The	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash103	VEHICLE CREDENTIALS	Vehicle Model	Provide support for the entry and maintenance of a field to record the vehicle model name. This value should be auto-populated based on the entry of a valid VIN.	Y	Refer to MMUCC 6th Edition Data Element Name: Y12, Motor Vehicle Model (Definition: The	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash104	VEHICLE CREDENTIALS	Model Year	Provide support for the entry and maintenance of a field to record the year in which the vehicle was manufactured. This value should be auto-populated based on the entry of a valid VIN.			H	Meets the requirement out-of-the-box	Field Based Reporting	

Crash105	VEHICLE CREDENTIALS	Body Type	Provide support for the entry and maintenance of a field to record the general configuration or shape of a motor vehicle. This value should be auto-populated based on the entry of a valid VIN.	Y	Refer to MMUCC 6th Edition Data Element Name: V13, Motor Vehicle Body Type Category Definition.	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash106	VEHICLE CREDENTIALS	Color	Provide support for the entry and maintenance of a field to record the color description of the vehicle involved. This value should be auto-populated based on the entry of a valid VIN; however, allow the value to be changed (to support after market color changes to vehicle's original color).		Refer to MMUCC 6th Edition Data Element Name: V2, Vehicle Identification Number (VIN) (Definition: A unique combination of alphanumeric characters assigned to a specific motor vehicle).	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash107	VEHICLE CREDENTIALS	VIN	Provide support for the entry and maintenance of the vehicle VIN, a unique combination of 17 alphanumeric characters assigned to a specific motor vehicle designated by the manufacturer. The VIN entry should be validated against a validation service to ensure the accuracy of the data entry. Upon successful lookup of the VIN, automatically populate associated attributes such as the auto manufacturer, body type, color, etc. and allow color to override if necessary.	Y	Refer to MMUCC 6th Edition Data Element Name: V9, Motor Vehicle License Plate Number (Definition: Refer to MMUCC 6th Edition Data Element Name: V13, Motor Vehicle Body Type Category Definition).	H	Meets with modification to Base Code	Field Based Reporting	
Crash108	VEHICLE CREDENTIALS	Plate Class	Provide support for the entry and maintenance of a field to identify the type of registration for the vehicle.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash109	VEHICLE CREDENTIALS	Plate Number	Provide support for the entry and maintenance of a field to record the combination of letters and numbers displayed on the license plate or tag affixed to the motor vehicle.	Y	Refer to MMUCC 6th Edition Data Element Name: V9, Motor Vehicle License Plate Number (Definition: Refer to MMUCC 6th Edition Data Element Name: V13, Motor Vehicle Body Type Category Definition).	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash110	VEHICLE CREDENTIALS	Registration State	Provide support for the entry and maintenance of a field to identify the state, territory, government, etc. issuing the license plate for the vehicle.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash111	VEHICLE CREDENTIALS	Registration Year	Provide support for the entry and maintenance of a field to identify the year in which the vehicle's registration expires.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash112	VEHICLE CREDENTIALS	Registration Status	Provide support for the entry and maintenance of a field to identify the indicate whether the vehicle was in compliance with applicable motor vehicle registration laws at the time of the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash113	VEHICLE CREDENTIALS	Liability Insurance	Provide support for the entry and maintenance of a field to identify the indicate whether the vehicle involved in the crash was covered by auto liability insurance at the time of the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash114	VEHICLE CREDENTIALS	Insurance Company	Provide support for the entry and maintenance of a field to identify the name of the company insuring the involved vehicle at the time of the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash115	VEHICLE CREDENTIALS	Insurance Policy Number	Provide support for the entry and maintenance of a field to record the insurance policy number covering the involved vehicle.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash116	VEHICLE CREDENTIALS	Insurance Expiration Date	Provide support for the entry and maintenance of a field to identify the date after which the insurance policy is no longer valid.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash117	VEHICLE CREDENTIALS	Insurance Agent	Provide support for the entry and maintenance of a field to identify the point of contact to verify validity of insurance.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash118	VEHICLE SPECIFIC CRASH LOCN	Direction of Travel Prior to Crash	Provide support for the entry and maintenance of a field to record the direction the motor vehicle was traveling prior to the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash119	VEHICLE SPECIFIC CRASH LOCN	Applicable Speed Limit (MPH)	Provide support for the entry and maintenance of a field to record the speed limit which applies to this particular vehicle at the time of the crash.	Y	Refer to MMUCC 6th Edition Data Element Name: V24, Motor Vehicle Posted or	H	Meets the requirement out-of-the-box	Field Based Reporting	

Crash120	VEHICLE SPECIFIC CRASH LOCN	Roadway Description	Provide support for the entry and maintenance of a field to record the general description of the roadway layout and flow.	Y	Refer to MMUCC 6th Edition Data Element Name: V25. Trafficway Flow Element	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash121	VEHICLE SPECIFIC CRASH LOCN	Median Barrier Presence	Provide support for the entry and maintenance of a field to identify whether the trafficway associated with this vehicle included a median barrier, just prior to this vehicle's involvement in the crash.	Y	Refer to MMUCC 6th Edition Data Element Name: V26. Median	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash122	VEHICLE SPECIFIC CRASH LOCN	Total Lanes in Roadway	Provide support for the entry and maintenance of a field to record the number of lanes on the roadway which the vehicle was traveling. Populate this value from the WVDOT LRS System with ability for the user to override.	Y	Refer to MMUCC 6th Edition Data Element Name: V27. Number of Open Lanes in	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash123	VEHICLE SPECIFIC CRASH LOCN	Traffic Control Device	Provide support for the entry and maintenance of a field to identify the type of traffic control device that was applicable to the vehicle at the crash location.	Y	Refer to MMUCC 6th Edition Data Element Name: V31. Traffic Control Device	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash124	VEHICLE SPECIFIC CRASH LOCN	Traffic Control Device Function	Provide support for the entry and maintenance of a field to indicate whether the traffic control device that was applicable to the vehicle was functioning properly at the time of the crash.	Y	Refer to MMUCC 6th Edition Data Element Name: V32. Device Functioning	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash125	VEHICLE SPECIFIC CRASH LOCN	Horizontal Roadway Alignment	Provide support for the entry and maintenance of a field to indicate the horizontal geometry or layout of the roadway in the direction the vehicle was traveling.	Y	Refer to MMUCC 6th Edition Data Element Name: V28. Roadway Alignment Element	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash126	VEHICLE SPECIFIC CRASH LOCN	Vertical Roadway Alignment (Roadway Grade)	Provide support for the entry and maintenance of a field to indicate the vertical geometry or layout of the roadway in the direction the vehicle was traveling.	Y	Refer to MMUCC 6th Edition Data Element Name: V29. Roadway Grade (Definition: The	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash127	VEHICLE SPECIFIC CRASH LOCN	Roadway Surface Condition	Provide support for the entry and maintenance of a field to identify the roadway surface condition for this vehicle, just prior to this vehicle's involvement in the crash.	Y	Refer to MMUCC 6th Edition Data Element Name: V30. Roadway Surface Condition	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash128	VEHICLE SPECIFIC CRASH LOCN	Property Damaged	Provide support for the entry and maintenance of a field to indicate property which was damaged by this vehicle during the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash129	VEHICLE SPECIFIC CRASH LOCN	Property Damage - Pole Number	Provide support for the entry and maintenance of a field to indicate the number of the pole that was damaged by a vehicle during the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash130	VEHICLE SPECIFIC CRASH LOCN	Property Damage Owner	Provide support for the entry and maintenance of a field to identify the owner of the property damaged in the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash131	VEHICLE SPECIFIC CRASH LOCN	Property Damage Owner - Other	Provide support for the entry and maintenance of a field to identify the owner of the property damaged in the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash132	VEHICLE SPECIFIC CRASH LOCN	Property Damage Location	Provide support for the entry and maintenance of a field to describe the location of property damaged by this vehicle.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash133	VEHICLE CRASH EVENTS	Impact Role	Provide support for the entry and maintenance of a field to identify the role that the vehicle played in the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash134	VEHICLE CRASH EVENTS	Underride Override	Provide support for the entry and maintenance of a field to identify whether the crash involved a vehicle that either slides under or rides up on another vehicle during a crash.	Y	Refer to MMUCC 6th Edition Data Element Name: V42. Vehicle Underride or Override Element (Definition	H	Meets the requirement out-of-the-box	Field Based Reporting	

Crash135	VEHICLE CRASH EVENTS	Vehicle Maneuver/Action (Vehicle Status Prior to Critical Event)	Provide support for the entry and maintenance of a field to record the controlled maneuver of this vehicle prior to the beginning of the sequence of events.	Y	Refer to MMUCC 6th Edition Data Element Name: V33. Vehicle Status Prior to Critical Event Element	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash136	VEHICLE CRASH EVENTS	Crash Avoidance Maneuver	Provide support for the entry and maintenance of a field to record the maneuver of the vehicle at the onset of the crash to attempt to prevent the crash.	Y	Refer to MMUCC 6th Edition Data Element Name: D7. Attempted Avoidance Maneuver Element (Definition: REFER TO MMUCC 6TH EDITION TO MMUCC 6TH EDITION)	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash137	VEHICLE CRASH EVENTS	Contributing Circumstances, Motor Vehicle Element	Provide support for the entry and maintenance of a field to record re-existing motor vehicle defects or maintenance conditions that may have contributed to the crash.	Y	Refer to MMUCC 6th Edition Data Element Name: V41. Contributing Circumstances, Motor Vehicle Element	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash138	VEHICLE CRASH EVENTS	Occurrence of Fire	Provide support for the entry and maintenance of a field to indicate whether a vehicle fire occurred as a result of the crash or as a result of vehicle equipment failure or malfunction.	Y	Refer to MMUCC 6th Edition Data Element Name: V43. Fire Occurrence Element (Definition: REFER TO MMUCC 6TH EDITION TO MMUCC 6TH EDITION)	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash139	VEHICLE CRASH EVENTS	Sequence of Events	Provide support for the entry and maintenance of a field to record the most important sequential crash events of this motor vehicle.	Y	Refer to MMUCC 6th Edition Data Element Name: V37. Sequence of Events Element	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash140	VEHICLE CRASH EVENTS	Most Harmful Event	Provide support for the entry and maintenance of a field to record the single event that resulted in the most severe injury involving this motor vehicle. If no one was injured, the event responsible for producing the greatest property damage to this vehicle.	Y	Refer to MMUCC 6th Edition Data Element Name: V38. Most Harmful Event for this Motor Vehicle (Definition: Event that resulted in the most severe injury involving this motor vehicle. If no one was injured, the event responsible for producing the greatest property damage to this vehicle.)	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash141	VEHICLE CRASH DAMAGE	Extent of Damage	Provide support for the entry and maintenance of a field to record the estimation of the total damage to the vehicle in the crash.	Y	Refer to MMUCC 6th Edition Data Element Name: V36. Extent of Damage Element	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash142	VEHICLE CRASH DAMAGE	Manner Left Scene (Vehicle Towed)	Provide support for the entry and maintenance of a field to describe how the vehicle was removed from the scene following the crash.	Y	Refer to MMUCC 6th Edition Data Element Name: V42. Vehicle Towed Element	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash143	VEHICLE CRASH DAMAGE	Towed To	Provide support for the entry and maintenance of a field to indicate where a vehicle that was towed from the scene was taken following the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash144	VEHICLE CRASH DAMAGE	Towed By	Provide support for the entry and maintenance of a field to indicate who was responsible for towing a disabled or damaged vehicle following the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash145	VEHICLE CRASH DAMAGE	Vehicle Damage Diagram Type	The system shall allow entry of multiple vehicle records for a single crash, with each vehicle assigned one body type. For each vehicle, the system shall provide a diagram-based tool to record both the initial contact point (single-select) and all applicable damaged areas (multi-select). If "No Damage" is selected, the extent of damage must automatically be set to "No Damage" and no other damage areas may be selected. The vehicle may also include motorcycle, tractor trailer, etc.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash146	VEHICLE CRASH DAMAGE	Damaged Area(s)	Provide support for the entry and maintenance of a field to indicate the areas of the vehicle receiving damage in the crash.	Y	REFER TO MMUCC 6TH EDITION TO MMUCC 6TH EDITION Refer to MMUCC 6th Edition Data Element Name: V35. Damaged Areas Element	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash147	VEHICLE CRASH DAMAGE	Area of Initial Impact (Initial Contact Point)	Provide support for the entry and maintenance of a field to record the area of the vehicle that received the initial impact in the crash.	Y	Refer to MMUCC 6th Edition Data Element Name: V34. Initial Contact Point (Definition: The	H	Meets the requirement out-of-the-box	Field Based Reporting	

Crash148	VEHICLE CRASH DAMAGE	Most Damaged Area	Provide support for the entry and maintenance of a field to indicate the area of the vehicle that received the most damage in the crash.						Meets the requirement out-of-the-box	Field Based Reporting	
Crash149	VEHICLE TRAILING UNITS INFO	Trailing Unit 1 Owner Same As Power Unit	Provide PDF417 barcode scanning for all 50 states and automatically fill in field values from the vehicle registration or license plate. Fill in appropriate fields with the scanned information.						Meets the requirement out-of-the-box	Field Based Reporting	Can read information from AAMVA compatible states
Crash150	VEHICLE TRAILING UNITS INFO	Trailing Unit 1 Owner Same As Power Unit	Provide support for the entry and maintenance of a field to indicate if the owner of the trailing unit is the same as the power unit.						Meets the requirement out-of-the-box	Field Based Reporting	
Crash151	VEHICLE TRAILING UNITS INFO	Trailing Unit 1 Owner Name	Provide support for the entry and maintenance of a field to indicate the identify the motor carrier or owner of the trailing unit(s).						Meets the requirement out-of-the-box	Field Based Reporting	
Crash152	VEHICLE TRAILING UNITS INFO	Trailing Unit 1 Address	Provide support for the entry and maintenance of a field to indicate the contact information for the motor carrier or owner of the trailing unit(s).						Meets the requirement out-of-the-box	Field Based Reporting	
Crash153	VEHICLE TRAILING UNITS INFO	Trailing Unit 1 City	Provide support for the entry and maintenance of a field to indicate the contact information for the motor carrier or owner of the trailing unit(s).						Meets the requirement out-of-the-box	Field Based Reporting	
Crash154	VEHICLE TRAILING UNITS INFO	Trailing Unit 1 State	Provide support for the entry and maintenance of a field to indicate the contact information for the motor carrier or owner of the trailing unit(s).						Meets the requirement out-of-the-box	Field Based Reporting	
Crash155	VEHICLE TRAILING UNITS INFO	Trailing Unit 1 Zip	Provide support for the entry and maintenance of a field to indicate the contact information for the motor carrier or owner of the trailing unit(s).						Meets the requirement out-of-the-box	Field Based Reporting	
Crash156	VEHICLE TRAILING UNITS INFO	Trailing Unit 1 Phone	Provide support for the entry and maintenance of a field to indicate the contact information for the motor carrier or owner of the trailing unit(s).						Meets the requirement out-of-the-box	Field Based Reporting	
Crash157	VEHICLE TRAILING UNITS INFO	Trailing Unit 1 VIN	Provide support for the entry and maintenance of a field to record the unique combination of letters and numbers assigned to a specific motor vehicle.	Y	Refer to MMUCL 6th Edition Data Element Name: V18. Trailer VIN Element (Definition: A unique combination of				Meets the requirement out-of-the-box	Field Based Reporting	
Crash158	VEHICLE TRAILING UNITS INFO	Trailing Unit 1 License Plate Class	Provide support for the entry and maintenance of a field to record the type of registration for this trailing unit.						Meets the requirement out-of-the-box	Field Based Reporting	
Crash159	VEHICLE TRAILING UNITS INFO	Trailing Unit 1 License Plate Number	Provide support for the entry and maintenance of a field to record the combination of letters and numbers displayed on the registration plate or tag affixed to the trailing unit.						Meets the requirement out-of-the-box	Field Based Reporting	
Crash160	VEHICLE TRAILING UNITS INFO	Trailing Unit 1 Registration State	Provide support for the entry and maintenance of a field to identify the state, territory, government, etc. issuing the registration plate for the trailing unit.						Meets the requirement out-of-the-box	Field Based Reporting	
Crash161	VEHICLE TRAILING UNITS INFO	Trailing Unit 1 Registration Year	Provide support for the entry and maintenance of a field to record the year in which the trailing unit's registration expires.						Meets the requirement out-of-the-box	Field Based Reporting	
Crash162	VEHICLE TRAILING UNITS INFO	Trailing Unit 1 Make	Provide support for the entry and maintenance of a field to record the distinctive name distinguishing a motor vehicle's manufacturer.						Meets the requirement out-of-the-box	Field Based Reporting	
Crash163	VEHICLE TRAILING UNITS INFO	Trailing Unit 1 Model	Provide support for the entry and maintenance of a field to record the manufacturer assigned name denoting a group of vehicles that have a degree of similarity in construction.						Meets the requirement out-of-the-box	Field Based Reporting	
Crash164	VEHICLE TRAILING UNITS INFO	Trailing Unit 1 Model Year	Provide support for the entry and maintenance of a field to record the year in which the trailing unit was manufactured.						Meets the requirement out-of-the-box	Field Based Reporting	
Crash165	VEHICLE TRAILING UNITS INFO	Trailing Unit 1 Body Type	Provide support for the entry and maintenance of a field to record the indicate the general configuration or shape of a motor vehicle.						Meets the requirement out-of-the-box	Field Based Reporting	

Crash166	VEHICLE TRAILING UNITS INFO	Trailing Unit 2 Owner Same As Power Unit	Provide support for the entry and maintenance of a field to indicate if the owner of the trailing unit is the same as the power unit.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash167	VEHICLE TRAILING UNITS INFO	Trailing Unit 2 Owner Name	Provide support for the entry and maintenance of a field to record the identify individual(s) to whom the vehicle is registered.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash168	VEHICLE TRAILING UNITS INFO	Trailing Unit 2 Address	Provide support for the entry and maintenance of a field to provide a point of contact for the vehicle owner(s).			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash169	VEHICLE TRAILING UNITS INFO	Trailing Unit 2 City	Provide support for the entry and maintenance of a field to provide a point of contact for the vehicle owner(s).			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash170	VEHICLE TRAILING UNITS INFO	Trailing Unit 2 State	Provide support for the entry and maintenance of a field to provide a point of contact for the vehicle owner(s).			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash171	VEHICLE TRAILING UNITS INFO	Trailing Unit 2 Zip	Provide support for the entry and maintenance of a field to provide a point of contact for the vehicle owner(s).			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash172	VEHICLE TRAILING UNITS INFO	Trailing Unit 2 Phone	Provide support for the entry and maintenance of a field to provide a means of contacting the vehicle owner following the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash173	VEHICLE TRAILING UNITS INFO	Trailing Unit 2 VIN	Provide support for the entry and maintenance of a field to record the unique combination of letters and numbers assigned to a specific motor vehicle.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash174	VEHICLE TRAILING UNITS INFO	Trailing Unit 2 License Plate Class	Provide support for the entry and maintenance of a field to indicate the type of registration for this trailing unit.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash175	VEHICLE TRAILING UNITS INFO	Trailing Unit 2 License Plate Number	Provide support for the entry and maintenance of a field to record the combination of letters and numbers displayed on the registration plate or tag affixed to the trailing unit.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash176	VEHICLE TRAILING UNITS INFO	Trailing Unit 2 Registration State	Provide support for the entry and maintenance of a field to identify the state, territory, government, etc. issuing the registration plate for the trailing unit.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash177	VEHICLE TRAILING UNITS INFO	Trailing Unit 2 Registration Year	Provide support for the entry and maintenance of a field to identify the year in which the trailing unit's registration expires.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash178	VEHICLE TRAILING UNITS INFO	Trailing Unit 2 Make	Provide support for the entry and maintenance of a field to record the distinctive name distinguishing a motor vehicle's manufacturer.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash179	VEHICLE TRAILING UNITS INFO	Trailing Unit 2 Model	Provide support for the entry and maintenance of a field to record the manufacturer assigned name denoting a group of vehicles that have a degree of similarity in construction.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash180	VEHICLE TRAILING UNITS INFO	Trailing Unit 2 Model Year	Provide support for the entry and maintenance of a field to record the year in which the trailing unit was manufactured.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash181	VEHICLE TRAILING UNITS INFO	Trailing Unit 2 Body Type	Provide support for the entry and maintenance of a field to record the general configuration or shape of a motor vehicle.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash182	VEHICLE TRAILING UNITS INFO	Trailing Unit 3 Owner Same As Power Unit	Provide support for the entry and maintenance of a field to indicate if the owner of the trailing unit is the same as the power unit. Further, triple towing is not permitted in West Virginia, and, as a result, a popup warning or reminder should be issued to the law enforcement officer entering the crash report denoting that this is a violation.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash183	VEHICLE TRAILING UNITS INFO	Trailing Unit 3 Owner Name	Provide support for the entry and maintenance of a field to record the individual(s) to whom the vehicle is registered.			H	Meets the requirement out-of-the-box	Field Based Reporting	

Crash184	VEHICLE TRAILING UNITS INFO	Trailing Unit 3 Address	Provide support for the entry and maintenance of a field to record the provide a point of contact for vehicle owner(s).			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash185	VEHICLE TRAILING UNITS INFO	Trailing Unit 3 City	Provide support for the entry and maintenance of a field to provide a point of contact for vehicle owner(s).			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash186	VEHICLE TRAILING UNITS INFO	Trailing Unit 3 State	Provide support for the entry and maintenance of a field to provide a point of contact for vehicle owner(s).			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash187	VEHICLE TRAILING UNITS INFO	Trailing Unit 3 Zip	Provide support for the entry and maintenance of a field to provide a point of contact for vehicle owner(s).			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash188	VEHICLE TRAILING UNITS INFO	Trailing Unit 3 Phone	Provide support for the entry and maintenance of a field to provide a means to contact the vehicle owner following the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash189	VEHICLE TRAILING UNITS INFO	Trailing Unit 3 VIN	Provide support for the entry and maintenance of a field to record the unique combination of letters and numbers assigned to a specific motor vehicle.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash190	VEHICLE TRAILING UNITS INFO	Trailing Unit 3 License Plate Class	Provide support for the entry and maintenance of a field to indicate the type of registration for this trailing unit.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash191	VEHICLE TRAILING UNITS INFO	Trailing Unit 3 License Plate Number	Provide support for the entry and maintenance of a field to record the combination of letters and numbers displayed on the registration plate or tag affixed to the trailing unit.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash192	VEHICLE TRAILING UNITS INFO	Trailing Unit 3 Registration State	Provide support for the entry and maintenance of a field to identify the state, territory, government, etc. issuing the registration plate for the trailing unit.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash193	VEHICLE TRAILING UNITS INFO	Trailing Unit 3 Registration Year	Provide support for the entry and maintenance of a field to identify the year in which the trailing unit's registration expires.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash194	VEHICLE TRAILING UNITS INFO	Trailing Unit 3 Make	Provide support for the entry and maintenance of a field to record the distinctive name distinguishing a motor vehicle's manufacturer.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash195	VEHICLE TRAILING UNITS INFO	Trailing Unit 3 Model	Provide support for the entry and maintenance of a field to record the manufacturer assigned name denoting a group of vehicles that have a degree of similarity in construction.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash196	VEHICLE TRAILING UNITS INFO	Trailing Unit 3 Model Year	Provide support for the entry and maintenance of a field to record the year in which the trailing unit was manufactured.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash197	VEHICLE TRAILING UNITS INFO	Trailing Unit 3 Body Type	Provide support for the entry and maintenance of a field to indicate the general configuration or shape of a motor vehicle.			H	Meets the requirement out-of-the-box	Field Based Reporting

Crash205	VEHICLE CMV INFO	Motor Carrier US DOT Number	Provide support for the entry and maintenance of a field to record the unique identifier assigned to an individual, partnership, or corporation responsible for the transportation of persons or property contained in the CMV by the US DOT for any commercial carrier with a Gross Vehicle Weight Rating equal to or greater than 10,001 pounds or designed to carry greater than eight passengers, including the driver.	Y	Refer to MMUCC 6th Edition Data Element Name: V5, Motor Carrier or Responsible Entity Identification Element Definition: The identification number (or numbers) of the business entity. REFER TO MMUCC OUT	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash206	VEHICLE CMV INFO	Motor Vehicle Registration State or Country	Provide support for the entry and maintenance of a field to indicate the Motor Vehicle Registration State or Country (i.e., The State, commonwealth, territory, Indian Nation, U.S. Government, foreign country, etc., issuing the registration plate displayed on the motor vehicle).	Y	Refer to MMUCC 6th Edition Data Element Name: V8, Motor Vehicle Registration State or Country, note that Canada and	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash207	VEHICLE CMV INFO	Motor Carrier State ID Number	Provide support for the entry and maintenance of a field to record the unique identifier assigned to an individual, partnership or corporation responsible for the transportation of persons or property contained in the CMV by the State for any commercial carrier not eligible for a US DOT Number.	Y	Refer to MMUCC 6th Edition Data Element Name: V5, Motor Carrier or Responsible Entity Identification	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash208	VEHICLE CMV INFO	Lessee Lessor Name	Provide support for the entry and maintenance of a field to identify an individual, partnership, or corporation transporting persons or property contained in the CMV.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash209	VEHICLE CMV INFO	Lessee Lessor Address	Provide support for the entry and maintenance of a field to identify the address of an individual, partnership, or corporation transporting persons or property contained in the CMV.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash210	VEHICLE CMV INFO	Lessee Lessor City	Provide support for the entry and maintenance of a field to identify the address of an individual, partnership, or corporation transporting persons or property contained in the CMV.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash211	VEHICLE CMV INFO	Lessee Lessor State	Provide support for the entry and maintenance of a field to identify the address of an individual, partnership, or corporation transporting persons or property contained in the CMV.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash212	VEHICLE CMV INFO	Lessee Lessor Zip Code	Provide support for the entry and maintenance of a field to identify the address of an individual, partnership, or corporation transporting persons or property contained in the CMV.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash213	VEHICLE CMV INFO	Lessee Lessor US DOT Number	Provide support for the entry and maintenance of a field to identify the unique identifier assigned to an individual, partnership, or corporation transporting persons or property contained in the CMV, for any commercial carrier with a Gross Vehicle Weight Rating equal to or greater than 10,001 pounds or designed to carry greater than eight passengers, including the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash214	VEHICLE CMV INFO	Lessee Lessor State ID Number	Provide support for the entry and maintenance of a field to identify the unique identifier assigned to an individual, partnership or corporation transporting persons or property contained in the CMV by the State for any commercial carrier not eligible for a US DOT Number.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash215	VEHICLE CMV INFO	Carrier Classification	Provide support for the entry and maintenance of a field to identify the category of operating authority for the entity recorded in the Carrier Name.	Y	Refer to MMUCC 6th Edition Data Element Name: V6, Type of Motor Carrier or	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash216	VEHICLE CMV INFO	Carrier Information Source	Provide support for the entry and maintenance of a field to identify the source of the Commercial Carrier Information provided on this page.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash217	VEHICLE CMV INFO	Carrier Information Source - Other	Provide support for the entry and maintenance of a field to identify the source of the Commercial Carrier Information provided on this page.			H	Meets the requirement out-of-the-box	Field Based Reporting	

Crash232	PERSON INVOLVED INDIVIDUALS	Individual Number	<p>Provide support for the entry and maintenance of a field to assign a unique identifying number to each individual involved in a crash.</p> <p>Comments:</p> <ul style="list-style-type: none"> Semantically, Individual Number defines individuals that may exist in multiple contexts, and the solution will need to accommodate these. For example: <ul style="list-style-type: none"> Each individual involved in a crash will need to be identified with a unique number (1-n) to identify the person/individual An individual can be a driver, passenger, vehicle/trailer owner, or non-motorist, and will be associated with a Vehicle Number that uniquely identifies the vehicle in each crash record As a driver, the driver's credentials will need to be captured As a driver, any violation and/or citations will need to be captured As a passenger, they will be tied to a specific Vehicle Number involved in the crash As an involved non-motorist, the non-motorist (individual) will be tied to the crash The Individual Number will be tied to a description of the individual's related injuries, treatment, and possible death. 	Y	Refer to MMUCC 6th Edition Data Element Name: P1, Person Number. (Definition: This element identifies a number for the motor vehicle occupant in the motor vehicle they occupied, or for each non-motorist, in consecutive order.)	H	Meets the requirement out-of-the-box	Field Based Reporting
Crash233	PERSON INVOLVED INDIVIDUALS	Reporting Agency Record Number	<p>Provide support for the entry and maintenance of a field to record an agency-specific, unique identifier for the given year that identifies the crash report.</p>			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash234	PERSON INVOLVED INDIVIDUALS	Last Name	<p>Provide support for the entry and maintenance of a field to identify person involved in crash.</p>	Y	Refer to MMUCC 6th Edition Data Element Name: P2, Name of Person Involved	H	Meets the requirement out-of-the-box	Field Based Reporting
Crash235	PERSON INVOLVED INDIVIDUALS	First Name	<p>Provide support for the entry and maintenance of a field to identify person involved in crash.</p>	Y	Refer to MMUCC 6th Edition Data Element Name: P2, Name of Person Involved	H	Meets the requirement out-of-the-box	Field Based Reporting
Crash236	PERSON INVOLVED INDIVIDUALS	Middle Initial	<p>Provide support for the entry and maintenance of a field to identify person involved in crash.</p>	Y	Refer to MMUCC 6th Edition Data Element Name: P2, Name of Person Involved	H	Meets the requirement out-of-the-box	Field Based Reporting
Crash237	PERSON INVOLVED INDIVIDUALS	Suffix	<p>Provide support for the entry and maintenance of a field to identify person involved in crash.</p>	Y	Refer to MMUCC 6th Edition Data Element Name: P2, Name of Person Involved	H	Meets the requirement out-of-the-box	Field Based Reporting
Crash238	PERSON INVOLVED INDIVIDUALS	Occupant/Person Type	<p>Provide support for the entry and maintenance of a field to identify the role of an individual involved in a crash.</p>	Y	Refer to MMUCC 6th Edition Data Element Name: P5, Person Type. (Definition: A	H	Meets the requirement out-of-the-box	Field Based Reporting
Crash239	PERSON INVOLVED INDIVIDUALS	Social Security	<p>Provide support for the entry and maintenance of a field to record the Social Security Number of the Individual involved in the crash.</p>			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash240	PERSON INVOLVED INDIVIDUALS	Date of Birth	<p>Provide support for the entry and maintenance of a field to identify the birthdate of the involved individual.</p>	Y	Refer to MMUCC 6th Edition Data Element Name: P3, Date of Birth. (Definition: A	H	Meets the requirement out-of-the-box	Field Based Reporting
Crash241	PERSON INVOLVED INDIVIDUALS	Age	<p>Provide support for the entry and maintenance of the age of the involved individual at the time of the crash.</p>			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash242	PERSON INVOLVED INDIVIDUALS	Gender	<p>Provide support for the entry and maintenance of a field to identify the sex of the person involved in the crash.</p>	Y	Refer to MMUCC 6th Edition Data Element Name: P4, Sex or Gender. (Definition: A	H	Meets the requirement out-of-the-box	Field Based Reporting
Crash243	PERSON INVOLVED INDIVIDUALS	Person Special Function	<p>Provide support for the entry and maintenance of a field to record whether this person involved in the crash was performing a unique function at the time of the crash.</p>	Y	Refer to MMUCC 6th Edition Data Element Name: P6, Special Function Element	H	Meets the requirement out-of-the-box	Field Based Reporting

Crash244	PERSON INJURY	Injury Severity	Provide support for the entry and maintenance of a field to indicate the injury severity level for an individual involved in a crash.	Y	Refer to MMUCC 6th Edition Data Element Name: P7, Injury Status (Definition)	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash245	PERSON INJURY	Medical Transport	Provide support for the entry and maintenance of a field to indicate whether and by whom an individual was transported from the crash scene for medical treatment.	Y	Refer to MMUCC 6th Edition Data Element Name: P8, Transported to First Medical Facility By	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash246	PERSON INJURY	EMS Response Agency ID	Provide support for the entry and maintenance of a field to identify the EMS Agency responsible for transporting an individual.	Y	Refer to MMUCC 6th Edition Data Element Name: P9, EMS Response Agency	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash247	PERSON INJURY	EMS Run Number	Provide support for the entry and maintenance of a field that uniquely identifies the EMS Response Run Number for an individual.	Y	Refer to MMUCC 6th Edition Data Element Name: P9, EMS Response Agency	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash248	PERSON INJURY	Receiving Medical Facility Name	Provide support for the entry and maintenance of a field to identify the health care facility which received an individual for medical treatment who was involved in a crash.	Y	Refer to MMUCC 6th Edition Data Element Name: P10, Medical Facility	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash249	PERSON INJURY	EMS UUID	Provide support for the entry and maintenance of a field to record the Universally Unique Identifier of the EMS patient care report for this person.	Y	Refer to MMUCC 6th Edition Data Element Name: P11, EMS UUID	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash250	PERSON INJURY	EMS Notified Time	Provide support for the entry and maintenance of a field to indicate the time at which a particular EMS unit was first called to the scene of a crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash251	PERSON INJURY	EMS Scene Time	Provide support for the entry and maintenance of a field to indicate the time at which this particular EMS unit arrived at the scene of a crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash252	PERSON INJURY	EMS Hospital Time	Provide support for the entry and maintenance of a field to indicate the time at which this particular EMS unit arrived at the receiving facility.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash253	PERSON INJURY	Date of Death	Provide support for the entry and maintenance of a field to indicate the date of death for an individual who died at the scene or within 30 days of being injured in a crash as a result of those injuries.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash254	PERSON INJURY	Time of Death	Provide support for the entry and maintenance of a field to indicate the time at which an individual, who died as a result of injuries received in a crash, died.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash255	PERSON INJURY	Place of Death	Provide support for the entry and maintenance of a field to indicate the location at the time of their death of the person who died as a result of injuries received in a crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash256	PERSON DRIVER CREDENTIALS	Driver Same as Vehicle Owner	Provide support for the entry and maintenance of a field to indicate whether the driver is the same as the vehicle owner.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash257	PERSON DRIVER CREDENTIALS	Address	Provide support for the entry and maintenance of a field to indicate the point of contact (i.e., address) for drivers involved in a crash.	Y	Refer to MMUCC 6th Edition Data Element Name: D2, Driver Address (Definition: A)	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash258	PERSON DRIVER CREDENTIALS	City	Provide support for the entry and maintenance of a field to indicate the point of contact (i.e., address) for drivers involved in a crash.	Y	Refer to MMUCC 6th Edition Data Element Name: D2, Driver Address (Definition: A)	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash259	PERSON DRIVER CREDENTIALS	State	Provide support for the entry and maintenance of a field to indicate the point of contact (i.e., address) for drivers involved in a crash.	Y	Refer to MMUCC 6th Edition Data Element Name: D2, Driver Address (Definition: A)	H	Meets the requirement out-of-the-box	Field Based Reporting	

Crash	PERSON DRIVER CREDENTIALS	Zip Code	Provide support for the entry and maintenance of a field to indicate the point of contact (i.e., address) for drivers involved in a crash.	Y	Refer to MMUCC 6th Edition Data Element Name: Dz, Driver Address (Definition: A data element in	H	Meets the requirement out-of-the-box	Field Based Reporting
Crash260	PERSON DRIVER CREDENTIALS	Zip Code	Provide support for the entry and maintenance of a field to indicate the point of contact (i.e., address) for drivers involved in a crash.	Y	Refer to MMUCC 6th Edition Data Element Name: Dz, Driver Address (Definition: A data element in	H	Meets the requirement out-of-the-box	Field Based Reporting
Crash261	PERSON DRIVER CREDENTIALS	Home Phone	Provide support for the entry and maintenance of a field to provide a point of contact (i.e., phone number) for drivers involved in a crash.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash262	PERSON DRIVER CREDENTIALS	Other Phone	Provide support for the entry and maintenance of a field to provide a point of contact (i.e., alternate phone number) for drivers involved in a crash.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash263	PERSON DRIVER CREDENTIALS	License Type	Provide support for the entry and maintenance of a field to identify the type of driving license issued to a driver, as well as indicates the classification of Commercial Vehicles for which a driver with a CDL license is permitted to operate.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash264	PERSON DRIVER CREDENTIALS	CDL Class	Provide support for the entry and maintenance of a field to indicate the CDL Class in which the driver is licensed.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash265	PERSON DRIVER CREDENTIALS	Issuing State	Provide support for the entry and maintenance of a field to identify the State in which the person's driving license was issued.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash266	PERSON DRIVER CREDENTIALS	License Number	Provide support for the entry and maintenance of a field to record the unique number assigned to a driver by the issuing agency.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash267	PERSON DRIVER CREDENTIALS	Lic. Restriction - None	Provide support for the entry and maintenance of a field to identify restrictions placed on the driver by a license examiner at the time of licensing.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash268	PERSON DRIVER CREDENTIALS	Lic. Restriction - Corrective Lenses	Provide support for the entry and maintenance of a field to identify whether corrective lenses is a restriction placed on the driver by a license examiner at the time of licensing.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash269	PERSON DRIVER CREDENTIALS	Lic. Restriction - Mech Devices	Provide support for the entry and maintenance of a field to identify restrictions placed on the driver by a license examiner at the time of licensing.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash270	PERSON DRIVER CREDENTIALS	Lic. Restriction - Prosthetic Aid	Provide support for the entry and maintenance of a field to identify restrictions placed on the driver by a license examiner at the time of licensing.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash271	PERSON DRIVER CREDENTIALS	Lic. Restriction - Auto Transmission	Provide support for the entry and maintenance of a field to identify restrictions placed on the driver by a license examiner at the time of licensing.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash272	PERSON DRIVER CREDENTIALS	Lic. Restriction - Outside Mirror	Provide support for the entry and maintenance of a field to identify restrictions placed on the driver by a license examiner at the time of licensing.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash273	PERSON DRIVER CREDENTIALS	Lic. Restriction - Daylight Only	Provide support for the entry and maintenance of a field to identify restrictions placed on the driver by a license examiner at the time of licensing.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash274	PERSON DRIVER CREDENTIALS	Lic. Restriction - Employment	Provide support for the entry and maintenance of a field to identify restrictions placed on the driver by a license examiner at the time of licensing.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash275	PERSON DRIVER CREDENTIALS	Lic. Restriction - Accompanied by Adult	Provide support for the entry and maintenance of a field to identify restrictions placed on the driver by a license examiner at the time of licensing.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash276	PERSON DRIVER CREDENTIALS	Lic. Restriction - Limited Other	Provide support for the entry and maintenance of a field to identify restrictions placed on the driver by a license examiner at the time of licensing.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash277	PERSON DRIVER CREDENTIALS	Lic. Restriction - CDL Intrastate Only	Provide support for the entry and maintenance of a field to identify restrictions placed on the driver by a license examiner at the time of licensing.			H	Meets the requirement out-of-the-box	Field Based Reporting

Crash278	PERSON DRIVER CREDENTIALS	Lic Restriction - Veh w/o Air Brakes	Provide support for the entry and maintenance of a field to identify restrictions placed on the driver by a license examiner at the time of licensing.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash279	PERSON DRIVER CREDENTIALS	Lic Restriction - Military Veh	Provide support for the entry and maintenance of a field to identify restrictions placed on the driver by a license examiner at the time of licensing.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash280	PERSON DRIVER CREDENTIALS	Lic Restriction - Except Class A Bus	Provide support for the entry and maintenance of a field to identify restrictions placed on the driver by a license examiner at the time of licensing.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash281	PERSON DRIVER CREDENTIALS	Lic Restriction - Except Class A and B Bus	Provide support for the entry and maintenance of a field to identify restrictions placed on the driver by a license examiner at the time of licensing.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash282	PERSON DRIVER CREDENTIALS	Lic Restriction - Except Tractor Trailer	Provide support for the entry and maintenance of a field to identify restrictions placed on the driver by a license examiner at the time of licensing.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash283	PERSON DRIVER CREDENTIALS	Lic Restriction - Farm Waiver	Provide support for the entry and maintenance of a field to identify restrictions placed on the driver by a license examiner at the time of licensing.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash284	PERSON DRIVER CREDENTIALS	Lic Restriction - Other	Provide support for the entry and maintenance of a field to identify restrictions placed on the driver by a license examiner at the time of licensing.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash285	PERSON DRIVER CREDENTIALS	Lic Restriction - Other Specific	Provide support for the entry and maintenance of a field to identify restrictions placed on the driver by a license examiner at the time of licensing.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash286	PERSON DRIVER CREDENTIALS	License Endorsements 1 - 5	Provide support for the entry and maintenance of a field to indicate whether driver has successfully completed a specialized test that qualifies them to operate specific types of vehicles, allowing up to five (5) different entries.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash287	PERSON DRIVER CREDENTIALS	License Status	Provide support for the entry and maintenance of a field to indicate the status of the driving license at the time of the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash288	DRIVER CONDITIONS INFO	Driver Condition	Provide support for the entry and maintenance of a field to indicate the believed condition of the driver at the time of the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash289	DRIVER CONDITIONS INFO	Related Factors - Driver Level	Provide support for the entry and maintenance of a field to identify factors related to this driver.	Y	Refer to MMUCL BIA Edition Data Element Name: DTD_ Related Factors - Driver Level	H	Meets the requirement out-of-the-box	Field Based Reporting
Crash290	DRIVER CONDITIONS INFO	Driver Action 1 - 4	Provide support for the entry and maintenance of a field to indicate the actions of a driver that in the reporting officer's opinion contributed to a crash, allowing up to four (4) values.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash291	DRIVER CONDITIONS INFO	Alcohol Suspected	Provide support for the entry and maintenance of a field to indicate law enforcement suspicion that the driver was under the influence of alcohol at the time of the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash292	DRIVER CONDITIONS INFO	Alcohol Test Given	Provide support for the entry and maintenance of a field to indicate whether a test was given to determine the presence of alcohol.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash293	DRIVER CONDITIONS INFO	Alcohol Test Type 1 - 2	Provide support for the entry and maintenance of a field to indicate the type of test used to collect alcohol concentration, supporting up to two (2) values.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash294	DRIVER CONDITIONS INFO	Alcohol Test Type - Other	Provide support for the entry and maintenance of a field to indicate the type of test used to collect alcohol concentration (as a freeform text field).			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash295	DRIVER CONDITIONS INFO	PBT Results	Provide support for the entry and maintenance of a field to indicate whether the driver passed or failed a Preliminary Breath Test.			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash296	DRIVER CONDITIONS INFO	Alcohol Test Results	Provide support for the entry and maintenance of a field to indicate the blood alcohol concentration found when the suspected impaired driver was tested.			H	Meets the requirement out-of-the-box	Field Based Reporting

Crash297	DRIVER CONDITIONS INFO	Drug Use Suspected	Provide support for the entry and maintenance of a field to indicate law enforcement suspicion that the driver was under the influence of drugs at the time of the crash.				H	Meets the requirement out-of-the-box	Field Based Reporting
Crash298	DRIVER CONDITIONS INFO	Drug Test Given	Provide support for the entry and maintenance of a field to indicate whether a test was given to determine the presence of drugs.				H	Meets the requirement out-of-the-box	Field Based Reporting
Crash299	DRIVER CONDITIONS INFO	Drug Test Type	Provide support for the entry and maintenance of a field to indicate the type of test used to detect drugs.				H	Meets the requirement out-of-the-box	Field Based Reporting
Crash300	DRIVER CONDITIONS INFO	Driver - No Drugs Found	Provide support for the entry and maintenance of a field to indicate if drugs were found in driver's system.				H	Meets the requirement out-of-the-box	Field Based Reporting
Crash301	DRIVER CONDITIONS INFO	Driver - Marijuana	Provide support for the entry and maintenance of a field to indicate if marijuana was found in driver's system.				H	Meets the requirement out-of-the-box	Field Based Reporting
Crash302	DRIVER CONDITIONS INFO	Driver - Cocaine	Provide support for the entry and maintenance of a field to indicate if cocaine was found in driver's system.				H	Meets the requirement out-of-the-box	Field Based Reporting
Crash303	DRIVER CONDITIONS INFO	Driver - Opiate	Provide support for the entry and maintenance of a field to indicate if opiate was found in driver's system.				H	Meets the requirement out-of-the-box	Field Based Reporting
Crash304	DRIVER CONDITIONS INFO	Driver - Amphetamine	Provide support for the entry and maintenance of a field to indicate if amphetamine was found in driver's system.				H	Meets the requirement out-of-the-box	Field Based Reporting
Crash305	DRIVER CONDITIONS INFO	Driver - PCP	Provide support for the entry and maintenance of a field to indicate if PCP was found in driver's system.				H	Meets the requirement out-of-the-box	Field Based Reporting
Crash306	DRIVER CONDITIONS INFO	Driver - Other Controlled Substance	Provide support for the entry and maintenance of a field to indicate if another controlled substance was found in driver's system.				H	Meets the requirement out-of-the-box	Field Based Reporting
Crash307	DRIVER CONDITIONS INFO	Driver - Other Drug Found	Provide support for the entry and maintenance of a field to indicate the other drug found.				H	Meets the requirement out-of-the-box	Field Based Reporting
Crash308	DRIVER CONDITIONS INFO	Driver - Results Pending	Provide support for the entry and maintenance of a field to indicate if the drug results are pending. Provide a pull down box showing that the results are being completed by: State Police Lab, Hospital, or Other.				H	Meets the requirement out-of-the-box	Field Based Reporting
Crash309	DRIVER CONDITIONS INFO	Distracted By	Provide support for the entry and maintenance of a field to indicate driver distractions in or out of the vehicle that may have contributed to the crash.	Y		Refer to MMUCC 6th Edition Data Element Name: D6, Driver Distraction (Definition: Refer to MMUCC 6th Edition Data Element Name: D8, Driver's Vision Obscured By.	H	Meets the requirement out-of-the-box	Field Based Reporting
Crash310	DRIVER CONDITIONS INFO	Driver's Vision Obscured by	Provide support for the entry and maintenance of a field to record impediments to a driver's visual field.	Y			H	Meets the requirement out-of-the-box	Field Based Reporting
Crash311	DRIVER VIOLATION	DVio - No Violations	Provide support for the entry and maintenance of a field to indicate if there were violations given to the driver.				H	Meets the requirement out-of-the-box	Field Based Reporting
Crash312	DRIVER VIOLATION	DVio - Negligent Homicide	Provide support for the entry and maintenance of a field to indicate if a negligent homicide violation was given to the driver.				H	Meets the requirement out-of-the-box	Field Based Reporting
Crash313	DRIVER VIOLATION	DVio - Reckless Driving	Provide support for the entry and maintenance of a field to indicate if a reckless driving violation was given to the driver.				H	Meets the requirement out-of-the-box	Field Based Reporting
Crash314	DRIVER VIOLATION	DVio - Inattentive, Careless/Improper Driving	Provide support for the entry and maintenance of a field to indicate if a improper driving violation was given to the driver.				H	Meets the requirement out-of-the-box	Field Based Reporting

Crash315	DRIVER VIOLATION	DVio - Fleeing or Eluding Law Enforcement	Provide support for the entry and maintenance of a field to indicate if a fleeing or eluding law enforcement violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash316	DRIVER VIOLATION	DVio - Failure to Obey LE	Provide support for the entry and maintenance of a field to indicate if a failure to obey LE violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash317	DRIVER VIOLATION	DVio - Hit and Run, Failure to Stop	Provide support for the entry and maintenance of a field to indicate if a hit & run violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash318	DRIVER VIOLATION	DVio - Serious Violation Resulting in Death	Provide support for the entry and maintenance of a field to indicate if a serious violation that resulted in death was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash319	DRIVER VIOLATION	DVio - DW Intoxicated or BAC Above Limit	Provide support for the entry and maintenance of a field to indicate if a DW intoxicated or BAC above limit violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash320	DRIVER VIOLATION	DVio - DW Impaired	Provide support for the entry and maintenance of a field to indicate if a DW impaired violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash321	DRIVER VIOLATION	DVio - DUI of Controlled Substance	Provide support for the entry and maintenance of a field to indicate if a DUI of Controlled Substance violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash322	DRIVER VIOLATION	DVio - DUI of Non-Controlled Substance	Provide support for the entry and maintenance of a field to indicate if a DUI of Non-Controlled Substance violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash323	DRIVER VIOLATION	DVio - Drinking While Operating	Provide support for the entry and maintenance of a field to indicate if a drinking while operating violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash324	DRIVER VIOLATION	DVio - Illegal Possession of Alcohol or Drugs	Provide support for the entry and maintenance of a field to indicate if an illegal possession of Alcohol or Drugs violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash325	DRIVER VIOLATION	DVio - Driving w/ Detectable Alcohol	Provide support for the entry and maintenance of a field to indicate if a Driving w/ Detectable Alcohol violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash326	DRIVER VIOLATION	DVio - Refusal to Submit to Chemical Test	Provide support for the entry and maintenance of a field to indicate if a Refusal to Submit to Chemical Test violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash327	DRIVER VIOLATION	DVio - Failure to Maintain Control of Vehicle	Provide support for the entry and maintenance of a field to indicate if a Failure to Maintain Control of Vehicle violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash328	DRIVER VIOLATION	DVio - Racing	Provide support for the entry and maintenance of a field to indicate if a Racing violation was given to the driver.	Y	Refer to MMUCC 6th Edition Data Element Name: D5 - Speeding-Related Element	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash329	DRIVER VIOLATION	DVio - Speeding (Above SL)	Provide support for the entry and maintenance of a field to indicate if a Speeding violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash330	DRIVER VIOLATION	DVio - Speed Greater than Prudent	Provide support for the entry and maintenance of a field to indicate if a Speed Greater than Prudent violation was given to the driver.	Y	Refer to MMUCC 6th Edition Data Element Name: D5 - Speeding-Related Element	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash331	DRIVER VIOLATION	DVio - Exceeding Special Limit	Provide support for the entry and maintenance of a field to indicate if a Exceeding Special Limit violation was given to the driver.	Y	Refer to MMUCC 6th Edition Data Element Name: D5 - Speeding-Related Element	H	Meets the requirement out-of-the-box	Field Based Reporting	

Crash332	DRIVER VIOLATION	DVio - Driving too Slowly	Provide support for the entry and maintenance of a field to indicate if a Driving too Slowly violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash333	DRIVER VIOLATION	DVio - Failure to Stop for Red Signal	Provide support for the entry and maintenance of a field to indicate if a Failure to Stop for Red Signal violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash334	DRIVER VIOLATION	DVio - Failure to Stop for Flashing Red Signal	Provide support for the entry and maintenance of a field to indicate if a Failure to Stop for Flashing Red Signal violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash335	DRIVER VIOLATION	DVio - Violation of Turn on Red	Provide support for the entry and maintenance of a field to indicate if a Violation of Turn on red violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash336	DRIVER VIOLATION	DVio - Failure to Obey Flashing Signal - Y or R	Provide support for the entry and maintenance of a field to indicate if a Failure to Obey Flashing Signal violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash337	DRIVER VIOLATION	DVio - Failure to Obey Signal - Generally	Provide support for the entry and maintenance of a field to indicate if a Failure to Obey Signal violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash338	DRIVER VIOLATION	DVio - Violation of RR Grade Crossing	Provide support for the entry and maintenance of a field to indicate if a Violation of RR Grade Crossing violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash339	DRIVER VIOLATION	DVio - Failure to Obey STOP Sign	Provide support for the entry and maintenance of a field to indicate if a Failure to Obey STOP Sign violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash340	DRIVER VIOLATION	DVio - Failure to Obey YIELD Sign	Provide support for the entry and maintenance of a field to indicate if a Failure to Obey YIELD Sign violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash341	DRIVER VIOLATION	DVio - Failure to Obey Traffic Control Device	Provide support for the entry and maintenance of a field to indicate if a Failure to Obey Traffic Control Device violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash342	DRIVER VIOLATION	DVio - Unsafe or Prohibited Lane Change	Provide support for the entry and maintenance of a field to indicate if a Unsafe or Prohibited Lane Change violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash343	DRIVER VIOLATION	DVio - Improper Use of Lane	Provide support for the entry and maintenance of a field to indicate if an Improper Use of Lane Violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash344	DRIVER VIOLATION	DVio - Certain Traffic to Use Right Lane	Provide support for the entry and maintenance of a field to indicate if a Certain Traffic to Use Right Lane violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash345	DRIVER VIOLATION	DVio - Lane Violations Generally	Provide support for the entry and maintenance of a field to indicate if a Lane Violations Generally violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash346	DRIVER VIOLATION	DVio - Driving Wrong Way on 1 Way St	Provide support for the entry and maintenance of a field to indicate if a Driving Wrong Way on 1 Way St violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash347	DRIVER VIOLATION	DVio - Driving on Left, Wrong Side of Rd	Provide support for the entry and maintenance of a field to indicate if a Driving on Left, Wrong Side of Rd violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash348	DRIVER VIOLATION	DVio - Improper Unsafe Passing	Provide support for the entry and maintenance of a field to indicate if an Improper Unsafe Passing violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash349	DRIVER VIOLATION	DVio - Passing on Rt	Provide support for the entry and maintenance of a field to indicate if a Passing on Rt violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash350	DRIVER VIOLATION	DVio - Passing Stopped School Bus	Provide support for the entry and maintenance of a field to indicate if a Passing Stopped School Bus violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	

Crash351	DRIVER VIOLATION	DVio - Failure to Give Way	Provide support for the entry and maintenance of a field to indicate if a Failure to Give Way violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash352	DRIVER VIOLATION	DVio - Following Too Closely	Provide support for the entry and maintenance of a field to indicate if a Following Too Closely violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash353	DRIVER VIOLATION	DVio - Wrong Side, Generally	Provide support for the entry and maintenance of a field to indicate if a Wrong Side violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash354	DRIVER VIOLATION	DVio - Turn in Violation of Traffic Control	Provide support for the entry and maintenance of a field to indicate if a Turn in Violation of Traffic Control violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash355	DRIVER VIOLATION	DVio - Improper Method and Position of Turn	Provide support for the entry and maintenance of a field to indicate if an Improper Method and Position of Turn violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash356	DRIVER VIOLATION	DVio - Failure to Signal for Turn or Stop	Provide support for the entry and maintenance of a field to indicate if a Failure to Signal for Turn or Stop violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash357	DRIVER VIOLATION	DVio - Failure to Yield to Emerg Veh	Provide support for the entry and maintenance of a field to indicate if a Failure to Yield to Emerg Veh violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash358	DRIVER VIOLATION	DVio - Failure to Yield Generally	Provide support for the entry and maintenance of a field to indicate if a Failure to Yield Generally violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash359	DRIVER VIOLATION	DVio - Enter Intersection w/ Insufficient Space	Provide support for the entry and maintenance of a field to indicate if a Enter Intersection w/ Insufficient Space violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash360	DRIVER VIOLATION	DVio - DW License Suspended	Provide support for the entry and maintenance of a field to indicate if a DW License Suspended violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash361	DRIVER VIOLATION	DVio - Other License Restrictions	Provide support for the entry and maintenance of a field to indicate if a Other License Restrictions violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash362	DRIVER VIOLATION	DVio - Commercial Driver Violations	Provide support for the entry and maintenance of a field to indicate if a Commercial Driver Violations violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash363	DRIVER VIOLATION	DVio - Vehicle Registration Violations	Provide support for the entry and maintenance of a field to indicate if a Vehicle Registration Violations violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash364	DRIVER VIOLATION	DVio - Failure to Carry Insurance Card	Provide support for the entry and maintenance of a field to indicate if a Failure to Carry Insurance Card violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash365	DRIVER VIOLATION	DVio - Driving Uninsured Vehicle	Provide support for the entry and maintenance of a field to indicate if a Driving Uninsured Vehicle violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash366	DRIVER VIOLATION	DVio - Non-Moving Violations Generally	Provide support for the entry and maintenance of a field to indicate if a Non-Moving Violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash367	DRIVER VIOLATION	DVio - Lamp Violations	Provide support for the entry and maintenance of a field to indicate if a Lamp violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash368	DRIVER VIOLATION	DVio - Brake Violations	Provide support for the entry and maintenance of a field to indicate if a Brake violation was given to the driver.			H	Meets the requirement out-of-the-box	Field Based Reporting	

Crash384	DRIVER INVOLVED INDIVIDUALS INFO	Seating Position Other	Provide support for the entry and maintenance of a field to indicate the location of an individual in, on, or outside of the motor vehicle prior to the crash.	Y	Refer to MMUCC 6th Edition Data Element Name: P13, Seating Position Element	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash385	DRIVER INVOLVED INDIVIDUALS INFO	Occupant Protection Type	Provide support for the entry and maintenance of a field to indicate the restraint equipment in use by a vehicle occupant or helmet use by a motorcyclist, ATV Rider, etc. at the time of the crash.	Y	Refer to MMUCC 6th Edition Data Element Name: P14, Restraint System Use Element	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash386	DRIVER INVOLVED INDIVIDUALS INFO	Occupant Protection Proper Use	Provide support for the entry and maintenance of a field to indicate whether the occupant protection being used by an individual was being used properly.	Y	Refer to MMUCC 6th Edition Data Element Name: P15, Restraint System Use Element	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash387	DRIVER INVOLVED INDIVIDUALS INFO	Approved Helmet (Helmet Use)	Provide support for the entry and maintenance of a field to indicate whether the helmet used by a motorcyclist, ATV Rider, etc. was an appropriate and approved helmet.	Y	Refer to MMUCC 6th Edition Data Element Name: P15, Helmet Use Element (Definition: Records the type of helmet in use by a motorcyclist, ATV Rider, etc.)	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash388	DRIVER INVOLVED INDIVIDUALS INFO	Air Bag Deployed	Provide support for the entry and maintenance of a field to indicate airbag deployment relative to an individual's seating position.	Y	Refer to MMUCC 6th Edition Data Element Name: P16, Air Bag Deployed Element (Definition: Records the type of helmet in use by a motorcyclist, ATV Rider, etc.)	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash389	DRIVER INVOLVED INDIVIDUALS INFO	Trapped-Extricated	Provide support for the entry and maintenance of a field to indicate whether an individual was trapped in the vehicle as a result of the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash390	DRIVER INVOLVED INDIVIDUALS INFO	Ejected	Provide support for the entry and maintenance of a field to indicate whether an individual was completely or partially thrown from the interior of the motor vehicle.	Y	Refer to MMUCC 6th Edition Data Element Name: P17, Ejection Element (Definition: Records the type of helmet in use by a motorcyclist, ATV Rider, etc.)	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash391	DRIVER INVOLVED INDIVIDUALS INFO	Ejection Path	Provide support for the entry and maintenance of a field to indicate the path through which an individual was ejected from the vehicle during a crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash392	NON-MOTORIST	Unit Number of Striking Vehicle	Provide support for the entry and maintenance of a field to identify the vehicle which struck the non-motorist during the crash.	Y	Refer to MMUCC 6th Edition Data Element Name: NM1, Vehicle Striking Non-Motorist	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash393	NON-MOTORIST	Action Prior to Crash	Provide support for the entry and maintenance of a field to identify the action of the non-motorist just prior to the crash.	Y	Refer to MMUCC 6th Edition Data Element Name: NM2, Non-Motorist Status Prior to Collision Event	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash394	NON-MOTORIST	Location Prior to Crash	Provide support for the entry and maintenance of a field to identify the location of the non-motorist just prior to the first harmful event of the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash395	NON-MOTORIST	Non-Motorist Distraction Element	Provide support for the entry and maintenance of a field to identify this non-motorist's attention prior to the non-motorist's involvement in this crash.	Y	Refer to MMUCC 6th Edition Data Element Name: NM3, Non-Motorist Distraction Element (Definition: Records the type of helmet in use by a motorcyclist, ATV Rider, etc.)	H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash396	NON-MOTORIST	NM Contributing Action1	Provide support for the entry and maintenance of a field to identify the actions of the non-motorist at the time of the crash that may have contributed to the crash.	Y	Refer to MMUCC 6th Edition Data Element Name: NM4, Non-Motorist Contributing Circumstances Element (Definition: Records the type of helmet in use by a motorcyclist, ATV Rider, etc.)	H	Meets the requirement out-of-the-box	Field Based Reporting	

Crash397	NON-MOTORIST	NM Contributing Action2	Provide support for the entry and maintenance of a field to identify the actions of the non-motorist at the time of the crash that may have contributed to the crash.					H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash398	NON-MOTORIST	NM Contributing Action - Narrative	Provide support for the entry and maintenance of a field to identify the actions of the non-motorist at the time of the crash that may have contributed to the crash.	Y	This data element has been defined based on the MMUCC 6th Edition requirement defined as "Other (explain in narrative)" Refer to MMUCC 6th Edition Data Element Name: NM7. Non-Motorist Specific Location Element			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash399	NON-MOTORIST	Location at Time of Crash	Provide support for the entry and maintenance of a field to identify the non-motorist's location with respect to the roadway at the time of the crash.	Y	Refer to MMUCC 6th Edition Data Element Name: NM7. Non-Motorist Specific Location Element			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash400	NON-MOTORIST	Non-Motorist at Intersection	Provide support for the entry and maintenance of a field to identify the location of the non-motorist with respect to an intersection at the time of the crash.	Y	Refer to MMUCC 6th Edition Data Element Name: NM5. Non-Motorist at Intersection Element (Definition: The location of the non-motorist with respect to the intersection at the time of the crash.)			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash401	NON-MOTORIST	Non-Motorist in Crosswalk	Provide support for the entry and maintenance of a field to identify the location of the non-motorist with respect to a crosswalk at the time of the crash.	Y	Refer to MMUCC 6th Edition Data Element Name: NM6. Non-Motorist in Crosswalk Element (Definition: The location of the non-motorist with respect to the crosswalk at the time of the crash.)			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash402	NON-MOTORIST	NM Safety Equipment 1-2	Provide support for the entry and maintenance of a field to identify safety equipment, if any, being utilized by the non-motorist at the time of the crash.	Y	Refer to MMUCC 6th Edition Data Element Name: NM8. Non-Motorist Safety Equipment Element			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash403	NON-MOTORIST	Non-Motorist Device Type Element	Provide support for the entry and maintenance of a field to identify the type of transport device and motorization of the device operated by the non-motorist.	Y	Refer to MMUCC 6th Edition Data Element Name: NM9. Non-Motorist Device Type Element (Definition: The type of transport device operated by the non-motorist.)			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash404	NON-MOTORIST	NM Traffic Control Device 1-2	Provide support for the entry and maintenance of a field to indicate the type of traffic control device that was applicable to the non-motorist at the time of the crash.	Y	Refer to MMUCC 6th Edition Data Element Name: NM10. Non-Motorist Traffic Control Device Element (Definition: The traffic control device applicable to the non-motorist at the time of the crash.)			H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash405	NON-MOTORIST	NM Condition at Time of Crash	Provide support for the entry and maintenance of a field to indicate the apparent condition of the non-motorist at the time of the crash.					H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash406	NON-MOTORIST	Alcohol Suspected	Provide support for the entry and maintenance of a field to indicate law enforcement suspicion that a non-motorist was under the influence of alcohol at the time of the crash.					H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash407	NON-MOTORIST	Alcohol Test Given	Provide support for the entry and maintenance of a field to indicate whether a test was given to determine the presence of alcohol.					H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash408	NON-MOTORIST	Alcohol Test Type1	Provide support for the entry and maintenance of a field to indicate the type of test used to collect alcohol concentration.					H	Meets the requirement out-of-the-box	Field Based Reporting	
Crash409	NON-MOTORIST	Alcohol Test Results	Provide support for the entry and maintenance of a field to indicate the blood alcohol concentration found when the suspected impaired driver was tested.					H	Meets the requirement out-of-the-box	Field Based Reporting	

CrashM10	NON-MOTORIST	Drug Use Suspected	Provide support for the entry and maintenance of a field to indicate law enforcement suspicion that the non-motorist was under the influence of drugs at the time of the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	
CrashM11	NON-MOTORIST	Drug Test Given	Provide support for the entry and maintenance of a field to indicate whether a test was given to determine the presence of drugs.			H	Meets the requirement out-of-the-box	Field Based Reporting	
CrashM12	NON-MOTORIST	Drug Test Type	Provide support for the entry and maintenance of a field to indicate the type of test used to detect drugs.			H	Meets the requirement out-of-the-box	Field Based Reporting	
CrashM13	NON-MOTORIST	Non-Motorist-Drug Test Results 1-4	Provide support for the entry and maintenance of a field to indicate the results of the test used to detect the presence of drugs.			H	Meets the requirement out-of-the-box	Field Based Reporting	
CrashM14	NON-MOTORIST	NM - Violation 1-4	Provide support for the entry and maintenance of a field to indicate any violations of the law that the reporting officer either suspects or knows were committed by the non-motorist. Does not necessarily indicate that a citation was issued for the violation(s).			H	Meets the requirement out-of-the-box	Field Based Reporting	
CrashM15	NON-MOTORIST	Citation Charge1	Provide support for the entry and maintenance of a field to indicate any citations issued to the non-motorist as a result of the crash investigation.			H	Meets the requirement out-of-the-box	Field Based Reporting	
CrashM16	NON-MOTORIST	Citation Code1	Provide support for the entry and maintenance of a field to indicate the code reference for the law that was violated.			H	Meets the requirement out-of-the-box	Field Based Reporting	
CrashM17	NON-MOTORIST	Citation Number1	Provide support for the entry and maintenance of a field to indicate the number of citation used.			H	Meets the requirement out-of-the-box	Field Based Reporting	
CrashM18	NON-MOTORIST	Warning1	Provide support for the entry and maintenance of a field to indicate if a warning was issued instead of a citation.			H	Meets the requirement out-of-the-box	Field Based Reporting	
CrashM19	DMV-LICENSE	DMV-LICENSE	Provide the ability to provide the ability to scan a state-issued Driver License (barcode/magnetic stripe/MRZ) to auto-populate all available license data fields.			H	Meets the requirement out-of-the-box	Field Based Reporting	
CrashM20	DMV-LICENSE	DMV-LICENSE	Provide the ability to allow the officer to override, correct, or manually update any auto-populated DMV-License information.			H	Meets the requirement out-of-the-box	Field Based Reporting	
CrashM21	DMV-LICENSE	DMV-LICENSE	Provide the ability to support adding and managing passenger information, including name, date of birth, seating position, injury status, and ID/Driver License scan (if available).			H	Meets the requirement out-of-the-box	Field Based Reporting	
CrashM22	DMV-LICENSE	DMV-LICENSE	Provide the ability to maintain an audit log of all officer overrides or manual edits to DMV-License or passenger information.			H	Meets the requirement out-of-the-box	Field Based Reporting	
CrashM23	DMV-VEHICLE	DMV-LICENSE	Provide the ability to provide the ability to scan a vehicle registration document to auto-populate vehicle and owner information (VIN, plate, make/model, expiration, owner data).			H	Meets the requirement out-of-the-box	Field Based Reporting	
CrashM24	DMV-VEHICLE	DMV-LICENSE	Provide the ability to allow the officer to override or manually update any auto-populated vehicle or owner information.			H	Meets the requirement out-of-the-box	Field Based Reporting	
CrashM25	DMV-VEHICLE	DMV-LICENSE	Provide the ability to validate VIN, plate number, and expiration formats and flag inconsistencies for officer review.			H	Meets the requirement out-of-the-box	Field Based Reporting	
CrashM26	DMV-VEHICLE	DMV-LICENSE	Provide the ability to display a side-by-side comparison of scanned data and officer-entered data to resolve discrepancies in case of review.			H	Meets the requirement out-of-the-box	Field Based Reporting	
CrashM27	DMV-VEHICLE	DMV-LICENSE	Provide the ability to support adding and maintaining an email address for drivers involved in the crash.			H	Meets the requirement out-of-the-box	Field Based Reporting	

WV DOT Crash Citation Item Requirements

Req. #	Category	Sub Category/ Field Name	Business/Functional Requirement	Priority H = High M = Medium L = Low	Vendor Response	Compliance in Estimate if Applicable	Capability Planned for Future Release	Core Modules/ Solutions	Third Party Solutions	Comments/Notes
CIT1	Violator Information Management	Violator Information Management	Provide PDF417 barcode scanning for all 50 states and automatically fill in field values from a driver's license.	H	Meets the requirement out of-the-box			Field Based Reporting		Can read information from AAMVA compatible states
CIT1	Violator Information Management	Violator Information Management	Provide support for the entry and maintenance of a field to indicate if violator full name is complete.	H	Meets the requirement out of-the-box			Field Based Reporting		
CIT2	Violator Information Management	Violator Information Management	Provide support for the entry and maintenance of a field to indicate if address is complete.	H	Meets the requirement out of-the-box			Field Based Reporting		
CIT3	Violator Information Management	Violator Information Management	Provide support for the entry and maintenance of a field to indicate if date of birth, gender, height, weight, and eye color are complete.	H	Meets the requirement out of-the-box			Field Based Reporting		
CIT4	Violator Information Management	Violator Information Management	Provide support for the entry and maintenance of a field to indicate if drivers license information is complete.	H	Meets the requirement out of-the-box			Field Based Reporting		
CIT5	Violator Information Management	Violator Information Management	Provide support for the entry and maintenance of a field to indicate if GDL or permit type is captured.	H	Meets the requirement out of-the-box			Field Based Reporting		
CIT5	Violator Information Management	Violator Information Management	Provide PDF417 barcode scanning for all 50 states and automatically fill in field values from a vehicle registration or license plate.	H	Meets with modification to Base Code		Capability Planned for upcoming release	Field Based Reporting		Can read information from AAMVA compatible states
CIT6	Vehicle Information Management	Vehicle Information Management	Provide support for the entry and maintenance of a field to indicate if vehicle license plate information is complete.	H	Meets the requirement out of-the-box			Field Based Reporting		
CIT7	Vehicle Information Management	Vehicle Information Management	Provide support for the entry and maintenance of a field to indicate if VIN, make, model, color, and body style are complete.	H	Meets the requirement out of-the-box			Field Based Reporting		
CIT8	Vehicle Information Management	Vehicle Information Management	Provide support for the entry and maintenance of a field to indicate if vehicle owner/lessee information is recorded.	H	Meets the requirement out of-the-box			Field Based Reporting		
CIT9	Vehicle Information Management	Vehicle Information Management	Provide support for the entry and maintenance of a field to indicate if CVW details are recorded when applicable.	H	Meets the requirement out of-the-box			Field Based Reporting		
CIT10	Violation Details	Violation Details	Provide support for the entry and maintenance of a field to indicate if citation number is within an assigned block.	H	Meets the requirement out of-the-box			Field Based Reporting		
CIT11	Violation Details	Violation Details	Provide support for the entry and maintenance of a field to indicate if one violation is linked per charge.	H	Meets the requirement out of-the-box			Field Based Reporting		
CIT12	Violation Details	Violation Details	Provide support for the entry and maintenance of a field to indicate if violation description is linked to WV Code or municipal ordinance.	H	Meets the requirement out of-the-box			Field Based Reporting		
CIT13	Violation Details	Violation Details	Provide support for the entry and maintenance of a field to indicate if speeding details are recorded.	H	Meets the requirement out of-the-box			Field Based Reporting		
CIT14	Violation Details	Violation Details	Provide support for the entry and maintenance of a field to indicate if location details are recorded.	H	Meets the requirement out of-the-box			Field Based Reporting		
CIT15	Violation Details	Violation Details	Provide support for the entry and maintenance of a field to indicate if GPS coordinates are captured.	H	Meets the requirement out of-the-box			Field Based Reporting		
CIT16	Violation Details	Violation Details	Provide support for the entry and maintenance of a field to indicate if officer details are recorded.	H	Meets the requirement out of-the-box			Field Based Reporting		
CIT17	Violation Details	Violation Details	Provide support for the entry and maintenance of a field to indicate if type of roadway is recorded.	H	Meets the requirement out of-the-box			Field Based Reporting		
CIT18	Violation Details	Violation Details	Provide support for the entry and maintenance of a field to indicate if citation includes mandatory in-person plea violations.	H	Meets the requirement out of-the-box			Field Based Reporting		
CIT19	Violation Details	Violation Details	Provide support for the entry and maintenance of a field to indicate if citation includes an Out of Service Order violation.	H	Meets the requirement out of-the-box			Field Based Reporting		
CIT20	Violation Details	Violation Details	Provide support for the entry and maintenance of a field to indicate if citation includes Non-Resident Violators Compact applicability.	H	Meets the requirement out of-the-box			Field Based Reporting		
CIT21	Violation Details	Violation Details	Once a citation has been printed/issued, it should be locked down to eliminate the ability for it to be changed after the fact. Any additional changes will need to be handled through the disposition process.	H	Meets the requirement out of-the-box			Field Based Reporting		
CIT23	Violation Details	Violation Details	Provide the ability to print a citation in different formats (i.e. page size to accommodate mobile printers, full page printers, and print to PDF).		Meets the requirement out of-the-box			Field Based Reporting		
CIT24	Violation Details	Violation Details	Provide the ability to link citation to a crash report		Meets the requirement out of-the-box			Field Based Reporting		
CIT25	Violation Details	Violation Details	Provide the ability for an agency reference to incident by free typing text box (i.e. agency reporting to associate this to a non-crash report incident number)		Meets the requirement out of-the-box			Field Based Reporting		
CIT37	Court & Disposition Information	Court & Disposition Information	Provide support for the entry and maintenance of a field to indicate if court name, address, and phone are captured.	H	Meets the requirement out of-the-box			Field Based Reporting		
CIT38	Court & Disposition Information	Court & Disposition Information	Provide support for the entry and maintenance of a field to indicate if court appearance data is provided.	H	Meets the requirement out of-the-box			Field Based Reporting		

CIT39	Court & Disposition Information	Court & Disposition Information	Provide support for the entry and maintenance of a field to indicate if violator acknowledgment signature is recorded.	H	Meets the requirement out of-the-box	Field Based Reporting
CIT40	Court & Disposition Information	Court & Disposition Information	Provide support for the entry and maintenance of a field to indicate if plea choice is recorded.	H	Meets the requirement out of-the-box	Field Based Reporting
CIT41	Court & Disposition Information	Court & Disposition Information	Provide support for the entry and maintenance of a field to indicate if court disposition is entered for each charge.	H	Meets the requirement out of-the-box	Field Based Reporting
CIT42	Court & Disposition Information	Court & Disposition Information	Provide support for the entry and maintenance of a field to indicate if conviction and reduced charge codes are entered.	H	Meets the requirement out of-the-box	Field Based Reporting
CIT43	Court & Disposition Information	Court & Disposition Information	Provide support for the entry and maintenance of a field to indicate if license action and fine amount are recorded.	H	Meets the requirement out of-the-box	Field Based Reporting
CIT44	Court & Disposition Information	Court & Disposition Information	Provide support for the entry and maintenance of a field to indicate if case numbers are linked to the citation.	H	Meets the requirement out of-the-box	Field Based Reporting
CIT45	Court & Disposition Information	Court & Disposition Information	Provide support for the entry and maintenance of a field to indicate if a citation was voided by an officer.	H	Meets the requirement out of-the-box	Field Based Reporting
CIT46	Court & Disposition Information	Court & Disposition Information	Provide support for the entry and maintenance of a field to indicate if a citation was forwarded to WV DMV or WV Highway Safety Program or WV DNR.	H	Meets the requirement out of-the-box	Field Based Reporting
CIT47	Citation Location	Geo-location	Provide the ability to provide the officer the ability to geo-locate the citation using GPS at the point of issuance.	H	Meets the requirement out of-the-box	Field Based Reporting
CIT48	Citation Location	Geo-location	Provide the ability to automatically map the captured location to roadway, route, milepost, and jurisdiction attributes when LRS services are available.	H	Meets the requirement out of-the-box	Field Based Reporting
CIT49	Citation Location	Geo-location	Provide the ability to allow the officer to override and manually adjust the location to match the correct Linear Referencing System (LRS) values (e.g., route ID, milepost, direction, offset).	H	Meets the requirement out of-the-box	Field Based Reporting
CIT50	Citation-DNR	DNR	Provide the ability to capture and maintain hunting/fishing license number and license type on Citations		Meets the requirement out of-the-box	Field Based Reporting
CIT51	Citation-DNR	DNR	Provide the ability to support the scanning of hunting/fishing licenses to auto-populate license fields (and allow override if necessary)		Meets the requirement out of-the-box	Field Based Reporting
CIT52	Citation-DNR	DNR	Provide the ability to allow boater/watercraft information to be entered in place of in addition to vehicle information.		Meets the requirement out of-the-box	Field Based Reporting
CIT53	Citation-DNR	DNR	Provide the ability to capture and maintain a field to record state-mandated wildlife replacement costs, with manual entry of automated business rules.		Meets the requirement out of-the-box	Field Based Reporting
CIT54	Citation-DNR	DNR	Provide the ability to capture and maintain fields to document confiscated property (such as firearms, equipment, wildlife, etc.)		Meets the requirement out of-the-box	Field Based Reporting
CIT55	Citation-DNR	DNR	Provide the ability to capture and maintain officer notes for supplemental comments for court or agency review.		Meets the requirement out of-the-box	Field Based Reporting
CIT56	Citation-DNR	DNR	Provide the ability to support notification routing to DNR, similar to the existing WVDNR and Highway Safety Notifications.		Meets the requirement out of-the-box	Field Based Reporting

Req. #	Category	Sub-Category	Business Functional Requirement	Priority H = High M = Medium L = Low	Vendor Response	Customization Estimate, if Applicable	Currently Planned for Future Release	Core Modules	Third Party Solution(s)	Comments/Notes
RFF1	Reports for Sale	Reports for Sale	The system shall support the generation of required reports that are optionally purchasable. Each agency can denote whether their crash reports are available for sale and at what price point (base report, charge per photo, charge per video, etc.). When payment is necessary, the system shall direct the user to the State Treasurer's Office website to complete the transaction, likely via a token and will wait for the Treasurer's Office to return the token with a status of "funds collected" or "funds not collected" along with a reason code." The system shall not capture or store payment details, and reports shall only be released (for download) upon confirmation of successful payment from the Treasurer's Office.	H	Meets with modification to Base Code	Medium: Medium customization(s) requiring a total of 80 to 160 hours for specification, development, and unit testing		SmartWeb		
RFF2	Reports for Sale	Reports for Sale	Provide the capability of defining reports that agencies might offer for sale	H	Meets with modification to Base Code	Medium: Medium customization(s) requiring a total of 80 to 160 hours for specification, development, and unit testing		SmartWeb		
RFF3	Reports for Sale	Reports for Sale	Provide capability for each agency to opt in or out of selling reports (e.g., Y/N)	H	Meets with modification to Base Code	Medium: Medium customization(s) requiring a total of 80 to 160 hours for specification, development, and unit testing		SmartWeb		
RFF4	Reports for Sale	Reports for Sale	Provide capability for each agency to opt in or out of specific pre-defined reports	H	Meets with modification to Base Code	Medium: Medium customization(s) requiring a total of 80 to 160 hours for specification, development, and unit testing		SmartWeb		
RFF5	Reports for Sale	Reports for Sale	Provide capability for each agency to set the selling price for each sellable report, attachments, photo, or video (if available)	H	Meets with modification to Base Code	Medium: Medium customization(s) requiring a total of 80 to 160 hours for specification, development, and unit testing		SmartWeb		
RFF6	Reports for Sale	Reports for Sale	Provide the capability of selling any combination of <ul style="list-style-type: none"> Crash Reports Crash Reconstruction Other document types, such as attachments, pictures, videos, etc. For these types of add-ons, provide the ability to select single, multiple, or all. 	H	Meets with modification to Base Code	Medium: Medium customization(s) requiring a total of 80 to 160 hours for specification, development, and unit testing		SmartWeb		
RFF7	Reports for Sale	Reports for Sale	Provide the capability of defining fields to be redacted on these reports by the agency selling the report, based on business rules established by the agency	H	Meets with modification to Base Code	Medium: Medium customization(s) requiring a total of 80 to 160 hours for specification, development, and unit testing		SmartWeb		
RFF8	Reports for Sale	Reports for Sale	Provide the ability for the agency to redact information on juveniles (minors)	H	Meets with modification to Base Code	Medium: Medium customization(s) requiring a total of 80 to 160 hours for specification, development, and unit testing		SmartWeb		

RFF#	Reports for Sale	Reports for Sale	Provide the capability to define business rules which determine whether a report is eligible to be sold online or not	H	Meets with modification to Base Code	Medium: Medium customization(s) requiring a total of 80 to 160 hours for specification, development, and unit testing	SmartWeb
RFF9	Reports for Sale						
RFF10	Report Features and Functions	General	Provide an information exchange option, able to be printed and distributed both at the crash scene and from the admin console that complies with WV State Code §17C-4-7(b), utilizing the information entered into this report. <i>Note: §17C-4-7(b) Within 24 hours of a motor vehicle crash, the investigating law enforcement officer shall provide the owner, operator, and insurance information upon request for all the involved parties to each of the other involved parties, and to each party's respective insurance company.</i>	H	Out-of-the-Box with configuration required to meet		Field Based Reporting
RFF11	Report Features and Functions	General	Provide the ability to create information exchange report(s) for drivers involved in a crash	H	Meets the requirement out-of-the-box		Field Based Reporting
RFF12	Report Features and Functions	General	Provide the ability to create a Reconstruction Report for a crash	H	Meets the requirement out-of-the-box		Field Based Reporting
RFF13	Report Features and Functions	General	Provide pre-defined reports that are automatically generated and distributed (pushed to the user, report portal, etc.) to support day-to-day business functions; provide the necessary tools to configure reports, and copy existing reports as the basis for additional reports.	H	Out-of-the-Box with configuration required to meet		Field Based Reporting
RFF14	Report Features and Functions	General	Provide sufficient control reports and proactive monitoring to ensure the operational integrity of business operations (e.g. control totals, record counts, brought forward/carried forward totals, etc.).	M	Meets the requirement out-of-the-box		Field Based Reporting
RFF15	Report Features and Functions	General	Provide self-service reports and downloads that are either pre-defined and selected (pulled by the user) or created ad-hoc from a pre-populated user-friendly database structure using report tools commonly associated with data warehousing methodologies.	H	Meets the requirement out-of-the-box		Field Based Reporting
RFF16	Report Features and Functions	General	Provide interactive analysis capabilities that help decision makers use communication technologies, data, documents, knowledge, and analytical models to identify and solve problems.	M	Meets the requirement out-of-the-box		Field Based Reporting
RFF17	Report Features and Functions	General	Support pre-built data structures and data transformations through upgrades with new versions of and patches to the operational application suite.	H	Meets the requirement out-of-the-box		Field Based Reporting
RFF18	Report Features and Functions	General	Provide a reporting and analysis toolset that does not require knowledge and training on the toolset's proprietary language or configuration for most users (i.e., non-power users).	M	Meets the requirement out-of-the-box		Field Based Reporting
RFF19	Report Features and Functions	General	Provide a solution architecture to have 24-hour, 7-day-a-week access (excluding defined maintenance windows) to the reporting functions.	M	Meets the requirement out-of-the-box		Field Based Reporting
RFF20	Report Features and Functions	General	Support read-only access to data via Open Database Connectivity (ODBC) with appropriate security.	H	Meets the requirement out-of-the-box		Field Based Reporting
RFF21	Report Features and Functions	General	Support user access to predefined reports via the web without installation of client software, apps or any widgets 100% of the time, along with access to self-service reports and export/downloads via the web a minimum of 80% of the time.	H	Meets the requirement out-of-the-box		Field Based Reporting
RFF22	Report Features and Functions	General	Leverage the roles and security definitions setup of the system solution within the reporting and business function to minimize duplication of security administration functions.	H	Meets the requirement out-of-the-box		Field Based Reporting
RFF23	Report Features and Functions	General	Support utilization of the same system specifications (architectural landscape) that are required for the Crash and Citation Reporting operational platform for the reporting environment to the extent feasible.	M	Meets the requirement out-of-the-box		Field Based Reporting

RF24	Report Features and Functions	Report Portal	Provide users with a user specific personalized report portal that allows access to only those reports that the user is authorized to see consistent with role-based security definitions.	H	Meets the requirement out-of-the-box			Field Based Reporting	
RF25	Report Features and Functions	Report Portal	Provide access to rows and/or columns within the report to be restricted based on the user's role (e.g. the user can only view data according to their defined security role, etc.).	M	Meets the requirement out-of-the-box			Field Based Reporting	
RF26	Report Features and Functions	Report Portal	Provide a list of the reports that have been distributed / are available to the user via the portal (i.e. the user has been granted authorization to view a report by the designated report publisher/owner).	M	Meets the requirement out-of-the-box			Field Based Reporting	
RF27	Report Features and Functions	Report Portal	List saved personalized reports and ad-hoc queries that the user has authority to either create or modify in the user's personal reports list.	H	Meets the requirement out-of-the-box			Field Based Reporting	
RF28	Report Features and Functions	Report Portal	Allow an authorized user to search the existing reports inventory and subscribe to reports after requesting and receiving permission from the report owner/publisher.	H	Meets the requirement out-of-the-box			Field Based Reporting	
RF29	Report Features and Functions	Report Portal	Allow for designated report publishers to un-publish reports to individual users or groups of users.	M	Meets the requirement out-of-the-box			Field Based Reporting	

RF30	Report Features and Functions	Report Portal	Support users sharing saved personalized reports and ad-hoc queries for use by another user aligned with defined user roles.	M	Meets the requirement out-of-the-box		Field Based Reporting
RF31	Report Features and Functions	Report Portal	Allow for users to delete shared reports from their personal reports list without deleting the shared report from another user's personal reports list.	M	Meets the requirement out-of-the-box		Field Based Reporting
RF32	Report Features and Functions	Report Portal	Support a user refreshing (running) saved personal reports or ad-hoc queries from the portal with an option to run in the background and send a notification to the user upon completion.	M	Meets the requirement out-of-the-box		Field Based Reporting
RF33	Report Features and Functions	Standard Report Features	Allow a user to execute reports and modify report query parameters on-line and allow a user to save modified report versions as personal versions without impacting the base query.	M	Meets the requirement out-of-the-box		Field Based Reporting
RF34	Report Features and Functions	Standard Report Features	Support drill down from summary information to the supporting detail transactions and drill up from the detail transaction to the summary information where appropriate.	H	Meets the requirement out-of-the-box		Field Based Reporting
RF35	Report Features and Functions	Standard Report Features	Provide the option, as part of drill down functionality, to print the expanded sections of the drill down results with the content of the original query results.	H	Meets the requirement out-of-the-box		Field Based Reporting
RF36	Report Features and Functions	Standard Report Features	Link the report generator directly to the data dictionary to provide point and click data item selection and drag-and-drop formatting by the user.	H	Meets the requirement out-of-the-box		Field Based Reporting
RF37	Report Features and Functions	Standard Report Features	Allow for a user to define or modify the sort order of reports.	H	Meets the requirement out-of-the-box		Field Based Reporting
RF38	Report Features and Functions	Standard Report Features	Support searching for data, transactions or documents using a range of data values.	M	Meets the requirement out-of-the-box		Field Based Reporting
RF39	Report Features and Functions	Standard Report Features	Support searching, filtering, and reordering of data within a results set.	M	Meets the requirement out-of-the-box		Field Based Reporting
RF40	Report Features and Functions	Standard Report Features	Support free-form text searching that includes embedded, attached, or linked documents.	M	Meets the requirement out-of-the-box		Field Based Reporting
RF41	Report Features and Functions	Standard Report Features	Support free-form text searching that includes the specification of words that are in a given range of words.	M	Meets the requirement out-of-the-box		Field Based Reporting
RF42	Report Features and Functions	Standard Report Features	Support free-form text searching that includes the specification of wildcards (such as * and ? in strings) as well as %LIKE% string searches that provide a broader support for searching string fields.	M	Meets the requirement out-of-the-box		Field Based Reporting
RF43	Report Features and Functions	Standard Report Features	Allow for a user to save a personal copy for later execution of a pre-defined report with a set of specific selection criteria.	M	Meets the requirement out-of-the-box		Field Based Reporting
RF44	Report Features and Functions	Standard Report Features	Support standard print capabilities such as those typically available in Windows-based products such as print preview, print a range of pages, print a number of copies, print to device, print to PDF, etc.	H	Meets the requirement out-of-the-box		Field Based Reporting
RF45	Report Features and Functions	Standard Report Features	Allow for on-line reports to be run in the background and allow users to continue processing such that report results can then be accessed through the report portal with an online user notification provided when the report is generated.	M	Meets the requirement out-of-the-box		Field Based Reporting
RF46	Report Features and Functions	Standard Report Features	Support scheduling a report to run automatically if certain conditions (business rules) are met, including event-triggered, day and time of week triggered, etc.	M	Out-of-the-Box with configuration required to meet		Field Based Reporting
RF47	Report Features and Functions	Standard Report Features	Support export of query and report results as an external database, word processing format (.doc or .docx), text file (.txt), standard portable flat file formats (comma delimited, tab delimited, etc.) with option to choose delimiter, XML, or JSON formats.	M	Meets the requirement out-of-the-box		Field Based Reporting
RF48	Report Features and Functions	Standard Report Features	Support report distribution based on events, process milestones, or predefined data thresholds or values, e.g., based on data values contained within the report (i.e. conditional operators >, <, =, etc.).	M	Meets the requirement out-of-the-box		Field Based Reporting

RFF49	Report Features and Functions	Standard Report Features	Support distributing reports by a variety of methods such as sending links to reports via email, web, or push to mobile devices.	M	Meets the requirement out-of-the-box		Field Based Reporting	
RFF50	Report Features and Functions	Standard Report Features	Support printing of reports on special forms.	M	Meets the requirement out-of-the-box		Field Based Reporting	
RFF51	Report Features and Functions	Standard Report Features	Support effective date selection and query including Boolean operations such as date ranges.	H	Meets the requirement out-of-the-box		Field Based Reporting	
RFF52	Report Features and Functions	Standard Report Features	Support incorporating derived field values into reports resulting from formulas, functions, and mathematical calculations.	M	Meets the requirement out-of-the-box		Field Based Reporting	
RFF53	Report Features and Functions	Standard Report Features	Allow an authorized user to create and specify report templates.	H	Meets the requirement out-of-the-box		Field Based Reporting	
RFF54	Report Features and Functions	Standard Report Features	Provide wizards to guide the users through report building steps.	M	Meets the requirement out-of-the-box		Field Based Reporting	
RFF55	Report Features and Functions	Standard Report Features	Support graphical report layout tools and drag-and-drop features to assist users in formatting reports and inquiries.	M	Meets the requirement out-of-the-box		Field Based Reporting	
RFF56	Report Features and Functions	Standard Report Features	Support the use of unstructured data in query results (e.g. Microsoft® Word®, Microsoft® Excel®, scanned images, and other documents attached to transactions)	M	Meets the requirement out-of-the-box		Field Based Reporting	
RFF57	Report Features and Functions	Standard Report Features	Support the creation of various charts from the reporting tool.	M	Meets the requirement out-of-the-box		Field Based Reporting	
RFF58	Report Features and Functions	Standard Report Features	Support linking from reporting tool to Microsoft Office or Google Workspace graphic, spreadsheet and presentation applications.	M	Meets the requirement out-of-the-box		Field Based Reporting	

Report Features and Functions	Standard Report Features	Provide the ability to generate reports and notifications for Failure to Appear (FTA) and Failure to Pay (FTP) events to designated agencies.	H	Meets the requirement out-of-the-box	Field Based Reporting
Management Reporting	Ad-hoc Query	Provide a robust ad-hoc query facility.	H	Meets the requirement out-of-the-box	Field Based Reporting
Management Reporting	Ad-hoc Query	Support a user building ad-hoc queries to report on any fields in the Crash and Citation applications for which they are authorized using one or more or a combination of different criteria; provide online access to a data dictionary showing data element and table to assist.	H	Meets the requirement out-of-the-box	Field Based Reporting
Management Reporting	Ad-hoc Query	Ensure that a user cannot access information through an ad-hoc query if they are not authorized to view this information in the operational Crash and Citation application.	M	Meets the requirement out-of-the-box	Field Based Reporting
Management Reporting	Ad-hoc Query	Allow for a user to save an ad-hoc query for later execution without impacting any base query that was used as a start point.	M	Meets the requirement out-of-the-box	Field Based Reporting
Management Reporting	Ad-hoc Query	Display a user's saved ad-hoc queries by the user-defined descriptive name on the user's report portal.	H	Meets the requirement out-of-the-box	Field Based Reporting
Management Reporting	Ad-hoc Query	Allow for a user to authorize one or more additional users to have access to a saved ad-hoc query through the report portal.	M	Meets the requirement out-of-the-box	Field Based Reporting
Management Reporting	Ad-hoc Query	Display any ad-hoc queries authorized by one user for use by a second user on the second user's report portal.	M	Meets the requirement out-of-the-box	Field Based Reporting
Management Reporting	Ad-hoc Query	Support natural language (NL), i.e., English-like entry of ad hoc queries (such as using an LLM AI toolset to write sophisticated SQL (Structured Query Language) statements) to create reports from the database.	M	Meets the requirement out-of-the-box	Field Based Reporting
Reporting Architecture & Performance	Report Administration	Provide a solution architected to centrally manage the reporting tool set to ensure that any updates are distributed to users and that all users are accessing the same version of the reporting software.	H	Meets the requirement out-of-the-box	Field Based Reporting
Reporting Architecture & Performance	Report Administration	Ensure the reporting solution is architected so system performance is not impacted when a large report or query is being run.	H	Meets the requirement out-of-the-box	Field Based Reporting
Reporting Architecture & Performance	Report Administration	Support scheduling, viewing and modifying the start time for batch printing including any dependencies on certain business conditions or events.	M	Meets the requirement out-of-the-box	Field Based Reporting
Reporting Architecture & Performance	Report Administration	Allow the system administrator or other authorized user to define limits on the execution time for a report or query and/or the number of records/rows being retrieved.	H	Meets the requirement out-of-the-box	Field Based Reporting
Reporting Architecture & Performance	Report Administration	Automatically cancel a query or report job if it fails to meet system administrator defined criteria (e.g., time limits, infinite loops, excessive pages, etc.).	M	Meets the requirement out-of-the-box	Field Based Reporting
Reporting Architecture & Performance	Report Administration	Allow the system administrator or other authorized user to terminate any query or report that significantly reduces system performance.	M	Meets the requirement out-of-the-box	Field Based Reporting
Reporting Architecture & Performance	Report Administration	Allow the system administrator or other authorized user to override parameters for an individual query or report.	M	Meets the requirement out-of-the-box	Field Based Reporting
Reporting Architecture & Performance	Report Administration	Support auditing of exports of report data and modifications to report definitions.	M	Meets the requirement out-of-the-box	Field Based Reporting
Reporting Architecture & Performance	Report Administration	Support configuration of report definitions to suppress information based on a user's role and permissions.	M	Meets the requirement out-of-the-box	Field Based Reporting
Reporting Architecture & Performance	Report Administration	Report on user production statistics by userID, time of day, length of job, etc. to determine who is viewing a report, what reports are being used and resources consumed by business unit/user.	H	Meets the requirement out-of-the-box	Field Based Reporting

Req #	Category	Sub-Category	Business (Functional) Requirement	Priority H = High M = Medium L = Low	Vendor Response	Customization Estimate, if Applicable	Capability Planned for Future Release	Core Module(s)	Third Party Solution(s)	Comments/Notes
AA1	Application Architecture	General	Provide a solution that provides law enforcement with a tool for easily entering crash and citation information that is robust and effective --- filling in values based on the user profile (i.e., default values are automatically filled based on the identity of the end user), but support the ability for the user to override these default values as required. Anytime a default value has been overridden by the end-user, flag the record as such, indicating that the default was overridden or not accepted.	H	Meets the requirement out-of-the-box			Field Based Reporting / SmartADMIN		
AA2	Application Architecture	General	Provide a solution that implements logical edit checks across all relevant data fields to ensure data fidelity and data integrity. These edit checks must validate that values entered in one field are consistent with values entered in other related fields. Additionally, the system shall dynamically control field visibility, displaying only those fields that are logically related to prior user inputs. The system solution must <ul style="list-style-type: none"> Enforce cross-field validation rules that prevent contradictory, incomplete, or illogical data combinations. Automatically reveal or hide dependent fields based on earlier selections or entries; Ensure that only contextually valid values are available for selection in any dependent field; Support complex multi-field logic (e.g., hierarchical, nested, or multi-variable conditions); Provide real-time feedback to the end user when an entry violates a logical rule; and Allow administrative configuration of validation rules without requiring code changes. Example (for clarity, not limiting): If the user selects a vehicle type of "Motorcycle" or "ATV," the system must automatically display the "Helmet Use" field and restrict its values to those appropriate for motorcycle/ATV operation. If the vehicle type is not one of these, the "Helmet Use" field must remain hidden or disabled.	H	Meets the requirement out-of-the-box			Field Based Reporting / SmartADMIN		
AA3	Application Architecture	Archiving	Provide reporting and analysis tools which guide the crash and citation data administrator in determining which data is appropriate and available (meaning there are no open related transactions that would inhibit good archive practices) to archive.	H	Meets the requirement out-of-the-box			Field Based Reporting / SmartADMIN		
AA4	Application Architecture	Archiving	Store asset related data for an indefinite period (e.g., some or all asset related data may be retained for an indefinite period, while other data may be able to be archived after certain user-defined periods based on record retention policies).	H	Meets the requirement out-of-the-box			Field Based Reporting / SmartADMIN		
AA5	Application Architecture	Archiving	Allow an authorized user to mark records for deletion. Deleted records and attachments will be archived in the database with an indicator of "deleted".	H	requirement out-of-the-box			Field Based Reporting / SmartADMIN		
AA6	Application Architecture	Archiving	Allow an authorized user to unmark records which have been flagged in the database for deletion (maintaining referential integrity).	H	requirement out-of-the-box			Field Based Reporting / SmartADMIN		
AA7	Application Architecture	Archiving	Support purge, archive, and restore of inactive records based on user-defined criteria and track history.	H	Out-of-the-Box with configuration required to meet			Field Based Reporting / SmartADMIN		
AA8	Application Architecture	Archiving	Allow system administrator or other authorized user to define archiving criteria for different types of data	H	requirement out-of-the-box			Field Based Reporting / SmartADMIN		
AA9	Application Architecture	Archiving	Support restoring of archived data by various parameters including the date range of the archiving process and other user-defined business rules.	H	modification to Base Code			Field Based Reporting / SmartADMIN		

AA10	Application Architecture	Audit Trail	Maintain an audit trail of all user actions that update and access the database including at a minimum user ID, action performed, and time/date stamp; this includes any update via online, batch, web services or self-service functions.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA11	Application Architecture	Audit Trail	Support monitoring the audit trail logs via an auto alert based on user-defined business rules.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA12	Application Architecture	Audit Trail	Support notifications via email to designated users when certain auditable events occur.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA13	Application Architecture	Audit Trail	Provide a timestamp and user ID of the system user when a record was last changed or inserted.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA14	Application Architecture	Audit Trail	Store the program ID of the program that inserted, deleted or last changed the record, along with the old and new value of the data changed. That is, provide full traceability for all inserts, changes, and deletes of content.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA15	Application Architecture	Audit Trail	Manage the retention and archiving of audit trails based on user-defined business rules.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA16	Application Architecture	Audit Trail	Maintain an audit trail of report execution including report requested, user requesting report and time/date stamp.	M	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA17	Application Architecture	Document Management	Provide basic document management capabilities within the Crash and Citation applications (that is, the ability to store and link files to a master or transaction record, etc.).	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA18	Application Architecture	Document Management	Support configuring specific workflows or transactions to access different document locations based on the location of the document, either stored in the Crash and Citation applications or stored in the Department's enterprise document management systems / shared directory.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA19	Application Architecture	Document Management	Support purging or archiving a document or attachment without purging or archiving the related transaction. Record all changes to a transaction in a separate log (e.g. creation, revision, update, deletion).	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA20	Application Architecture	Document Management	Provide an indicator within the user interface part of the system that there is one or more relevant documents associated with the displayed record that are stored in the Crash and Citation system; the user must be able to click on the indicator to retrieve and display the image/soft. copy of the document.	M	Out-of-the-Box with configuration required to meet	Field Based Reporting / SmartADMIN	
AA21	Application Architecture	Functions and Features	Support the importing/exporting of Google Sheets/Docs, Microsoft Office, and Microsoft Office365 objects as well as industry standard formats (.doc, .docx, .pdf, .txt, .csv, .xml, .json).	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA22	Application Architecture	Functions and Features	Support the generation of notifications (email messages/texts) by the system based on various system/business events using standard e-mail protocols including but not limited to IMAP, IMAP, POP3, SMTP, etc.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA23	Application Architecture	Functions and Features	Support wildcard or partial searches.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA24	Application Architecture	Functions and Features	Support default of the value of a field based on the value of another field according to user-defined business rules.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA25	Application Architecture	Functions and Features	Provide user-defined data fields within each Crash and Citation function (estimated 10% of total defined fields in each major system function).	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA26	Application Architecture	Functions and Features	Track and store effective date changes throughout the systems and across modules.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA27	Application Architecture	Functions and Features	Utilize effective and expiration dates to version reference tables and data.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA28	Application Architecture	Functions and Features	Support mass changes to defined groups of transactions or data with appropriate audit trails.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	

AA29	Application Architecture	Functions and Features	Support back out (rollback) of previously entered batches and individual transactions.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA30	Application Architecture	Functions and Features	Provide a sequential unique identifier for a batch.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA31	Application Architecture	Functions and Features	Support use of bar code, QR code or RFID scanners with the proposed software solution to support data input for electronic identification of medical data (see MMUCC requirements for more detail). Allow the use of hand-held readers/printers to support all system transactions.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA32	Application Architecture	Functions and Features	Support PDF471 scanning of driver's license		Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA33	Application Architecture	Functions and Features	Support PDF471 scanning of vehicle registration and/or license plate		Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA34	Application Architecture	Functions and Features	Support the use of the "print screen" function and export to standard formats (xls, doc, pdf, google sheet/doc, csv, pdf, xml, json, etc.) from any screen.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA35	Application Architecture	Functions and Features	Provide multi-language support with spell check and dictionary support, along with support for a user-defined dictionary of terms.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA36	Application Architecture	Functions and Features	Support set-up of user-defined and standard document, form and letter templates at either the Department-wide or department/business unit level for use throughout the Crash and Citation solutions with names, titles, labels, pre-defined backgrounds, etc.	M	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA37	Application Architecture	Functions and Features	Support copying of a system item to create a new system item of the same type as a productivity tool to reduce manual data entry requirements.	M	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA38	Application Architecture	Functions and Features	Allow the system administrator or other authorized users to broadcast messages to all or a specific subset of system users.	M	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA39	Application Architecture	Functions and Features	Support scheduling of broadcast messages with a start and end date/time.	M	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	

AA40	Application Architecture	Functions and Features	Support use of electronic signatures to initiate or approve a business event within the proposed software solution through authentication of the user to the system by entry of valid user credentials at the time the user signs on to the system. Record the application of electronic signatures in the record transaction log.	L	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA41	Application Architecture	Functions and Features	Integrate with Department specific standard email systems (at a minimum, Gmail and Microsoft Outlook).	L	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA42	Application Architecture	General	Share all related business information across functional areas and organizations (subject to application security and user-defined business rules).	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA43	Application Architecture	General	Provide an integrated data management structure that is utilized across the proposed software solution to minimize system processing or administration required on data integration points.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA44	Application Architecture	General	Provide user-controlled definition and maintenance of system values and business rules in tables without requiring programmer intervention.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA45	Application Architecture	General	Support update of all related modules and tables with a single entry (e.g., a change to a project attribute or project status information is made only once but takes effect throughout the system).	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA46	Application Architecture	General	Allow the application administrator or other authorized users to manage and maintain system tables and data field values.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA47	Application Architecture	General	Support the addition of user-defined fields that updates the supporting tables/queries as well as the screens.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA48	Application Architecture	General	Support persistence in terms of field labels such that a screen label defined in one place would be referred to the same way everywhere.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA49	Application Architecture	General	Perform transactions in real-time in the sense that online access will display the most current element value (e.g., if a user changes the value of a data element on one screen, the newly changed data value will be shown when the user moves to another screen with that element).	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA50	Application Architecture	General	Edit all system input according to user-defined business rules so that the rules are appropriately applied, and data is validated at the time the data is being entered into the system either on-line or through a batch transaction.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA51	Application Architecture	General	Support multiple concurrent application sessions for each user; each concurrent session must utilize the same security profile.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA52	Application Architecture	General	Maintain security logs and audit trails distinctly for each concurrent user session.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA53	Application Architecture	General	Provide a metadata editor to modify/relabel terms, screen and field captions across the application, by department or line of business and/or by screen by role; user configured terms shall reflect on reports; retain original terms allowing revert; re-apply modified captions after upgrades/releases.	M	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA54	Application Architecture	General	Provide the application administrator or other authorized user with screen layout configuration capabilities including movement of fields around a screen and/or across tabs, removal of fields, addition of user-defined fields, reorder or consolidation of tabs, buttons to enable prints and selection of related reports. Links to other business objects (e.g., project records, contract records, project contacts, etc.).	M	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	

AA55	Application Architecture	General	Comply with the Rehabilitation Act of 1973 and Americans with Disabilities Act (ADA) Section 508 standards for accessibility for all system functions; comply with the latest version of the Web Content Accessibility Guidelines (WCAG) and ensure the Crash and Citation applications can work with industry leading assistive technology products such as screen readers. All screens/windows/forms accessible to the public must be WCAG 2.1 Level AA compliant.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN
AA56	Application Architecture	General	Support encryption or masking of any fields with access restricted to authorized users by department/business unit and role and responsibility.	L	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN
AA57	Application Architecture	General	Support indicating at the field level user classes or individual users who are authorized to view masked or encrypted fields.	L	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN
AA58	Application Architecture	General	Provide support for field-level "Tool Tips" feature.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN
AA59	Application Architecture	Help	Provided a centrally stored and maintained system wide help function.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN
AA60	Application Architecture	Help	Provide context-sensitive, field-level on-line help features for all screen elements, screen errors and error codes, along with the ability for an authorized user to make revisions to these on-line help features and content.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN
AA61	Application Architecture	Help	Identify processing or navigation path for a screen.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN
AA62	Application Architecture	Help	Provide user documentation that is comprehensive, clear and easy to use (e.g., user documentation must provide quick answers to questions regarding the navigation of application screens, execution of pre-defined reports, and use of the ad-hoc query capability); it must also contain clear and thorough descriptions of all screen and batch processing functions, screen data, programs, system reports, and any processing parameters.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN
AA63	Application Architecture	Help	Provide comprehensive search functions for on-line documentation, including search strings with wild cards, and linked content by topic area.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN
AA64	Application Architecture	Help	Provide table-driven error message handling that can be modified by authorized users.	M	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN
AA65	Application Architecture	Help	Ensure any customized help files carry forward automatically during upgrades.	M	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN
AA66	Application Architecture	Security	Integrate with Active Directory, the State of West Virginia specific identification and authentication systems and processes to allow for access to the Crash and Citation through a single user sign-on to the Department network.	H	Out-of-the-Box with configuration required to meet	Field Based Reporting / SmartADMIN
AA67	Application Architecture	Security	Comply with the WV DOT and any applicable State of West Virginia, United States Department of Transportation (USDOT), National Highway Transportation Safety Administration (NHTSA), Model Minimum Uniform Crash Criteria (MMUCC), and Homeland Security Administration security policies. Conform to the requirements in the State of West Virginia Office of Technology Information Security Policy at https://library.commission.wv.gov/Library/Docs/SecurityPolicy0107.pdf	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN
AA68	Application Architecture	Security	Comply with the encryption requirements in Information Exchange Package Documentation (IEPD) standards.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN
AA69	Application Architecture	Security	Comply with ISO/IEC 15408: Common Criteria for Information Technology Security Evaluation.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN
AA70	Application Architecture	Security	Support secure hypertext transfer protocol (HTTPS).	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN
AA71	Application Architecture	Security	Comply with FEDRAMP requirements.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN

AA72	Application Architecture	Security	Support role-based security and privileges and access rights by position and department/business unit.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA73	Application Architecture	Security	Support granular management and administrator control over transactions, forms access, field updates, row locking, interfacing events, data queries and other types of authorizations using role-based security.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA74	Application Architecture	Security	Provide for a security administrator function/role that allows for separate controls for view, add, change, inactivate update, approve, and query access privileges.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA75	Application Architecture	Security	Support secure communications authentication, authorization, confidentiality and data integrity (eg. HTTPS, SSL) for internet-based transactions and/or support for FIPS 140-2 data encryption for system transactions.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA76	Application Architecture	Security	Support role-based security for automated workflow components including establishing access and update privileges for work lists, page access related to the selection of a word list item, and definition of which users are included workgroups. This should include roles for crash, citation, and DNR-based roles and permissions.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA77	Application Architecture	Security	Allow the system administrator or other authorized user to define users to the system, including the following information about each user: unique user identification; user first name; user last name; department/business unit; user email address and effective date of user access to the system.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA78	Application Architecture	Security	Allow the system administrator or other authorized user to define user access groups based on job responsibilities to ensure separation of duties; the system administrator must enter the user group name, a user group code and a description of the role and capabilities of the user group.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA79	Application Architecture	Security	Allow the system administrator or other authorized user to grant user groups access to each system function and to establish the type of access to be allowed (add, change, inquire, retire, delete) and establish an effective start and end date for this access.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	

AA80	Application Architecture	Security	Allow the system administrator or other authorized user to assign users to one or more user groups including an effective date and optional end date for inclusion in each user group.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN
AA81	Application Architecture	Security	Log incidents of security violations within the system capturing user identification, system function for which unauthorized access was attempted and date and time of security violation.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN
AA82	Application Architecture	Security	Provide an online function for review of the logs of invalid password attempts or security violations by the system administrator or other authorized users.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN
AA83	Application Architecture	Security	Apply the system security roles and privileges to report and ad-hoc query results such that users cannot access data through reports and queries for which they are not authorized in the operational system.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN
AA84	Application Architecture	Security	Support access to the Crash and Citation solutions by authorized third-party business partners through virtual private network and/or Internet self-service portal capabilities, subject to the Department security procedures for external access.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN
AA85	Application Architecture	Security	Allow users to choose from multiple user groups/roles as sign-on if the user is assigned more than one role.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN
AA86	Application Architecture	Security	Allow system administrator or other authorized user to define the allowable period for user inactivity while logged on.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN
AA87	Application Architecture	Security	Disconnect or log out a user session when it exceeds the allowable period of inactivity as established by the system administrator and configured in the system.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN
AA88	Application Architecture	Security	Warn users that they will be disconnected before automatically logging off users.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN
AA89	Application Architecture	Security	Support trusted, secure access to external links (for repair manuals, parts lists, etc.).	M	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN
AA90	Application Architecture	Security	Provide that if two distinct security roles are needed to perform a business function and both roles are held by the same user, the user must log on separately under each security role to perform the full business transaction.	M	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN
AA91	Application Architecture	Security	Allow authorized Department managers to use a workflow within Crash and Citation (including DNR citations) to request employee access privileges to specific system functions and obtain management approval based on enterprise and business unit rules for this access; based on the Department management approvals, request will then be forwarded to the system administrator or other authorized user for review and potential action.	M	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN
AA92	Application Architecture	Security	Allow a system administrator or other authorized user to define or reset a user's password by entering a password or selecting a system generated unique, random temporary password; password must be capable of being emailed upon a change and through self-service based on a user successfully answering challenge questions. Note in the system log that a change to a user password occurred on a specific date/time stamp.	M	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN
AA93	Application Architecture	Security	Allow external users to reset their own password using standard password reset protocols to validate the identity of the user. Internal Department users shall change their password through the Department's identity management system.	M	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN
AA94	Application Architecture	Security	Support the use of security challenge questions for authenticating a user, as well as allow for users to provide and store unique answers for a subset of these security challenge questions to be subsequently used if a user forgets a password.	M	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN
AA95	Application Architecture	Security	Support digital certificates.	L	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN

AA96	Application Architecture	Security	Support public key infrastructure (PKI).	L	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA97	Application Architecture	Security	Personally Identifiable Information (PII) should be viewable or masked based on user role.(definable by the System Administrator).	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA98	Application Architecture	Security	Support integrating with identity management systems utilized by local agencies; further, the applications must also be able to support local users where there are no SSO capabilities to conform to.	H	Out-of-the-Box with configuration required to meet	Field Based Reporting / SmartADMIN	
AA99	Application Architecture	Security	Support the ability for any given user to have one or more assigned roles.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA100	Application Architecture	Security	Support the ability for any authorized user to delegate their role responsibility to another user for a time-limited period (e.g., a supervisor can delegate their role while out of the office for a period of time).	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA101	Application Architecture	Upgradeability	Provide the ability to maintain or retain user configurations in the Crash and Citation applications through upgrade or release of new versions of the software.	M	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA102	Application Architecture	User Documentation	Enable users to incorporate user-defined documentation into system documentation (e.g., user procedures, business rules, etc.) which is accessible from the Crash and Citation applications.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA103	Application Architecture	User Documentation	Support maintaining version control of user-defined documentation.	L	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA104	Application Architecture	User Interface	Utilize a consistent user interface across the core components of the Crash and Citation solution (excluding third-party software components) including user-definable hot keys; screen naming functions; navigation patterns; consistent use of controls; online help and menus (as defined by the user's security profile).	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA105	Application Architecture	User Interface	Support both manual entry and contextually validated drop-down lists of all valid values for each validated field.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA106	Application Architecture	User Interface	Allow a user to navigate between multiple, related input screens without losing information input on the original (or header) screen until all information is committed to the database.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA107	Application Architecture	User Interface	Allow a user to cancel a transaction and/or exit any document or screen without saving changes.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA108	Application Architecture	User Interface	Provide a visual identification (e.g., highlighting) of all required fields for entry on any screen.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA109	Application Architecture	User Interface	Support search and filter capability on user screens containing columns of data.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA110	Application Architecture	User Interface	When a crash report falls under FMCSA requirements, the solution should dynamically hide/show FMCSA-related fields to the end user for data entry.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA111	Application Architecture	Workflow	Provide tools for modifying preconfigured workflows or developing new workflows.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA112	Application Architecture	Workflow	Support the establishment of user-defined rules-based workflows for any system event or transaction.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	

AA113	Application Architecture	Workflow	Support bi-directional electronic routing of documents for approval or other tasks through workflow.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA114	Application Architecture	Workflow	Support initiation of workflows from both online real-time and batch driver/initiated events based on user-defined business rules.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA115	Application Architecture	Workflow	Allow for reversal of any approvals and return the workflow transaction to the originating user and any other users who had previously approved the transaction if one or more reviewers disapproves a transaction.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA116	Application Architecture	Workflow	Support copying, modifying and extending preconfigured workflows to meet specific Department business requirements.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA117	Application Architecture	Workflow	Support multiple levels of approvals for transactions based on profile security and other user-defined criteria.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA118	Application Architecture	Workflow	Allow a user to enter descriptive information in a note field or to upload and attach a file to content items within the workflow and store these notes with user ID and date/time stamp.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA119	Application Architecture	Workflow	Ensure a transaction is not finalized until all required approval workflows are complete.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA120	Application Architecture	Workflow	Allow a workflow to be designed to support either simultaneous actions or require consecutive actions, as defined by an authorized user.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA121	Application Architecture	Workflow	Provide a dashboard which displays the status of workflows including workflows pending for a user-defined period of time.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA122	Application Architecture	Workflow	Allow for a supervisor to temporarily route transactions for workload balancing, absences, etc.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA123	Application Architecture	Workflow	Track workflow approvals and rejections.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA124	Application Architecture	Workflow	Support various user-defined transaction statuses, including approved, rejected, pending, under consideration, etc.	H	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	
AA125	Application Architecture	Workflow	Support electronic signatures for approvals and rejections of workflows based on a user authenticating themselves to the system.	L	Meets the requirement out-of-the-box	Field Based Reporting / SmartADMIN	

WV DOT Crash Citation System Requirements

Req. #	Category	Sub-Category	Business (Functional) Requirement	Priority H = High M = Medium L = Low	Vendor Responsive out-of-the-box	Customization in Estimate, if Applicable	Capability Planned for Future Release	Core Module(s)	Third Party Solution(s)	Comments/Notes
TA1	Technical Architecture	Batch Error Handling	Allow an authorized user to edit a transaction in error and resubmit it.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA2	Technical Architecture	Business Continuity	Provide an architecture which supports fail-over to a parallel load balanced environment on a real time basis.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA3	Technical Architecture	Business Continuity	Provide a system design which is architected to ensure that normal system operations are restored within four hours of a catastrophic disruption of a production system component 99% of the time.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA4	Technical Architecture	Business Continuity	Support performing full backups, incremental backups and recovery capabilities for data and application components. Back-ups shall not require maintenance windows; backups shall be able to function in the background of a production SOA or clustered environment and not impact system availability.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA5	Technical Architecture	Business Continuity	Provide the means to execute disaster recovery operations for test and live conditions.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA6	Technical Architecture	Custom Development	Allow for identification/reporting of new user-defined fields.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA7	Technical Architecture	Custom Development	Allow for identification/reporting of new user-defined objects.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA8	Technical Architecture	Data Integration	Provide supported Application Program Interface (API) data definitions and file structures for all key reference sets to support batch loading of data. For example, the ability to load full crash record data or citation data via an input file, such as csv, xml, etc.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA9	Technical Architecture	Data Integration	Support data encryption where appropriate based on user-defined business rules following Advanced Encryption Standards (AES) for data both in transit and at rest in all file structures.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA10	Technical Architecture	Data Integration	Encrypt all data with personally identifiable information (PII) or Department confidential information in transit and at rest in all file structures.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA11	Technical Architecture	Data Integration	Support executing interfaces with other systems on a pre-defined schedule, event, or on the request of an authorized user.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA12	Technical Architecture	Data Integration	Support modern architectural interface data exchange protocols with other WV systems in real-time (e.g., HTTPS, OAuth2/token-based authorization, web services, RESTful, SOAP, Msg Broker, etc.)	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA13	Technical Architecture	Data Integration	Place records not passing validation into a suspense status within the Crash and Citation system solution.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA14	Technical Architecture	Data Integration	Provide the ability to correct suspended records within the Crash and Citation system.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA15	Technical Architecture	Data Integration	Support EDI including ASC X12.	L	Meets with modification to Base Code	Medium customization(s) requiring a total of 80 hours		Field Based Reporting		
TA16	Technical Architecture	Database	Support implementation of the proposed solution on the most current production release and one major release back of any major database product, such as Oracle® or Microsoft SQL Server®, along with the ability to maintain this state over time.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA17	Technical Architecture	Database	Maintain referential integrity of data through either database referential integrity declarations or application code.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA18	Technical Architecture	Database	Utilize high availability and advanced security features of the database to the extent appropriate.	H	Meets the requirement out-of-the-box			Field Based Reporting		

Req. #	Category	Sub-Category	Business (Functional) Requirement	Priority H = High M = Medium L = Low	Vendor Response:	Customization Estimate, if Applicable	Capability Planned for Future Release	Care Module(s)	Third Party Solution(s)	Community/Votes
TA19	Technical Architecture	Database	Support data replication, load balancing, and synchronization across multiple physical or virtual servers.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA20	Technical Architecture	Database	Exploit DBMS database features and database and application design to reduce contention between updates by online users and those of concurrently running batch processes.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA21	Technical Architecture	Database	Ensure that on-line search queries will not be delayed by waiting for locks to be released.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA22	Technical Architecture	Database	Ensure that in a two-user scenario when both users retrieve data and attempt to update data one after another, to avoid loss of updates and/or to avoid overwriting of each other's data the system must notify the second user as the data is being updated by the first user (provide selection of "first in wins", last, etc.).	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA23	Technical Architecture	Database	Ensure that in a two-transaction read/update cycle, the user will always update ONLY what was being read, avoiding the so-called 'update collision' or 'deadly embrace'.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA24	Technical Architecture	Database	Support automatic "clean up" of partial database updates after suspended network sessions or after other failures.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA25	Technical Architecture	Database	Provide database monitoring tools and capabilities within the proposed solution for the recommended database platform to enable administration and performance tuning of the database environment.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA26	Technical Architecture	Database	Support record locking at the row level.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA27	Technical Architecture	Database	Support field-level locking.	M	Meets the requirement out-of-the-box			Field Based Reporting		
TA28	Technical Architecture	Database	Support configuration of data attributes by the system administrator.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA29	Technical Architecture	Database	Provide access for/to structured query language (SQL) capabilities for database queries.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA30	Technical Architecture	Enterprise Application Integration	Provide communication services that guarantee message delivery and handle queuing and encryption for various types of communication (e.g., publish and subscribe, request/reply, etc.).	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA31	Technical Architecture	Enterprise Application Integration	Provide message queue monitor and management operations to address queue backlogs and problems.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA32	Technical Architecture	Enterprise Application Integration	Provide configurable data-transformation services to handle data validation, calculations, lookups, padding, scrambling, truncation, etc.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA33	Technical Architecture	Enterprise Application Integration	Provide business process flow services to group and link data flows to automate the steps in a business transaction.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA34	Technical Architecture	Enterprise Application Integration	Support Universal Description, Discovery and Integration (UDDI) extensible mark-up language.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA35	Technical Architecture	Enterprise Application Integration	Support Web Services Description Language (WSDL).	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA36	Technical Architecture	Enterprise Application Integration	Support web services using Simple Object Access Protocol (SOAP).	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA37	Technical Architecture	ETL Tools	Provide data integration and data management tools with a range of extract, transform and load (ETL) capabilities.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA38	Technical Architecture	ETL Tools	Support integrating the proposed solution with third-party ETL tools to perform required ETL functions.	H	Meets the requirement out-of-the-box			Field Based Reporting		

Req. #	Category	Sub-Category	Business (Functional) Requirement	Priority H = High M = Medium L = Low	Vendor Response	Customization Estimate, if Applicable	Capability Planned for Future Release	Core Module(s)	Third Party Solution(s)	Comments/Notes
TA39	Technical Architecture	ETL Tools	Validate and handle exceptions during transformation.	H	Meets the requirement out-of-the-box			Field Based Reporting		

Req. #	Category	Sub-Category	Business (Functional) Requirement	Priority H = High M = Medium L = Low	Vendor Response	Customization Estimate, if Applicable	Capability Planned for Future Release	Core Module(s)	Third Party Solution(s)	Comments/Notes
TA40	Technical Architecture	ETL Tools	Verify and maintain referential integrity as part of any transformation process.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA41	Technical Architecture	ETL Tools	Support mapping data from multiple source systems into multiple target source systems.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA42	Technical Architecture	ETL Tools	Support incremental loads; allow for taking advantage of pipelined and partitioned parallelism to meet acceptable timeframes.	M	Meets the requirement out-of-the-box			Field Based Reporting		
TA43	Technical Architecture	General	Provide a non-proprietary solution architecture with an expandable configuration and horizontal and vertical scalability.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA44	Technical Architecture	General	Provide a service-oriented architecture (SOA) design/capability which is platform and protocol independent and complies with OASIS (Advancing Open Standards for the Information Society) standards such as WS-Security, WS-Reliability, etc. and other open standards such as XML, SOAP, WSDL, and UDDI.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA45	Technical Architecture	General	Separate database tier from application tier.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA46	Technical Architecture	General	Provide for separation of some or all the web server (presentation) tier from the application server tier.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA47	Technical Architecture	General	Support virtualization for all tiers.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA48	Technical Architecture	General	Support use of XML standards for communications (data exchange) to external parties.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA49	Technical Architecture	General	Provide a solution that supports offline entry of data independent of the ability to communicate with the backend database (i.e., a solution that works regardless of whether the application is connected). Note: • Input of crash data should continue independent of a network connection and supports "catching up" or synchronizing the entered data once a connection has been re-established. • During the period of non-connect, all relevant data entry functions need to be available; however, non-essential functions like reports, queries, etc., can be omitted. • For issuing or printing of a citation, the citation should be able to be printed locally regardless of the connection state.	H	Meets the requirement out-of-the-box					
TA50	Technical Architecture	General	Deliver content via the current and most recent supported versions of popular browsers (i.e., Microsoft Edge, Mozilla Firefox, Chrome, Safari, etc.)	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA51	Technical Architecture	General	Deliver content via browser without Active X controls or plug-in support (Java Runtime Environment, Adobe Flash, etc.)	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA52	Technical Architecture	General	The system shall provide support for integration with printers and other peripheral equipment commonly used in law enforcement operations (e.g., mobile ticket printers, in-vehicle peripherals). • The system shall maintain backward compatibility with equipment currently deployed in the field (e.g., Zebra printers) and shall be adaptable to the specific equipment standards, procurement policies, and operational needs of various agencies. • The system shall also be designed to accommodate future peripheral technologies or other equipment types without requiring significant re-engineering. • The solution should be capable of full and partial page (i.e., adjustable) printing options in the field based on type of printer available in the field.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA53	Technical Architecture	General	The system shall allow configuration of agency-specific fields/forms for DNR Workflows (e.g., off-road crash fields, replacement cost tables, etc.)	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA54	Technical Architecture	Job Scheduling and Processing	Provide a central enterprise job scheduler with the proposed solution that can schedule jobs across platforms and across multiple servers within a platform.	H	Meets the requirement out-of-the-box			Field Based Reporting		

WV DOT Crash Citatic System Requirements

Req #	Category	Sub-Category	Business (Functional) Requirement	Priority H = High M = Medium L = Low	Vendor Response	Customization Estimate, if Applicable	Capability Planned for Future Release	Core Module(s)	Third Party Solution(s)	Comments/Notes
TA55	Technical Architecture	Job Scheduling and Processing	Integrate with a third-party scheduler to provide job scheduling functionality for the proposed solution.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA56	Technical Architecture	Job Scheduling and Processing	Allow scheduling of report and query jobs.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA57	Technical Architecture	Performance	Ensure that batch processing does not adversely impact on-line responsiveness or availability.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA58	Technical Architecture	Performance	Provide a solution which is architected to support access to data for pre-defined reports, ad-hoc queries and business intelligence without impacting online transaction performance.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA59	Technical Architecture	Performance	Support utilization of industry leading third party performance monitoring tools for real-time monitoring by administrators of response time, system use and capacity, concurrent users, and system errors.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA60	Technical Architecture	Performance	Allow user-initiated reports and queries to be limited by elapsed time and the number of records retrieved.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA61	Technical Architecture	Performance	Allow limits to be defined for other types of query functions such as table joins, multiple sorts, etc.	M	Meets the requirement out-of-the-box			Field Based Reporting		
TA62	Technical Architecture	Supportability	Allow at a minimum for configuration across multiple environments including production, test/train, development / sand box.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA63	Technical Architecture	System Tools	Provide report design and generation tools within the application suite.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA64	Technical Architecture	System Tools	Provide tools for system upgrade administration within the application suite.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA65	Technical Architecture	System Tools	Provide tools for system monitoring within the application suite.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA66	Technical Architecture	System Tools	Provide configuration management tools within the application suite.	H	Meets the requirement out-of-the-box			Field Based Reporting		
TA67	Technical Architecture	System Tools	Provide end-user interface design tools within the application suite. This should include the ability for an authorized user to be able to add/delete/change values in drop-down menus and add new forms.	L	Meets the requirement out-of-the-box			Field Based Reporting		
TA68	Technical Architecture	Data Integrity	Utilize a phone validation service to validate all phone number data entry fields.	H	Meets with modification to Base Code		Capability planned for future release	Field Based Reporting		
TA69	Technical Architecture	Data Integrity	Utilize a VIN validation service to validate VIN number data entry fields.	H	Meets the requirement out-of-the-box			Field Based Reporting		



5. PROPOSED CLOUD OPERATING ENVIRONMENT

SmartCOP has designed our solutions to be flexible when it comes to infrastructure. We are proposing an AWS GovCloud single tenant deployment for DOT. However, **we can deploy our solutions on-premise, private data center, AWS Government Cloud, or hybrid model.** We work with our customers to ensure the deployment methods match exceed agency expectations.

SmartCOP's Public Safety Software Suite is a client-server application suite that utilizes **true three-tiered architecture.** All communication utilizes encrypted web-services between the user and the cloud. It is designed for Windows and iOS/iPadOS environments. The applications are written in various Microsoft development languages including .NET. **Our solution is deployed as a single instance, ensuring that only WV DOT data is housed.**

Our choice of hosting configuration enables mission critical confidence for the agency through greater up time, record search and retrieval times, enhanced security features, and true openness. **We are confident that our recommended configuration will meet 99.99% availability 24/7.** Working with the WVDOT, we will review and identify design changes that can impact system availability as well as RPO and RTO.

By installing an identical failover hardware environment for the Disaster Recovery Site (DR), should the primary cloud server fail, the cloud DR site can be operational in a matter of minutes, reducing downtime. Once the failed primary cloud server is restored, CCMS data can be loaded onto the restored SQL server, creating a complete history archive for the down period.

SmartCOP will design, deploy, and operate our solution in conformance with the State of West Virginia Office of Technology Information Security Policy; comply with State and Federal regulations regarding Personal Identifiable Information; provide hosting in an AWS GovCloud environment which is a FedRAMP/StateRAMP authorized Cloud environment; and comply with WV Cloud Addendum (to be executed at contract signing). It's important to note that SmartCOP has a current fully executed WV Cloud Addendum WV DNR).

AWS GovCloud SmartCOP Hosted Environment

SmartCOP is proposing an **AWS GovCloud hosting solution for WVDOT's Crash Reporting and e-Citation solution deployment with AWS GovCloud Disaster Recovery (DR) site in a geographically separate AWS GovCloud.** All SmartCOP hosted solutions adhere to SmartCOP's internal security policies and standards and leverage a consistent set of security tools, processes, and monitoring controls.

The AWS hosted server will be able to accommodate the agency's **700 concurrent users** (500 State users and 200 public functions users) with room for growth, without system degradation. SmartCOP will deploy cloud resources designed to accommodate the concurrent user workload with response times of 1 second of receipt of transaction 75% of the time, and all transactions within 5 seconds. To accommodate this, the SmartCOP Cloud Engineer will work with WVDOT's IT Lead to establish the necessary network bandwidth, access speed, and latency. Any latency issues will be reviewed and identified, and design changes will be made to ensure required responsiveness.

SmartCOP utilizes comprehensive compliance controls within AWS. This includes Discovery & Vulnerability Assessment, Exploitation, Analysis & Reporting via services such as Cloud Watch, GuardDuty, Inspector, & Security Hub. AWS supports 143 security standards and compliance certifications, including PCI-DSS, HIPAA/HITECH, FedRAMP, GDPR, FIPS 140-2, and NIST 800-171.

AWS GovCloud (US), which is an isolated AWS region designed to host sensitive workloads and regulated data for U.S. government agencies and customers who require compliance with U.S. government standards, undergoes SOC 2 assessments. AWS GovCloud (US) adheres to the same rigorous security and compliance standards as other AWS regions, including SOC 2 compliance.



Many agencies and organizations are amassing large data sets that they could process to gain critical insights; however, they are confined by fixed resources that require them to wait for these insights. **With AWS, you can easily spin up massive on-demand clusters of computer resources in minutes and quickly gain the information you need to effectively meet mission goals.**

As their volume of data continues to grow, organizations are struggling to add the capacity needed to meet their primary storage and backup requirements. With AWS, you can easily access durable, available, and controlled storage that can meet your data security requirements and scale with the needs of your organization.

Security

Security is of paramount importance to your CCMS solution. Data cannot be made available to users unless it is protected from unauthorized access. Privacy laws and federal, state, and county agency policies require access to be limited to authorized personnel for specific criminal justice uses. Moreover, user authorizations must be limited to data appropriate for the user's role. SmartCOP conforms to the FBI/CJIS Security Policy requirements for mobile computers, which require each user accessing systems that contain CJIS information to have a unique user ID and strong, encrypted password. Periodic password changes are also set per employee. We also meet or exceed FBI CJIS Security requirements related to Advanced Authentication and data encryption technologies.

SmartCOP will cooperate with the Contracting Government Agency in obtaining a thorough background screening of all personnel providing systems maintenance support. Prior to starting employment, thorough background checks and screening is performed. SmartCOP maintains FBI fingerprint cards and records checks on all personnel involved in CJIS related contracts. This information is available for review by Contracting Government Agencies upon request. SmartCOP shall also ensure that all eligible personnel receive a copy of the FBI CJIS Security Addendum as well as the SmartCOP Security Plan. An acknowledgment of the receipt and the contents of both the FBI CJIS Security Addendum and the SmartCOP Security Plan will be completed and returned to the Security Manager.

Active Directory

SmartCOP has integrated all its applications into Windows security functions, supporting Active Directory. This allows for a single Microsoft Windows Login to provide application access authentication.

Role Based Permissions

SmartCOP is a permission-based system whereby system users are required to have a username and password, providing **least privileged access** control at the application and data level. The username is linked to a security profile that determines what information a user can view, edit, add, and delete, and what reports a user can print. The system administrator has full control of what a user can and cannot do in the system.

Additionally, the customer has the option to integrate desktop application access into Windows Active Directory, allowing for a single login to provide application access authentication.

Role based access controls user permissions for the agency defined roles. For example, agencies can determine permission settings for state troopers. The agency decides what permissions a state trooper will be given and can then apply that "role" to any new user that needs those permissions thus eliminating the need to configure individual permissions for each user.



Passwords

With integrated Domain Authentication, an employee account is established in the SmartCOP system and linked to the user's domain account. When the application is launched, it will identify the Windows user, authenticate them in the SmartCOP system, and assign them appropriate permissions within the software.

With SmartCOP assigned credentials, designated system administrators can assign users a username and default password. Users have a mechanism to reset or change their password during the login in process. CJIS minimum password requirements will be used when accessing CJIS related systems.

Security Plan

SmartCOP agrees to prepare a security plan and submit it to WVDOT, WVOT and the West Virginia Cybersecurity Center of Excellence for review and approval, within 60 days of NTP. The plan will detail the policies, procedures, and system capabilities needed to meet the security requirements of the State of West Virginia.

Items that will be addressed in the Security plan will include:

- Proposed solution with WV Active Directory
- Proposed solution for integrating with local LE Agencies identity management systems
- Security approach for public users
- Database Security
- Data Privacy provisions
- Data communications security
- Firewall, virus, and spyware protection for AWS GovCloud
- SmartCOP's onboarding policy regarding background checks for employees that have access to CJIS related information.
- SmartCOP's off-boarding policy regarding deactivating access for employees
- Recommendations and processes for off-boarding agency employees and system users

AWS GovCloud Security

AWS GovCloud (US) is a dedicated AWS region built to host sensitive workloads for government entities and regulated organizations. When SmartCOP solutions are deployed in AWS GovCloud (US), they operate within an environment designed to align with applicable security and compliance requirements, including:

- **Fed RAMP authorized infrastructure**, assessed against rigorous federal security standards.
- **Support for CJIS aligned security requirements**, relevant to law enforcement and criminal justice agencies.
- **Eligibility for ITAR and export-controlled workloads**, with U.S. person access restrictions enforced by AWS.
- **U.S. only data residency**, with physical and logical isolation from commercial AWS regions.
- **Independent third-party audits and continuous compliance monitoring** of AWS security controls.

SmartCOP applies additional administrative, technical, and operational safeguards on top of AWS GovCloud's baseline capabilities and extends that same security principles to SmartCOP hosted environments outside of AWS GovCloud.



SmartCOP Hosted Security Controls

Across all SmartCOP hosted environments, SmartCOP employs a defense in-depth approach that includes, but is not limited to, the following controls:

- **Role based access controls** to network and server infrastructure using unique credentials, with access logged and monitored.
- **Multi Factor Authentication (MFA)** or other onetime passcode (OTP) mechanisms for hosting infrastructure access, including VPN, RDP, and administrative services.
- **Routine operating system and firmware patching** for servers, firewalls, appliances, and load balancers.
- **Host based firewalling and security group restrictions** by IP address, DNS, protocol, and application.
- **Encryption of all data in transit** using secure protocols such as TLS 1.2 or higher.
- **Encryption of sensitive data at rest**, including storage level encryption.
- **Regular, scheduled backups** supporting business continuity and recovery objectives.
- **Encryption of all backups** to ensure confidentiality and integrity.
- **Endpoint Detection and Response (EDR/XDR)** protections, such as CrowdStrike or equivalent technologies.
- **Continuous vulnerability scanning**, including agent-based host scanning tools such as Rapid7 InsightVM or equivalent.
- **Secure source code management and repositories**, leveraging enterprise grade platforms and controls.
- **Encryption of all communications and file transfers containing PII**, both in transit and at rest, including interactions with SmartCOP support personnel.

Protecting customer data and maintaining system integrity are top priorities for SmartCOP. We remain committed to transparent communication and to maintaining strong, consistent security practices across all SmartCOP hosted solutions.

Cybersecurity

As part of Harris, we go to great lengths to ensure that our data and our client's data is secure, protected from data breaches. This is both physical and cyber-based security. Our internal security measures include background checks and fingerprinting of employees that will have access to CJIS related information. Our employees are required to pass certification testing each year on CJIS regulations to ensure they are doing their part to keep customers' information safe.

At the Corporate level, our parent company, Harris Computer Systems (Harris), maintains an Information Security Management Program to ensure the confidentiality, integrity and availability of its systems and information. In order to identify any risks to Protected Health Information (PHI), Personally Identifiable Information (PII) or other Sensitive Information and the adoption of reasonable and appropriate measures to reduce any risks and vulnerabilities. Harris on a regular basis, monitors compliance with its Information Security Policies, Procedures and Standards and reviews and updates its Information Security Management Program. This ISMP Policy is written to align with industry standard security frameworks and best practices such as the National Institute of Standards and Technology (NIST) and the information security management standards of the International Organization of Standardization (ISO 27001).



Leadership allocates resources as needed and appropriate to support this ISMP. This and all associated security policies are located on the Corporate Information Technology (CIT) SharePoint site.

Risk or vulnerability assessments are conducted regularly for applicable businesses to identify potentials risk or vulnerabilities that may negatively impact systems or information. All assessment findings, remediation options, recommendations, and remediation decisions are documented and maintained by the Security Officer.

Disaster Recovery

AWS Disaster Recovery provides an excellent means for managing data redundancy and disaster recovery in the cloud. The AWS GovCloud hosting architecture we are recommending provides a high-availability solution that includes real-time data replication. We have extensive experience working with our clients to determine the Disaster Recovery (DR) approach, and RTO/RPO that best meets the agency's DR needs and budget. Our solution is built from industry standard components and does not require any proprietary hardware or software. We will work with WVDOT to determine the best DR approach and provide recommendations for a comprehensive Disaster Recovery Plan. The recommended architecture supports a failover system that allows one CCMS server to replace any other server or servers that become inoperable due to hardware failure or during a disaster, allowing for business continuity.

With AWS Disaster Recovery, there are varying levels of recovery depending on the agency's needs. SmartCOP will be leveraging AWS Availability Zones, AWS Backup, and AWS Multi-site (Hot Standby) in our DR approach for WVDOT. **The Multi-Site (Hot Standby) approach provides for real-time data replication with full systems running in two geographically distant locations at once. If one system fails, the other system takes over instantly.** This alternative is more costly but provides a quicker turnaround to minimize downtime and negligible disruption to the end-users. Once the failed system is restored, data can be loaded onto the restored SQL server, creating a complete history archive for the period the system was inoperable.

Server Maintenance

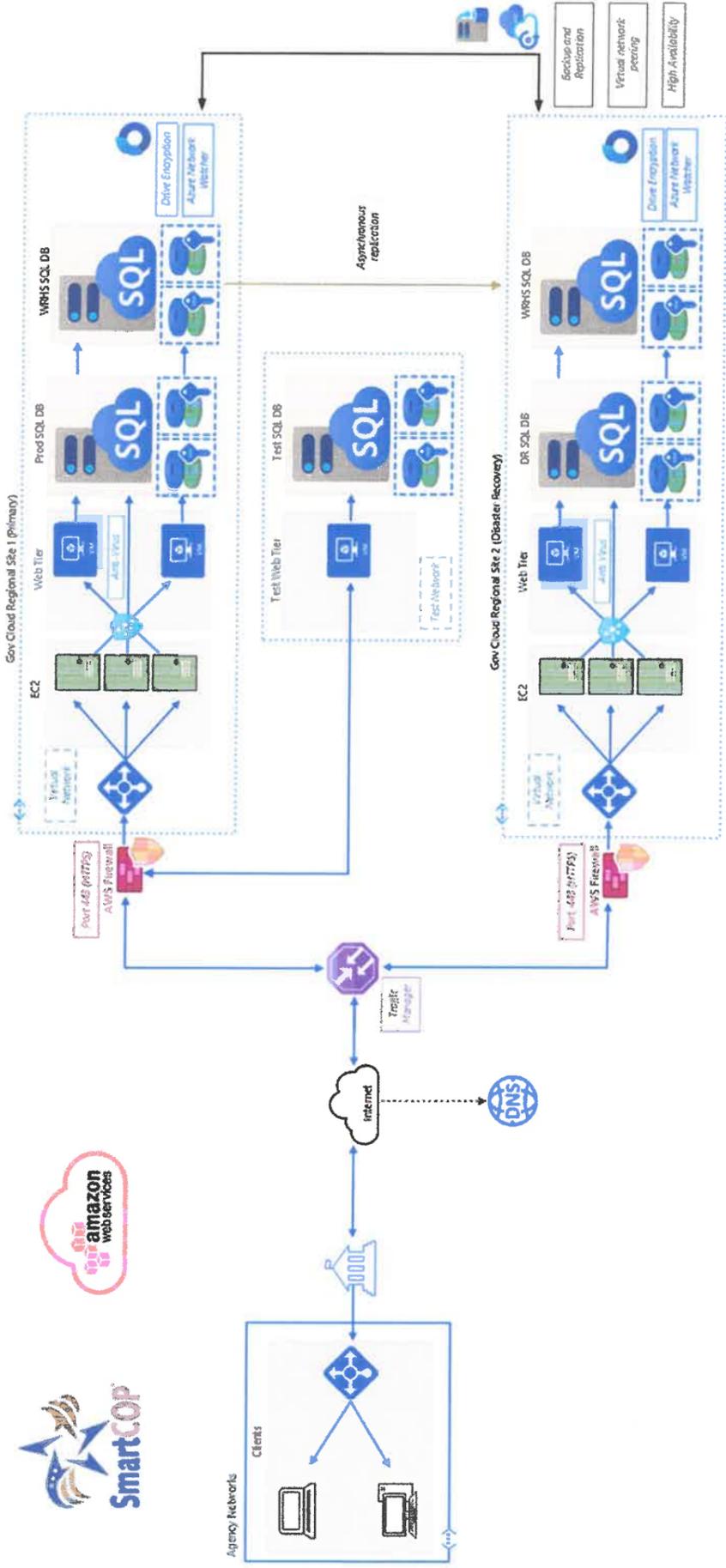
SmartCOP will establish agreed upon maintenance windows for system servers with WVDOT. In the event server maintenance will require any downtime, in the event of software upgrades, SQL patches, etc., SmartCOP will provide no less than one (1) week advance notice and schedule a time with WVDOT IT that is most convenient for the agency. SmartCOP strives to perform all maintenance and upgrades with little to no downtime, but there are instances when this is not possible.

Cloud Hosted System Design

The design included on the next page is a typical installation of a cloud hosted system with a production server, testing and training servers, and a separate instance of disaster recovery. During project planning, the SmartCOP database engineer will provide a blueprint in a system detailed design document for review and approval by WVDOT.

See Cloud Hosted System Design next page.

AWS GovCloud System Design





RACI Matrix

SmartCOP is providing this RACI Model as an example with typical installations. Final design and RACI model will be developed during project planning.

- **Responsible:** The person or people who do the work.
- **Accountable:** The one individual who is ultimately answerable for the task.
- **Consulted:** The people who provide input and feedback.
- **Informed:** The people who need to be kept up to date on progress.

Activity	SmartCOP		SmartCOP		SmartCOP Security Specialist	WVDOT Project Team	WVDOT IT Operations
	Project Manager	Cloud Architect/Engineer	SmartCOP Project Manager	SmartCOP Cloud Architect/Engineer			
SmartCOP Team Assignments	R	A			A	I	I
Agency Project Team & IT Project Champion	I	C			I	A	R
Planning & Design							
Define Deployment Scope & Objectives	I	R/A			C	I	C
Design Cloud Architecture	I	R/A			C	I	C
Develop Security & Compliance Plan	I	C			R/A	I	C
Infrastructure Setup							
Configure Servers & Storage (Production, Test, Training, Disaster Recovery)	I	R/A			C	I	C
Set Up Networking (VPCs, Subnets)	I	R/A			C	I	C
WVDOT Internal Hardware & Network							
Install & Configure agency hardware	I	C			I	I	R/A
Install agency network (LAN and WAN, user accessibility).	I	C			C	I	R/A



Activity	SmartCOP Project Manager	SmartCOP Cloud Architect/Engineer	SmartCOP Security Specialist	WV DOT Project Team	WV DOT IT Operations
Provide IP Addresses & Remote Access	I	C	C	I	R/A
Maintain wireless network. Includes coverage, data throughput, access speed, latency, etc.	I	C	I	I	R/A
Deployment & Migration					
Deploy Application to Cloud	I	R & A	I	I	I
Migrate Data to Cloud	I	R & A	I	I	C
Testing & Validation of Cloud Hosting					
Perform Functional Testing	I	A	I	I	R
Conduct Security Testing	I	R	A	I	I
Go-Live & Post-Deployment					
Final Go-Live Cutover	A	R	C	C	R
Monitor Performance & Optimize	I	R & A	I	I	C
Knowledge Transfer to Operations	A	R	I	I	C

SmartCOP will provide all AWS Cloud Server Software Licensing

- Windows Server and SQL Server on Amazon EC2
- Amazon EC2
- AWS Backup
- Amazon CloudWatch
- Amazon Virtual Private Cloud
- Continuous vulnerability scanning, including agent-based host scanning tools such as Rapid7.
- Endpoint Detection and Response (EDR/XDR) protections, such as CrowdStrike.



6. PROPOSED PROJECT EXECUTION

SmartCOP has extensive experience implementing our solutions in large state agency deployments. The key to success in any project implementation, is that SmartCOP and WVDOT work together on an agreed upon execution plan and timeline. In a pilot/phased implementation approach, WVDOT will identify which agency/agencies will be part of the initial pilot phase, during project planning.

Based on our expertise, we anticipate that it will take 12-15 months to implement the initial Pilot Phase from contract signing. This provides an expedited implementation for WVDOT's Pilot phase, which includes data conversion and associated interfaces. This is based on the following caveats:

- WVDOT strictly adheres to use of the SmartCOP commercial off-the-shelf (COTS) software being provided and minimizes any customized software development requests, outside any requisite interfaces.
- WVDOT meets its obligations for the project in the timeframes mutually agreed to within the Statement of Work and Project Plan.
- WVDOT provides the necessary leadership and empowerment to the agency representative assigned as its project manager.
- WVDOT agrees to a set time period for testing and provides adequate resources and availability of those resources to complete testing in the timeframe agreed to. This includes functional testing, data conversion testing, interface testing, performance testing, etc.
- Minimizes any changes to the initial project plan and statement of work that could jeopardize the project timeline.

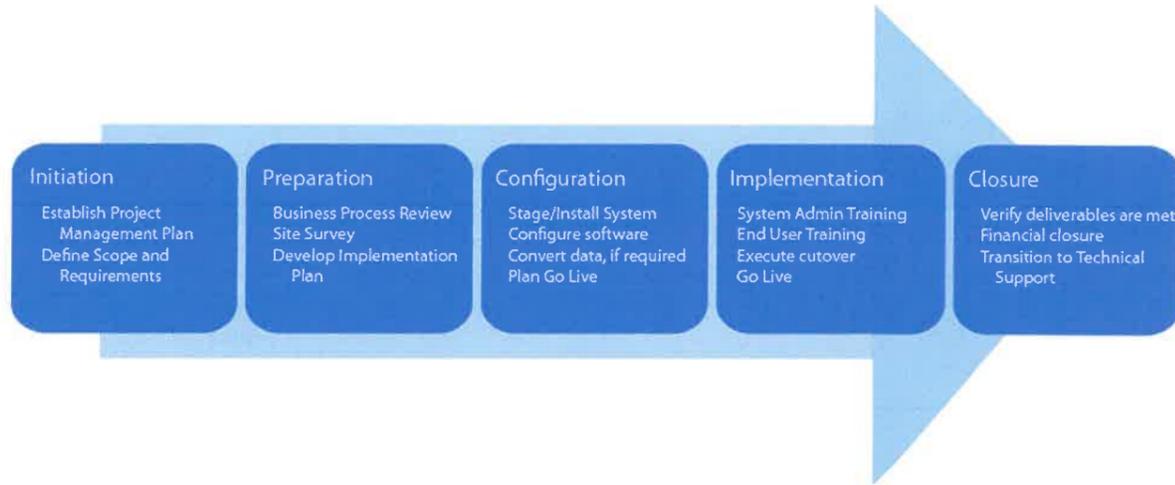
Project Execution

SmartCOP is recommending a phased / pilot implementation approach for WVDOT. SmartCOP will work closely with WVDOT to develop a Pilot Phase, and additional subsequent phases of the project. WVDOT will identify the agency/agencies that will be part of the initial pilot. Going forward, the Pilot Phase will serve as a guide for all subsequent phases of the project, until all agencies are brought live on the SmartCOP system. We anticipate subsequent phases will require much shorter implementation timelines since most of the system configurations will already be established, and testing has been completed.

WVDOT Pilot implementation will follow **SmartCOP's 5-Phase Project Approach**. A project work plan will be created, agreed too, and maintained by the SmartCOP Project Manager to ensure all tasks and activities stay on track in order to meet Pilot phase Go-Live.

Project Approach

The implementation methodology consists of the following five implementation phases:



After contract signing, the SmartCOP PM will schedule a **kick-off meeting** with the WVDOT project team to review the Scope of Work, deliverables, discuss project plans, timelines, etc. The kick-off meeting is usually held onsite with all key stakeholders. During the kick-off meeting initial planning will begin.

Implementation Phase I - Initial Planning

- Project Plan detailing tasks, ownership, timeline, milestones, etc.
- Requirements Tracking Matrix (RTM) to track all supported requirements as documented in WVDOT Requirements workbook.
- Project Communication Plan
- Stakeholder engagement Plan
- Issue Resolution Plan
- Change Management Plan
- Risk Management Plan
- Training / Knowledge Transfer Plan
- Data Conversion/Migration Plan
- Interface Plan
- Acceptance, Functional, Reliability Testing Plan
- Go-Live Deployment Plan – the project team might elect to review and finalize this at a later time in the implementation.

Implementation Phase 2 –Preparation

The preparation phase is where a lot of the initial work begins. Tasks that are included in this phase of the project are:

- Conduct onsite Business Process Review (BPR) sessions
- Collect and prepare data for data conversion
- Configure AWS GovCloud Production and Test/Training Servers
- Configure AWS GovCloud Disaster Recovery Server
- Develop blueprint for data setup and operational workflow
- Identify and define any customizations that are part of the SOW
- Hold system design review with the IT Team to ensure security and connectivity components are in place for accessing the AWS GovCloud environment.



Discovery and Business Process Review

During Project Initiation and Preparation and Planning, the project teams work together to establish the project management plan and define the scope of work. As part of this Discovery, the **SmartCOP Business Analyst will conduct an onsite Business Process Review (BPR)**. The key to our solution is its configurability. The design process, then, is encompassed in two tasks common to each module: Business Process and Standard Operating Procedure (SOP) discussions and Validate Configuration.

During the Business Process and SOP Discussions, we will work closely with WVDOT to identify current business rules, any processes, or procedures you have identified for improvement, and together we will map your workflow to our system. This is an excellent opportunity for you to implement the best practices and improvements your team has identified. In addition, we will identify any potential gaps and provide alternative solutions to fulfill any gaps, if available.

Once the modules have been configured, you will have the opportunity to review, validate, and accept the configuration. Because your team has been involved in the up-front discussions, trained on the use of the configuration tools, and performed the validation, they will be thoroughly versed in the design as configured for your environment.

Implementation Phase 3: The Configuration/Execution Phase

The Configuration phase is where we will configure the SmartCOP solutions to WVDOT Crash Reporting and e-Citation specifications in compliance with West Virginia State Code and Administrative Rules, and MMUCC. This phase of implementation usually requires the longest time. Once we have configured the system to meet WVDOT requirements, including the laws and regulations of West Virginia, we should not have to repeat this process for additional agencies that are brought onto the system, after the pilot phase. Tasks that are included during the configuration phase include:

- Install software – CCMS, Field Based Reporting, and Admin software
- Conduct weekly status meetings and provide status reports
- Configure software to WVDOT specifications
- Configure and test remote connectivity
- Establish and review backup procedures
- Convert data from legacy applications
- Development of 3rd party interfaces
- Development of any contractual custom programming
- Implement change management processes
- Plan the go-live date and cutover process
- Functional and Acceptance Testing w/ SmartCOP oversight (see details below)

Implementation Phase 4: The Implementation Phase

Implementation can occur in conjunction with the Configuration Phase and consists of constant monitoring by SmartCOP's Project Manager. Some specific tasks of this phase include:

- Monitor and update the project plan
- Ensure quality communication
- Conduct weekly status meetings and provide status reports
- Identify any project-related issues and find resolutions
- Rework any data conversion issues discovered during testing
- Resolve any interface development and connectivity issues
- Document project change requests
- Train system administrators



- Train the Trainer
- Train end users
- Final acceptance of functional requirements, data conversion, and interfaces
- Schedule final conversion for production
- Execute the cutover and go live

Go Live

The scheduling of the final conversion of data is based on client need and applicability in the go live process.

Post Go-Live

There will be a 30-to-60-day stabilization period after the initial go-live during the pilot program, to address any issues or concerns, and resolve any technical issues the agency experiences. During this time, the project team will be available, and the Project Manager will remain engaged. At the end of the post go-live period, and agreement by WVDOT, the second wave of statewide deployments can be scheduled.

Additional Phased Deployments

WVDOT will work with SmartCOP to identify the next agencies, in this phased approach, to be trained and deployed on the SmartCOP solution. It is expected that agency Train-the-Trainers (with SmartCOP oversight) will provide most of training to the LE agencies that come onboard after the initial pilot phase.

Since the system has already been configured to WVDOT, the implementation timeline should be much shorter. This deployment is expected to last 60-90 days given the following caveats:

- No new interfaces are introduced
- Minimal system configurations changes
- WVDOT meets its obligations for the project in the timeframes mutually agreed to within the Statement of Work and Project Plan.
- Agency personnel are given the time needed to attend training classes

Tasks that are part of this phase include but not limited to:

- Configure the new agencies in the system to agency specifications
- Add new users and security profiles,
- Establish connectivity to the SmartCOP AWS cloud servers,
- Establish existing interface connections for agency
- Perform any necessary data conversions
- Train new users,
- Set the go-live period
- Go-Live. Agency trainers will support LE agencies during go-live, with oversight from SmartCOP.

SmartCOP will continue to support phased deployments until all agencies, determined by WVDOT, are live on SmartCOP.



Implementation Phase 5: The Closing Phase

The final phase of the project occurs when all tasks are finished, all deployment phases have gone live, and the project is complete. An important element of this phase is the conclusion of services by the Implementation Team and the transition of ongoing client support to our Technical Support Team.

- Final review of tasks and verify all deliverables are met
- High speed connectivity validation for support purposes
- Turnover meeting to Technical Support
- Introduction to Customer Success Representative
- Client care relationship begins

Master Test Plan

SmartCOP will develop a master test plan that identifies and documents the modules, procedures, schedules, and the equipment and facilities required for testing. SmartCOP will demonstrate the operation of each contracted feature, function and interface simulating a live environment per the agreed upon test plan, however testing will be completed by WVDOT project team. Testing is always conducted by key stakeholders on the customer's team with SmartCOP oversight. In our experience, Functional Testing success and acceptance works best when the Agency is conducting the actual tests. SmartCOP will provide WVDOT with Test Scripts to be used during the testing period. The agency project team will use the test scripts to document all activities, errors, or issues.

Testing conducted will include:

- **Unit Testing** for all SmartCOP developed Forms, Reports, Interfaces, Conversions, Enhancements and Workflows (FRICEW).
- **Initial User Testing** – Functional components testing
- **System Testing** -ensuring that all modules within the system work seamlessly together
- **Integration Testing** – (detailed below) including data conversion testing to validate the system components work end-to-end, including all external interfaces.
- **Security Testing** – to ensure all components in solution meet security requirements
- **Performance Testing** -to ensure system meets performance requirements (see below)
- **User Acceptance Testing** -test to demonstrate solution and all required components are meeting functional, operational, and performance requirements.

SmartCOP Acceptance Testing Approach

Software acceptance testing is a critical activity that SmartCOP conducts in every implementation to ensure overall customer satisfaction. **The goal of this testing is to ensure that the software is functioning as expected before the system is turned over to the end users (“Go-Live”).**

SmartCOP approaches testing and user acceptance as a joint venture with the agency to ensure satisfaction and successful implementation. User acceptance testing is often the final step in any successful system implementation and is done to ensure that system requirements meet business needs. We encourage WVDOT to set a testing time limit (i.e., 30 days) in order to ensure that the project stays on schedule.

From product development to system implementation, SmartCOP adheres to solid quality assurance principles to protect our client's investments in technology. Our standards and repeatable development practices help us provide our clients with quality products and services that consistently meet or exceed expectations in terms of content, time frame, cost, and defect level. SmartCOP provides quality assurance (QA) services that include developing a QA plan, monitoring project management services, and reviewing design documents, test procedures, and conversion plans.



SmartCOP will work with WVDOT to develop and execute Functional, Performance and Reliability testing with mutually agreed-upon Acceptance Testing results criteria throughout the implementation. The Final Acceptance Test will include a satisfactory confirmation for each functional, performance and reliability requirement included in the Contract prior to go-live. Acceptance test parameters will identify failures or issues that arise during the reliability test period. During this period, the agency will continue to have dedicated project management and support personnel available to assist with any issue.

SmartCOP will provide a test plan along with detailed test cases for each software module. The test plan will be designed to demonstrate that all the functional requirements of SmartCOP's proposal have been met and are accepted by the agency. Test status, results, and sign-off are collected on each Test Case document and maintained in an Acceptance Testing binder. **Testing is always conducted by key stakeholders on the customer's team with SmartCOP oversight.** In our experience, Functional Testing success and acceptance works best when the Agency is conducting the actual tests. Any major deficiencies that are identified during the testing will be resolved prior to Go-Live. Minor deficiencies are typically noted and addressed after Go-Live once the project has transitioned into the Maintenance Phase.

The team works together to formulate a plan to test the data conversion, each software module, and interface to ensure they meet the agency's requirements. Testing activities occur throughout the implementation project. SmartCOP will train the agency on how to use the software prior to user acceptance testing.

The agency will be responsible for conducting the testing, with SmartCOP oversight, documenting the results, and providing feedback to SmartCOP so that any issues identified can be addressed and corrected before the system goes live.

Testing Failures: SmartCOP welcomes the opportunity to work with the agency to determine the appropriate remedy to issues that arise during system implementation and acceptance testing. In the event that the application does not meet reliability test period, SmartCOP will make every conceivable effort to correct the issue and will not stop until it passes the reliability test period.

Functional Requirements Testing

SmartCOP will work with WVDOT to develop an agreeable functional test plan. The test plan will be designed to demonstrate that all functional requirements of SmartCOP's solutions have been met and are accepted by the agency.

During configuration, each individual module and system function that is agreed to as part of the final contract is tested as the system is configured. WVDOT will have the opportunity to confirm all solution functionality prior to final system acceptance. SmartCOP will demonstrate the operation of each contracted feature, function and interface simulating a live environment per the agreed upon test plan. Should any feature, function, or interface fail testing, the error will be documented and classified. We have provided an example of a **Test Case in the Appendix. SmartCOP will work with WVDOT to resolve errors prior to go-live.**

Functional Testing begins after product delivery and configuration has occurred – prior to any widespread user training. SmartCOP welcomes discussion with the agency on limitations of time for the completion of testing. It is in both party's interest to limit time available for testing to ensure timely implementation. However, we would encourage the agency to set a testing time limit in order to ensure that the project stays on schedule.

In the event that a functional requirement cannot be met, SmartCOP personnel will meet with agency personnel to capture intent of the requirement and discuss the SmartCOP interpretation of the requirement and how our system handles the requirement. In the event that the interpretation differs, SmartCOP will present deployment options to accommodate that align with system capability.



Interface Testing

Interfaces are tested similarly to software functional tests. **Each interface will have a test plan and appropriate number of test cases written. Agency personnel along with SmartCOP will conduct the test cases together.** For example, interface testing will be conducted on NIBRS submission, CLERY, etc., to ensure data is flowing as required.

Interface Testing will occur once the system is in place to validate the required interfaces within the system.

Performance Testing

Performance testing will be conducted at the successful implementation/completion of each module and again when the full system has been successfully implemented. The performance testing is to ensure that the system performs at the stated levels in the contract.

Simple time measurement device may be used to determine time-based events. For all other events, an acceptance testing process can be provided and agreed upon in order to determine if standards are met.

SmartCOP will adhere to the agreed upon performance measures over the lifetime of the system, as long as SmartCOP is hosting the production environment. Since our proposed system is an off-the-shelf offering, we are continually enhancing the product with features and capability.

Performance testing will include testing system performance and operations to include:

- Inquiry and file maintenance functions
- Problem-free interoperability for hardware and software components
- Ability to for users to continue with system operations during back-ups and other system administrative tasks. There will be times during major software upgrades/updates that might require the system to be down. When this happens, SmartCOP will work with WVDOT to schedule a time that is desirable for the agency. However, most software updates do not require system downtime.

Software Installation and Configuration

SmartCOP provides comprehensive installation services for each of the product lines considered in this proposal. We begin by deploying the AWS Gov/Cloud environment for both the production and test/training servers, as well as provide recommended specifications for communication, and peripheral devices needed for a successful implementation. Additionally, we can assist the IT staff with initial configuration and setup of the peripheral devices. SmartCOP completes all software installation. We have seasoned professionals with a wealth of experience for installing, configuring, and tuning our products to perform to the agency's environment. We have developed implementation tools, proven over time, to help deliver our software solution to the agency. By means of both on-site (as needed) and remote installation, we can efficiently and reliably install and perform base configuration of each software module.

The implementation timeline is dependent upon the agency identifying and assigning a project manager that can make configuration decisions and implement them within the timeline defined. Once the contract is signed, a Statement of Work is created outlining the responsibilities of both parties.



Interface Development

In SmartCOP's 25 plus years of operation, we have written and supported many connections. SmartCOP Interfaces are developed and delivered during Phase 3-Configuration of the project plan.

Developing and deploying interfaces to 3rd party systems is a team effort. **SmartCOP will develop, deliver, and test contracted interfaces as detailed in the project plan.** WVDOT will need to provide network connections so that SmartCOP can send and/or receive data from the 3rd party application. With bi-directional interfaces, cooperation from the 3rd party vendor is usually required to make the two systems communicate and send/receive data.

Interface development tasks include, but are not limited to:

- **Initiation & Planning.** Initiation activities will be covered within the overall project plan and developed upon award and contracts.
- **Requirements.** Key contacts and data elements will be identified, confirmed, and mapped to the application database.
- **Installation/Construction.** Interface program(s) will be developed, including transformation rules (if any). Iterative development and prototyping are used to ensure that interfaces function correctly in a production setting. Unit, system, and integration testing will be conducted and then deployed to production for system acceptance testing.

The system uses Microsoft SQL Server as the database software, version 2019+. Any reporting engine capable of connecting to this database engine can be used outside of the application as deemed necessary by the Agency.

- **User Acceptance Testing Validation.** Full production functionality will be confirmed with the Agency.

The SmartCOP system contains an **interface manager tool** that allows personnel to manage interfaces that are in place and changes that are necessary in their configuration. Additionally, the system is built on Microsoft SQL server and therefore an open architecture. We work with our customers to gather data from the system and integrate it with read-only 3rd party tools.

Data Conversion/Migration Methodology

Data conversion serves a vital part of the transition to the SmartCOP product suite.

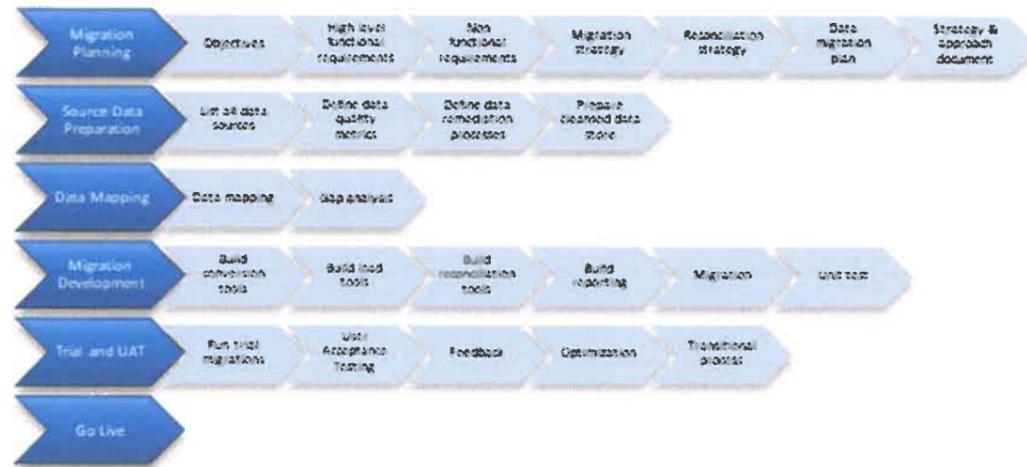
Our specialized team of Database Administrators perform all data migrations in-house. Custom SQL scripts are built for each customer conversion. SmartCOP works closely with the agency to conduct data mapping from the client's current system to the SmartCOP system. During the data mapping phase, all elements that need to be converted are identified and then mapped to their respective fields in the new system. All converted data is submitted to the agency prior to final migration for client validation. Any re-work identified during the validation process is completed before the final conversion.

As part of this process, the agency assumes sole responsibility for providing SmartCOP with any and all data or other information necessary to develop a data conversion plan and perform data conversion. The accuracy, completeness, adequacy, and timeliness of the data and/or information provided shall be the sole responsibility of the agency. SmartCOP shall have no duty whatsoever to verify, test, or review any data and/or information provided that can feasibly be converted into the SmartCOP applications as outlined in the data conversion plan. The verification and testing of the accuracy and completeness of the converted data and/or information shall be the sole responsibility of the agency.

The amount of legacy data that can be migrated is determined by the agency. We caution the agency on the impact that converting all legacy data has on space requirements. We look at the size of the data being converted and provide the customer with the estimated space required on the cloud server to hold the converted data and future growth.

During the actual conversion, we convert the legacy data from a copy of the legacy database or export to an acceptable format in order to convert. Initially, to protect the legacy data and ensure it is converted properly, we go through several rounds of validation. During validation, the customer identifies reports, of their choosing, from the legacy system and compare those reports in the SmartCOP system to ensure proper conversion. We also provide a mapping document that provides a table-to-table mapping of the data from the legacy system to the SmartCOP system.

Migration Strategy



Migration Planning

- Data conversion begins with our personnel working with the agency point of contact to identify all the elements to convert as well as an acquisition of a database diagram and entity relationship diagram.
- The amount of legacy data that can be migrated is determined by the agency. We caution the agency on the impact that converting all legacy data has on space requirements. We look at the size of the data being converted and provide the customer with the estimated space required to hold the converted data and future growth.

Source Data Preparation

- SmartCOP engineers map out where we believe the data should be placed in the database structure.
- Agency performs backup/extraction of the data from legacy system and provides to SmartCOP.
- Engineers generate custom SQL scripts to perform the migration of data from one system to another.

Data Mapping

- While data mapping occurs, our implementation staff will install the software on a validation (Test) server in the cloud. It will be utilized by the client to verify data appears in the correct locations.



Migration Development

- During the actual conversion, we convert the legacy data from a copy of the legacy database or export to an acceptable format in order to convert. Initially, to protect the legacy data and ensure it is converted properly, we go through several rounds of validation. During validation, the customer identifies reports, of their choosing, from the legacy system and compare those reports in the SmartCOP system to ensure proper conversion. We also provide a mapping document that provides a table-to-table mapping of the data from the legacy system to the SmartCOP system.
- SmartCOP will run a unit test migration of the data (or a representative portion depending on size).

Trial and User Acceptance Testing

- Client representative will review converted data in a side-by-side comparison between legacy and new system.
- SmartCOP adjusts the transformation scripts and reruns the conversion.
- Client again reviews conversion and provides comments.
- Process is repeated until client agrees that the data has been mapped and migrated properly.

Go Live

The scheduling of the final conversion of data is based on client need and applicability in the go live process.

Project Work Plan

The following project work plan has been created as a sample for WVDOT. A final approved project work plan will be created, after contracting, to include all contracted solutions and services. The timeline start date will begin upon contract execution.

ID	Task Mode	Task Name	Duration	Start	Finish	Predecessors	Resource Names
1		West Virginia Sample Project	389 days	Wed 4/1/26	Mon 9/27/27		
2		Contract Executed	1 day	Wed 4/1/26	Wed 4/1/26		Agency / SmartCOP
3		Initiation Phase	36 days	Thu 4/2/26	Thu 5/21/26	2	
4		Kickoff Meeting	2 days	Thu 4/2/26	Fri 4/3/26		Agency / SmartCOP
5		Statement of Work / System Detailed Design	25 days	Mon 4/6/26	Fri 5/8/26	4	
6		Site Visit - Process reviews	5 days	Mon 4/6/26	Fri 4/10/26		Agency / SmartCOP
7		Requirements Analysis	5 days	Mon 4/13/26	Fri 4/17/26	6	Agency / SmartCOP
8		SOW and Project Plan Development	5 days	Wed 4/22/26	Fri 5/1/26	7	Agency / SmartCOP
9		Security Plan Submission	5 days	Mon 5/4/26	Fri 5/8/26	8	Agency
10		Project Champion Identified & Assigned	1 day	Mon 5/18/26	Mon 5/18/26	5	Agency
11		IT Champion Assigned	1 day	Thu 5/21/26	Thu 5/21/26	5	Agency
12		Preparation Phase	226 days	Wed 4/1/26	Wed 2/10/27		
13		Interface Software Development	120 days	Wed 4/1/26	Wed 2/10/27		SmartCOP
14		Hosting Environment Preparation	30 days	Wed 4/1/26	Wed 5/20/26		SmartCOP
15		Stand up AWS GovCloud Infrastructure	2 days	Thu 4/9/26	Fri 4/10/26		SmartCOP
16		Stand up Instances	12 days	Mon 4/13/26	Tue 4/28/26	15	
17		Primary Instance Setup	2 days	Mon 4/13/26	Tue 4/14/26		SmartCOP
18		Disaster Recovery Instance Setup	1 day	Wed 4/15/26	Wed 4/15/26	17	SmartCOP
19		Training Instance Setup	1 day	Thu 4/16/26	Thu 4/16/26	18	SmartCOP
20		Test Instance Setup	1 day	Fri 4/17/26	Fri 4/17/26	19	SmartCOP
21		Configure Routes, Whitelists and Access	2 days	Mon 4/20/26	Tue 4/21/26	20	Agency / SmartCOP
22		Test / confirm access	2 days	Wed 4/22/26	Thu 4/23/26	21	SmartCOP
23		Network Assessment	3 days	Fri 4/24/26	Tue 4/28/26	22	Agency / SmartCOP
24		Order & Install Additional Hardware (if necessary)	15 days	Wed 4/29/26	Wed 5/20/26	23	Agency / SmartCOP
25		Client Product Delivery	17 days	Thu 11/12/26	Fri 12/4/26	16	Agency
26		Deliver Client Software	2 days	Thu 11/12/26	Fri 11/13/26		SmartCOP
27		Install Client Software	15 days	Mon 11/16/26	Fri 12/4/26	26	Agency
28		Configuration Phase	195 days	Thu 5/21/26	Wed 2/17/27	14	
29		Software Configuration	15 days	Thu 5/21/26	Wed 6/10/26		Agency / SmartCOP
30		Administrative Training	5 days	Thu 5/21/26	Wed 5/27/26		Agency
31		Configure Applications	10 days	Thu 5/28/26	Wed 6/10/26	30	
32		System Acceptance	180 days	Thu 6/11/26	Wed 2/17/27	29	
33		Training Plan Submission	10 days	Thu 6/11/26	Wed 6/24/26		Agency / SmartCOP
34		Training Plan Acceptance	1 day	Thu 6/11/26	Thu 6/25/26	33	Agency
35		Acceptance Test Plan Submission	10 days	Thu 6/11/26	Wed 6/24/26		Agency

Project: WV Project Plan
Date: Thu 2/26/26

Task Legend:

- Task: Solid blue bar
- Split: Dotted blue bar
- Milestone: Diamond symbol
- Summary: Arrow symbol
- Project Summary: Arrow with bar symbol
- External Tasks: Grey bar
- External Milestone: Diamond symbol
- Inactive Task: Dotted grey bar
- Inactive Milestone: Diamond symbol
- Inactive Summary: Arrow symbol
- Manual Task: Solid blue bar
- Duration-only: Grey bar
- Manual Summary Rollup: Solid blue bar
- Manual Summary: Arrow symbol
- Start-only: Arrow symbol
- Finish-only: Arrow symbol
- Progress: Solid blue bar
- Deadline: Arrow symbol

ID	Task Mode	Task Name	Duration	Start	Finish	Predecessors	Resource Names	Mar.
36		Acceptance Test Plan Approval	1 day	Thu 6/25/26	Thu 6/25/26	35		
37		Integration Testing	5 days	Thu 2/11/27	Wed 2/17/27	13		
38		User Acceptance Testing	10 days	Fri 6/26/26	Thu 7/9/26	36		
39		Corrections	10 days	Fri 7/10/26	Thu 7/23/26	38		
40		Data Conversion	111 days	Thu 6/11/26	Thu 11/12/26	29		
41		Extract Citation Data - Provide to SmartCOP	5 days	Thu 7/2/26	Wed 7/8/26		Agency	
42		Extract Crash data - Provide to SmartCOP	5 days	Fri 6/12/26	Thu 6/18/26		Agency	
43		Schema and data dictionary Delivery	1 day	Thu 6/11/26	Thu 6/11/26		Agency	
44		Conversion Mapping	5 days	Fri 6/12/26	Thu 6/18/26	43	SmartCOP	
45		Mapping Review	5 days	Fri 6/19/26	Thu 6/25/26	44	Agency	
46		Initial Data Conversion	60 days	Fri 6/26/26	Thu 9/17/26	45	SmartCOP	
47		Conversion Review	5 days	Fri 9/18/26	Thu 9/24/26	46	Agency	
48		Subsequent Conversion Updates	30 days	Fri 9/25/26	Thu 11/5/26	47	SmartCOP	
49		Conversion Review & Acceptance	5 days	Fri 11/6/26	Thu 11/12/26	48	Agency	
50		Implementation Phase	157 days	Thu 2/18/27	Fri 9/24/27	28,12		
51		Conduct Train-the-Trainer Training	5 days	Thu 2/18/27	Wed 2/24/27		SmartCOP	
52		Pilot Deployment	124 days	Thu 2/25/27	Tue 8/17/27	51	Agency / SmartCOP	
53		Conduct User Training	2 days	Thu 2/25/27	Fri 2/26/27			
54		Convert required Data	1 day	Mon 3/1/27	Mon 3/1/27	53		
55		Go Live	1 day	Tue 3/2/27	Tue 3/2/27	54		
56		Pilot Period	90 days	Wed 3/3/27	Tue 7/6/27	55		
57		Stability Period	30 days	Wed 7/7/27	Tue 8/17/27	56		
58		Troop 0/4 Deployment	4 days	Wed 8/18/27	Mon 8/23/27	52	Agency / SmartCOP	
59		Conduct User Training	2 days	Wed 8/18/27	Thu 8/19/27			
60		Convert required Data	1 day	Fri 8/20/27	Fri 8/20/27	59		
61		Go Live	1 day	Mon 8/23/27	Mon 8/23/27	60		
62		Troop 1 Deployment	4 days	Tue 8/24/27	Fri 8/27/27	58	Agency / SmartCOP	
63		Conduct User Training	2 days	Tue 8/24/27	Wed 8/25/27			
64		Convert required Data	1 day	Thu 8/26/27	Thu 8/26/27	63		
65		Go Live	1 day	Fri 8/27/27	Fri 8/27/27	64		
66		Troop 2 Deployment	4 days	Mon 8/30/27	Thu 9/2/27	62	Agency / SmartCOP	
67		Conduct User Training	2 days	Mon 8/30/27	Tue 8/31/27			
68		Convert required Data	1 day	Wed 9/1/27	Wed 9/1/27	67		
69		Go Live	1 day	Thu 9/2/27	Thu 9/2/27	68		
70		Troop 3 Deployment	4 days	Fri 9/3/27	Wed 9/8/27	66	Agency / SmartCOP	

Project: WV Project Plan
Date: Thu 2/26/26

Task	External Milestone	Manual Summary Rollup
Split	Inactive Task	Manual Summary
Milestone	Inactive Milestone	Start-only
Summary	Inactive Summary	Finish-only
Project Summary	Manual Task	Progress
External Tasks	Duration-only	Deadline

ID	Task Mode	Task Name	Duration	Start	Finish	Predecessors	Resource Names	Mar
71		Conduct User Training	2 days	Fri 9/3/27	Mon 9/6/27			
72		Convert required Data	1 day	Tue 9/7/27	Tue 9/7/27	71		
73		Go Live	1 day	Wed 9/8/27	Wed 9/8/27	72		
74		Troop 5 Deployment	4 days	Thu 9/9/27	Tue 9/14/27	70	Agency / SmartCOP	
75		Conduct User Training	2 days	Thu 9/9/27	Fri 9/10/27			
76		Convert required Data	1 day	Mon 9/13/27	Mon 9/13/27	75		
77		Go Live	1 day	Tue 9/14/27	Tue 9/14/27	76		
78		Troop 6 Deployment	4 days	Wed 9/15/27	Mon 9/20/27	74	Agency / SmartCOP	
79		Conduct User Training	2 days	Wed 9/15/27	Thu 9/16/27			
80		Convert required Data	1 day	Fri 9/17/27	Fri 9/17/27	79		
81		Go Live	1 day	Mon 9/20/27	Mon 9/20/27	80		
82		Local Agency Deployment	4 days	Tue 9/21/27	Fri 9/24/27	78	Agency / SmartCOP	
83		Conduct User Training	2 days	Tue 9/21/27	Wed 9/22/27			
84		Convert required Data	1 day	Thu 9/23/27	Thu 9/23/27	83		
85		Go Live	1 day	Fri 9/24/27	Fri 9/24/27	84		
86		Closure Phase	29 days	Wed 8/18/27	Mon 9/27/27	57		
87		System Tuning	10 days	Wed 8/18/27	Tue 8/31/27		SmartCOP	
88		Final Acceptance Testing & SignOff	15 days	Wed 9/1/27	Tue 9/21/27	87	Agency	
89		Contract Closure	1 day	Mon 9/27/27	Mon 9/27/27	88	Agency / SmartCOP	
90		Transition Account to Technical Support	0 days	Mon 9/27/27	Mon 9/27/27	89	SmartCOP	

Project: WV Project Plan
Date: Thu 2/26/26

Task	External Milestone	Manual Summary Rollup
Split	Inactive Task	Manual Summary
Milestone	Inactive Milestone	Start-only
Summary	Inactive Summary	Finish-only
Project Summary	Manual Task	Progress
External Tasks	Duration-only	Deadline



7. PROJECT ORGANIZATION

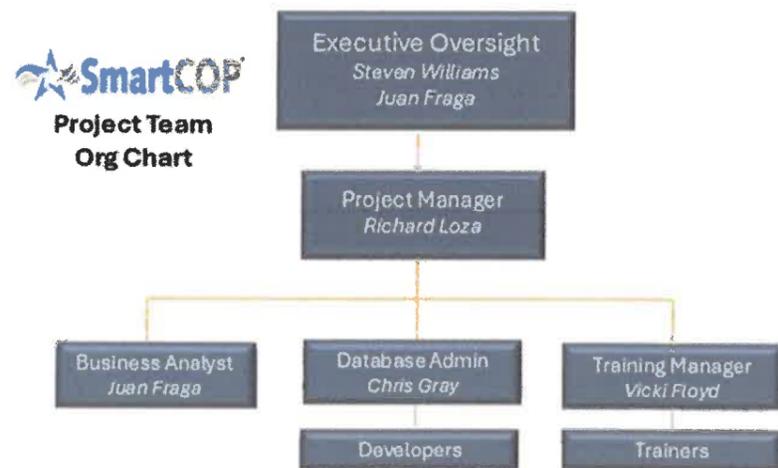
Each SmartCOP project is managed with **Executive Oversight** by the **Project Implementation Team**. The Project Implementation Team is led by a **Senior Project Manager**. The Project Team also includes **Business Analyst, Database Administrator, Trainers, and Developers**. The SmartCOP Project Team is comprised of talented employees who bring a wealth of knowledge, both technically and on the proposed products and services. Not only does our team have superior knowledge of our solutions and services but also on the Public Safety Software industry as a whole.

SmartCOP will assign a **Project Manager (PM)** to serve as the single point of contact for managing the successful implementation of this project. The Project Manager is accountable to SmartCOP's Executive Oversight. The PM reports biweekly project status, accomplishments, obstacles, and items requiring assistance to the Director of Professional Services. Monthly reporting occurs by both the Project Manager and Director of Professional Services to SmartCOP's Executive Vice President to ensure the project stays on schedule.

The PM acts on behalf of SmartCOP to ensure all contractual deliverables are implemented in a timely manner and to agency specifications. No subcontractors are envisioned for core project work; all work will be performed and managed by SmartCOP personnel. Under the direct supervision of the Project Manager, Trainers will provide user-level classroom training services.

SmartCOP empowers the PM to make the necessary decisions to ensure a successful project. As such, the project manager has the ability and authority to obtain the necessary resources as needed. In other words, should the project manager determine that additional resources are required to complete a certain portion of the project; he/she has the necessary authority to acquire those resources.

We highly recommend WVDOT assign a point of contact (**Project Champion**) who is knowledgeable in law enforcement as well as the agency's business rules and workflow. **In our past experience, a Project Champion is a key ingredient to the project's success.** Secondly, we recommend WVDOT assign an **Information Technology Champion** to serve as the technical contact / liaison for the duration of the project. Again, based on past experience, we have found these two can handle the majority, if not all, of the necessary agency tasks required for the project. In the event that either champion needs assistance, they have the ability and authority to delegate in the agency accordingly.





The core of the team is as follows:

SmartCOP Project Team	
Executive Oversight	<ul style="list-style-type: none"> ◆ Provides leadership and guidance throughout the entire project. ◆ Meets regularly with PM for project status updates, accomplishments, obstacles, etc. to ensure the project stays on time. ◆ Handles contract issues and resolutions.
Project Manager	<ul style="list-style-type: none"> ◆ Assumes responsibility for project communication to Key Stakeholders. ◆ Participates in defining the project scope. ◆ Coordinates Stakeholder review and approval of deliverables. ◆ Provides direction to the team regarding Agency priorities and interests. ◆ Assists in identifying and resolving issues, risks, and critical dependencies. ◆ Participates with Project Team members in establishing requirements, as necessary. ◆ Participates in appropriate reviews. ◆ Receives and acts upon escalated non-compliance items. ◆ Assists in resolving delivery issues unresolvable at lower levels. ◆ Ensures that business problems/issues are appropriately escalated and resolved.
Business Analyst	<ul style="list-style-type: none"> ◆ Works closely with project team to document & understand the business rules. ◆ Consults and Documents any new processes identified for improvement. ◆ Maps workflows to configure CCMS, Field Based Reporting, etc.
Database Administrator	<ul style="list-style-type: none"> ◆ Coordinates Technical Team ◆ Coordinates / Performs site check ◆ Consults with customer on network requirements ◆ Provides technical guidance for the project team. ◆ Manages and oversees server hardware installation for production, test/training, and disaster recovery servers. ◆ Signs-off on environment and configuration solutions. ◆ Provides technical input to change requests. ◆ Is available for project deliverables conformance reviews. ◆ Participates in work product reviews. ◆ AWS GovCloud Server setup and Database sizing ◆ Prepares, implements, and manages the CCMS database ◆ Responsible for application software installation ◆ Develops and maintains database objects (i.e., stored procedures, functions, views, triggers, etc.) ◆ Interface development and testing ◆ Data conversions
Developers	<ul style="list-style-type: none"> ◆ SmartCOP developers work internally to develop new contracted interfaces ◆ Develop any custom programming that is part of the contract
Training Manager	<ul style="list-style-type: none"> ◆ Provides input for requirements and communication as requested. ◆ Participates in User Trainings. ◆ Provides support to the Project Manager during the Business Process Review & Gap Analysis.



Key Agency Stakeholders	
Project Sponsor	<ul style="list-style-type: none"> ◆ Assumes overall accountability of the Project. ◆ Sets the objectives and scope of the project in collaboration with our Project Sponsor. ◆ Supports the Project Managers and Project Team.
Project Manager	<ul style="list-style-type: none"> ◆ Single point of contact for vendor project manager. ◆ Assumes responsibility for project communication to Key Stakeholders. ◆ Participates in defining the project scope. ◆ Has decision-making authority ◆ Attends all project status review calls with vendor project manager. ◆ Participates in Business Process Review. ◆ Guides the project and has ownership for final decisions for the Agency. ◆ Coordinates Stakeholder review and approval of deliverables. ◆ Fosters commitment of all project participants and departments. ◆ Provides direction to the team regarding Agency priorities and interests. ◆ Assists in identifying and resolving issues, risks, and critical dependencies. ◆ Receives and acts upon escalated non-compliance items. ◆ Assists in resolving delivery issues unresolvable at lower levels. ◆ Ensures that business problems/issues are appropriately escalated and resolved.
IT Manager	<ul style="list-style-type: none"> ◆ Provides visible leadership and support for the project. ◆ Communicates project messages throughout their organization. ◆ Engages their staff to participate in the project where needed. ◆ Works in collaboration with our Infrastructure Manager. ◆ Provides technical guidance for the project team. ◆ Signs-off on environment and configuration solutions. ◆ Provides technical input to change requests. ◆ Is available for project deliverables conformance reviews. ◆ Participates in work product reviews.
Subject Matter Experts Dispatch Supervisors Patrol Supervisors Personnel Managers	<ul style="list-style-type: none"> ◆ Provides input to requirements and communication pieces as requested. ◆ Assists with system configuration and implementation ◆ Participates in Business Process Review ◆ Participates in User Acceptance Testing, Training, and Implementation activities. ◆ Supports Agency leadership in communicating key project messages and monitoring training.

Executive Oversight



Steven Williams, Executive Vice President, PMP

Steven is a strong leader and manager with over 18 years' experience working for SmartCOP, Steven has worked his way up to becoming SmartCOP's EVP. He earned both an MBA and Master of Science, Information Systems from the University of Colorado and holds a Project Management Professional (PMP) certification. Steve will direct oversight to the SmartCOP Project Manager.



Juan Fraga, Director of Professional Services

Juan brings a unique understanding and real-world public safety experience to his work at SmartCOP based on his years as a dispatcher for the Pensacola Police Department. Juan has been part of SmartCOP since 2001 and has served in many different positions. As the Director of Professional Services, he manages the implementation team. He also serves as the CAD Business Analyst on the project.

Project Team Experience

The SmartCOP Project Team is comprised of talented employees who bring a wealth of knowledge, both technically and on the proposed products and services. Not only does our team have superior knowledge of our products and services but also of the Public Safety Software industry as a whole.

Project Manager

For each implementation, SmartCOP assigns an experienced **Project Manager**, who serves as the single point of contact for managing the successful implementation of the project. The PM will have oversight from our **Executive Vice President, a certified PMP**, and the Director of Professional Services. The PM assigned is responsible for reporting project status, accomplishments, obstacles, etc., to the executives on a biweekly basis.

Richard Loza will serve as the Project Manager for WVDOT. Richard has 30 years' public safety experience and is highly skilled project manager at managing complex public safety software installations. As a Project Manager, Richard has been very successful managing projects for agencies large and small. Richard is detail-oriented and methodical in his approach to every project he manages. His ability to identify and resolve issues quickly to avoid risks to the project timeline can be accredited to his attention to detail on every project. He will be a great asset for your agency as you transition to the SmartCOP system. Richard holds a bachelor's and master's degree from the University of West Florida.

Juan Fraga will serve as Executive Oversight as well as the Business Analyst for this project. Juan has been with SmartCOP since 2001 and he brings unique understanding and real-world experience based on his years as a dispatcher for Pensacola Police Department. Juan served on the implementation teams for Florida Highway Patrol, South Carolina Dept of Public Safety, Tennessee Wildlife Resource Agency, and many more. Juan holds a bachelor's degree from University of West Florida and is a retired US Navy Air Traffic Controller.

Vicki Floyd will serve as the Training Manager for this project. Vicki will work closely with WVDOT project team to develop a detailed training plan that will meet the needs of the agency. Vicki has 30 years' experience with the Santa Rosa County Sheriff's Office before joining SmartCOP in 2003. Vicki has completed well over 100 training installations and has served as both a Project Manager and Training Consultant on earlier projects. Vicki has worked on projects with FHP-Dept of Environmental Protection, Colorado Parks and Wildlife, Gwinnett County Sheriff's Office, and many others and will bring a wealth of knowledge to this project.



Chris Gray will serve as the Database Administrator for this project. Chris has been with SmartCOP since 2005 and has worn many hats within the company. As a Database Administrator, Chris is responsible for coordinating the technical team, AWS GovCloud deployment, database sizing and setup, managing production and training servers, developing interfaces, data conversions, maintains backups and disaster recovery plans. Chris has previously worked on projects with FHP-Dept of Environmental Protection, Montana Highway Patrol, Kansas Highway Patrol, Colorado Parks and Wildlife, and many more. Chris holds an MS, Information Technology from Florida State University, and a bachelor's in communication arts from University of West Florida.

Project Team Resumes

Resumes have been included in the following pages.

Steven Williams
850-429-0082
Steven.williams@smartcop.com

Steven Williams

Executive Vice President, SmartCOP
Executive Oversight

Summary of Qualifications

Steven is a strong leader and manager with over 18 years' experience working for SmartCOP. Starting in 2006 as a Project Manager, Steven has moved his way up in SmartCOP to Vice President of Operations and now currently serves as Executive Vice President. He earned both an MBA and Master of Science, Information Systems from the University of Colorado and holds a Project Management Professional (PMP) certification. Steven will provide direct oversight to the SmartCOP Project Manager.

PREVIOUS ROLES

- ◆ Vice President Operations, SmartCOP - 2018 -2023
- ◆ Project Manager, SmartCOP - 2006 -2018
- ◆ Senior Program Manager, Lucent Technologies -2000-2006
- ◆ United States Army, Captain 1994-1999

PROJECT RESPONSIBILITIES

- ◆ Provide Executive Oversight to Project Manager
- ◆ Provide guidance and conflict resolution, if necessary

EDUCATION

- ◆ University of Colorado -Master of Science, Information Systems (MIS), 2003
- ◆ University of Colorado- Master of Business Administration (MBA), 2002
- ◆ United States Military Academy at West Point, NY- Bachelor of Science, Political Science / Systems Engineering (Dean's List), 1994
- ◆ Project Management Institute -Project Management Professional (PMP), 2005
- ◆ Stevens Institute of Technology -Certificate in Professional Program Management, 2001

Juan Fraga
850-429-0082
Juan.fraga@smartcop.com

Juan Fraga

Director of Professional Services, SmartCOP
Executive Oversight/Business Analyst

Summary of Qualifications

Juan brings a unique understanding and real-world public safety experience to his work at SmartCOP based on his years as a dispatcher for the Pensacola Police Department. Juan has been with SmartCOP since 2001 and has held various roles during his tenure with SmartCOP. As the Director of Professional Services, Juan provides Executive Oversight to the implementation team. Juan also serves as the Business Analyst on new projects. As the Business Analyst for WVDOT, Juan will be responsible for understanding and documenting WVDOT's business rules as well as consult on new processes and applying best practices.

PREVIOUS ROLES

- ◆ Implementation/ Training Manager, SmartCOP
Juan was responsible for the development of all SmartCOP training curriculum. Juan worked with the agency and project managers to coordinate training schedules, determine training agendas, and develop training manuals best suited for an agency's specific needs.
- ◆ IT Services Manager, SmartCOP
Juan was responsible for managing and maintaining Florida Highway Patrol hardware and software infrastructure in support of SmartCAD and SmartRMS systems. Juan oversaw a team that maintains 38 servers. Duties and responsibilities included implementing disaster recovery and security updates and patches. In addition, Juan is responsible for IT services at the Santa Rosa County, FL Sheriff's Office.

PROJECT RESPONSIBILITIES

- ◆ Acts as Executive Oversight to provide leadership and guidance throughout the project.
- ◆ Works closely with project team to document & understand the business rules.
- ◆ Consults with customer and documents any new processes identified for improvement.
- ◆ Resolves networking or system issues experienced by customers

Juan Fraga
850-429-0082
Juan.fraga@smartcop.com

- ◆ Assists in development of agency-specific reports

PREVIOUS PROJECT ASSIGNMENTS

- ◆ Florida Highway Patrol/Department of Environmental Protection
- ◆ South Carolina Department of Public Safety
- ◆ Florida Atlantic University
- ◆ Tennessee Wildlife Resource Agency
- ◆ Kansas Highway Patrol
- ◆ St. Augustine Police Department
- ◆ Virgin Islands Police Department
- ◆ Numerous Police and Sheriff Offices across the country

EDUCATION

- ◆ University of West Florida, Pensacola, Florida 1996 – Bachelor of Arts
- ◆ APCO Institute Inc., Daytona, Florida 1995 - Communications Training Officer Instructor
- ◆ Pensacola State College, Pensacola, Florida 2012 - Educator Preparation Institute
- ◆ U.S Navy -Navy Air Traffic Controller, 1981-1993

Richard Loza
850-429-0082
Richard.loza@smartcop.com

Richard Loza

Project Manager, SmartCOP

Summary Qualifications

Richard has 30 years' public safety experience and is highly skilled as a project manager at managing complex public safety software installations. He came to work at SmartCOP in January of 2023. He retired with 20 years of service from the United States Navy as a Corpsman and EMT. During his service, he worked as an Aerospace Medical Technician culminating with his assignment to the Navy Flight Demonstration Squadron, The Blue Angels. Richard has also worked as an EMT/Explorer for the Los Angeles County Fire Dept. and as a Dispatcher and Records Clerk for the Pensacola Police Department.

As a Project Manager, Richard has been very successful managing projects for agencies large and small. Richard is detail-oriented and methodical in his approach to every project he manages. His ability to identify and resolve issues quickly to avoid risks to the project timeline can be accredited to his attention to detail on every project. He will be a great asset for your agency as you transition to the SmartCOP system.

Richard will be the single point of contact for your agency and will assume responsibility for project communications to the agency's project team and the key stakeholders. Richard has executive oversight from our Director of Professional Services and our Executive Vice President (a certified PMP).

Previous Roles

- ◆ Aerospace Medicine Technician & Safety Supervisor, Project Manager, EMT Instructor, **United States Navy, 20 years**
- ◆ Los Angeles County Fire - EMT
- ◆ **Pensacola Police Department – Dispatcher & Records Clerk**

PROJECT RESPONSIBILITIES

- ◆ Assumes responsibility for project communication to Key Stakeholders.
- ◆ Participates in defining the project scope.
- ◆ Coordinates Stakeholder review and approval of deliverables.
- ◆ Has responsibility for managing the project timeline and ensuring the project is delivered on time and on budget.

Richard Loza
850-429-0082
Richard.loza@smartcop.com

- ◆ Responsible for identifying, documenting and resolving issues, risks, and critical dependencies. Especially those risks that can affect the project timeline.
- ◆ Provides direction to the team regarding Agency priorities and interests.
- ◆ Participates with Project Team members in establishing requirements as necessary.
- ◆ Participates in appropriate reviews.
- ◆ Receives and acts upon escalated non-compliance items.
- ◆ Assists in resolving delivery issues unresolvable at lower levels.
- ◆ Ensures that business problems/issues are appropriately escalated and resolved.

PREVIOUS PROJECT ASSIGNMENTS

- ◆ Kansas Dept of Wildlife and Parks
- ◆ North Carolina Ports Authority
- ◆ Edgefield County Sheriff's Office
- ◆ Chattahoochee Police Department
- ◆ Cayce Police Department
- ◆ Jackson County Detention Center
- ◆ Midlands Technical College
- ◆ Clinch County Sheriff's Office/ TRI-County
- ◆ Hinesville Police Department
- ◆ ..and more

EDUCATION

- ◆ Coastline College – Associate's Degree Healthcare Administration
- ◆ University of West Florida – Bachelor of Arts, Magna Cum Laude
- ◆ University of West Florida –Master of Arts, Historical Archeology

Chris Gray

Database Administrator, SmartCOP

Summary of Qualifications

Chris has been with SmartCOP since 2005 and held many different positions within the company, starting as a Support Specialist providing customer support, progressing to a Systems Analyst, then Customer Support Manager, and currently a Database Administrator. Chris is responsible for database sizing and setup; he deploys AWS GovCloud Hosting environment with Disaster Recovery. He develops and maintains database objects. Additionally, he develops interfaces from SQL Server to other external data sources, performs database tuning to improve application efficiency and performance, maintain database backup and disaster recovery plans.

PREVIOUS ROLES

Systems Analyst, SmartCOP

- ◆ Perform initial setup and configuration of software products for public safety agencies.
- ◆ Perform setup of Windows Server operating system and Microsoft SQL Server for use in production environments.
- ◆ Assist with on-site go-live efforts, initial user training, and setting up peripheral devices for new customers.
- ◆ Provide on-site and remote implementation of product updates.
- ◆ Provide top-tier support for software products, servers, workstations, and mobile devices.
- ◆ Install server and network hardware for customers.
- ◆ Maintain standalone training environment, including servers and workstations, for use by customers during training exercises.
- ◆ Assist customers with network, SQL, and workstation issues related to SmartCOP applications
- ◆ Validate software releases from Company's R&D team before customer deployment.
- ◆ Other special projects based on Company needs.

Customer Support Manager, SmartCOP

- ◆ Manage day-to-day operations of the Company's end-user support desk.
- ◆ Interviewing and hiring support desk staff.
- ◆ Develop training materials and train support desk staff.
- ◆ Ensure customer needs are being met.

Chris Gray
850-429-0082
Chris.gray@smartcop.com

- ◆ Perform routine statistical analysis of support request metrics.
- ◆ All of the duties of the previously held Support Specialist position.

Support Specialist, SmartCOP

- ◆ Provide first-tier end user support for customers via phone and email.
- ◆ Provide Quality Assurance testing and documenting bugs for resolution by R&D team.

PROJECT RESPONSIBILITIES

- ◆ Coordinates Technical Team
- ◆ Coordinates / Performs site check
- ◆ Consults on network requirements
- ◆ Provides technical guidance for team.
- ◆ Configures and Manages AWS Cloud Servers for production, test/training, and disaster recovery servers.
- ◆ Signs-off on environment & configuration
- ◆ Provides technical input to change requests
- ◆ Available for project deliverables reviews.
- ◆ Participates in work product reviews.
- ◆ Prepares, implements, and manages JMS database
- ◆ Responsible for application software installation
- ◆ Develops and maintains database objects (i.e., stored procedures, functions, views, triggers, etc.)
- ◆ Interface development and testing
- ◆ Data conversions

PREVIOUS PROJECTS

- ◆ Florida Highway Patrol/ Department of Environmental Protection
- ◆ Montana Department of Justice (Highway Patrol, Fish Wildlife and Parks, Motor Kansas Highway Patrol
- ◆ South Carolina Highway Patrol
- ◆ Colorado Parks and Wildlife Enforcement
- ◆ Tennessee Wildlife Resources Agency
- ◆ Georgia Highway Patrol
- ◆ Cayce Police Department
- ◆ Crestview Police Department
- ◆ ...and many more

EDUCATION AND TRAINING

- ◆ Florida State University – M.S., Information Technology
- ◆ University of West Florida – B.A., Communication Arts
- ◆ Indian River Community College – A. A, General Studies

Vicki Floyd

Training Manager, SmartCOP

Summary of Qualifications

After 30 years of experience at the Santa Rosa County Sheriff's Office, Vicki joined SmartCOP as Lead Training Consultant. Since 2003, she has trained new users on the SmartCOP software system. Vicki utilizes her vast knowledge of the SmartCOP system to ensure that clients are ready to use the solution on day one. Her many years of supervisory experience in the industry have provided her with an in-depth understanding of law enforcement operations and a unique approach to training our clients, now having completed over 100 training installations.

PREVIOUS ROLES

- ◆ Implementation /Project Manager, SmartCOP
Provided oversight throughout the project on details related to staging the system, communicating with clients and stakeholders, delivering systems and equipment to site and overseeing installation and cut-over. Providing documentation and planning services on projects according to current PMI standards.
- ◆ Lead Training Consultant, SmartCOP
Provides in-depth training to administrators, trainers, and end-users of the SmartCOP system, including onsite customer support and problem resolution services related to training and education. Works with Project Managers to ensure training is delivered on time and meets customer satisfaction expectations.
- ◆ Santa Rosa County Sheriff's Office

PROJECT RESPONSIBILITIES

- ◆ Provides input for system requirements and communication as requested.
- ◆ Reviews training plan to ensure it aligns with agency's goals.
- ◆ Participates in User Trainings.
- ◆ Provides support to the Project Manager during the Business Process Review & Gap Analysis.

Vicki Floyd
850-429-0082
Vicki.floyd@smatcop.com

PREVIOUS PROJECT ASSIGNMENTS

- ◆ Sumter County Sheriff's Office
- ◆ Monroe County Sheriff's Office
- ◆ Sumter County Sheriff's Office
- ◆ Colorado Parks and Wildlife Enforcement
- ◆ Florida Highway Patrol/Department of Environmental Protection
- ◆ Santa Rosa County Sheriff's
- ◆ Alachua County Sheriff's Office
- ◆ Gulf County Sheriff's Office
- ◆ Suwannee County Sheriff's Office
- ◆ Gilchrist County Sheriff's Office
- ◆ Columbia County Sheriff's Office
- ◆ And many more....

EDUCATION AND TRAINING

- ◆ FCIC/NCIC Certified Operator
- ◆ Limited Access Instructor Course
- ◆ IPTM Supervisor and Management of Communications Center
- ◆ IPTM Field Training and Evaluation Program
- ◆ Florida State University Public Records Management Course
- ◆ University of Delaware - Public Safety Radio Dispatchers Seminar
- ◆ Millersville University - Supervisory Principles



8. PROJECT MANAGEMENT METHODOLOGY

Overview

SmartCOP's project methodology focuses on utilizing defined industry and program management best practices. We have extensive experience in implementing our solutions into complex public safety agencies. In addition, each project is managed and implemented by highly qualified SmartCOP employees.

SmartCOP methods are process-based and activity-based and include key roles based on the Project Management Body of Knowledge (PMBOK) and the System Development Life Cycle (SDLC).

SmartCOP is experienced at implementing our public safety solutions in large state agencies and we have found our approach has been successful in any size agency we work with. For every implementation, a **Statement of Work** is created defining the work activities, deliverables, roles, and responsibilities along with the timeline of the project. The Statement of Work will be reviewed and approved by both SmartCOP, and the Agency project teams before any work commences.

SmartCOP sticks to a strict project timeline for each project, to ensure the project is completed on-time and on-budget. The project timeline will be reviewed and approved by WVDOT.

Project Management Tools

With our extensive project management tools, processes, and technologies, we control each facet of the implementation carefully. Each project is managed with:

❖ Project Management oversight

- Single Point of Contact
- Provides project oversight
- Handles issues and risk escalation
- Facilitates project escalations, as needed
- Assures project completion

❖ Extensive Project Planning (by the PM)

The SmartCOP Project Team will work closely with WVDOT to provide the necessary Project Plans. Each project plan will require review and sign-off from the agency. Here are a list of Project Plans, and tools used, that can be developed during the initial planning phase.

- Statement of Work – created in Microsoft Word and will provide detailed scope and deliverables, project roles, and responsibilities for the deliverables.
- Project Plan will be created and managed in Microsoft Project/or MS Excel. The project plan will detail tasks, ownership, timeline, milestones, etc.
 - ✓ Tracks all Phases and Tasks
 - ✓ Tracks milestones and durations
 - ✓ Documents personnel assignment and task ownership
- Requirements Traceability Matrix (RTM) – The PM will use the SmartCOP completed Attachment A- Requirements worksheet to create an RTM in excel that document and track each functionality requirement from testing to implementation and go-live.
- Project Communication Plan
 - Microsoft Teams -used as remote meeting tools for weekly/bi-weekly project status meeting with the agency.
 - Status Reports – provided to agency after each project meeting to provide meeting minutes and project status. Status Reports are normally delivered by email to the



agency project team.

- Interface Plan
- Data Conversion Plan
- Acceptance, Functional, Reliability Testing Plan
- Training/Knowledge Transfer Plan
- Go-Live Deployment Plan
- Stakeholder engagement Plan
- ❖ **Issue Log and Resolution Tracking**
 - Action Item Register - analyzes & identifies project risks in Microsoft Excel
 - Formal tool for opening, assigning, tracking, and closing issues
- ❖ **Change Management Plan**
 - Formal process for requesting changes
 - Requires approvals and signoff
 - Documents material changes to solution, timeline, and project scope

All changes that occur throughout the project will be managed through SmartCOP's Change Control Process. The SmartCOP Project Manager will document all requested changes and evaluate associated impacts to the project's scope, schedule, and cost. Both parties will have a joint meeting to discuss the change. Upon agreement, the Change Order will be approved by both parties, and the change will become part of the project. If agreement by both parties does not occur, the change will be dismissed.

All changes are:

- Documented and given a control number
 - Evaluated to determine associated impacts to the project's scope, schedule, and cost
 - Change is either accepted or rejected based upon mutual agreement
 - Accepted changes are annotated on a Change Order which is jointly agreed to in writing between SmartCOP and [Agency] prior to the change taking place
 - Change is incorporated into project plan and executed
- ❖ **Risk Management Plan**
 - The Project Manager will keep an Action Item Register to track all project issues and ownership. The register will be managed in Microsoft Excel. SmartCOP will work closely with the County to tailor this methodology for your unique requirements.

As previously detailed, SmartCOP will assign a **Project Manager (PM)** to serve as the single point of contact for managing the successful implementation of this project. The Project Manager is accountable to SmartCOP's Executive Oversight. The PM reports biweekly project status, accomplishments, obstacles, and items requiring assistance to the Director of Professional Services. Monthly reporting occurs by both the Project Manager and Director of Professional Services to SmartCOP's Executive Vice President to ensure the project stays on schedule.

We highly recommend WVDOT assign a point of contact (**Project Champion**) who is knowledgeable in law enforcement as well as the agency's business rules and workflow. **In our past experience, a Project Champion is a key ingredient to the project's success.** Secondly, we recommend WVDOT assign an **Information Technology Champion** to serve as the technical contact / liaison for the duration of the project. Again, based on past experience, we have found these two can handle the majority, if not all, of the necessary agency tasks required for the project. In the event that either champion needs assistance, they have the ability and authority to delegate in the agency accordingly.



Deliverables not Completed by Initial Go-Live

SmartCOP's goal is to have all deliverables completed and tested by the initial go live. However, there are times when this may not be possible without delaying the go-live date. WVDOT will decide how they wish to proceed, should there be a risk to the project timeline.

Factors that can create a delay are usually due to no fault of SmartCOP and include:

- Interfaces. If interface development relies on assistance of the 3rd party vendor (as is the case with bi-directional interfaces) delays can occur, based on their availability. WVDOT will have the choice to stick to the timeline and go-live without the interface or extend the timeline until the interface can be completed.
- Data Conversion. Data conversions are usually completed within the project timeline, as long as SmartCOP can receive the data files in a supported format in the time agreed too. If the legacy vendor has to be involved to extract the data from the legacy system, this can create delays in meeting the project timeline. It is our goal to have all data converted and tested prior to Go-Live. Sometimes agencies request a "catch-up conversion" be performed to capture all the data that was entered between the "cut-off" date and the "go-live." The SmartCOP Project Manager can discuss this further with the WVDOT project team.
- Customization. SmartCOP provides a COTS solution, however, should WVDOT require any custom development (outside of interfaces), we will work to fit this into the existing project timeline. However, if development is extensive, it will extend the project timeline, WVDOT can make the decision to deliver after go-live, if so desired.

9. TECHNICAL TRAINING AND KNOWLEDGE TRANSFER

SmartCOP utilizes several methods of knowledge transfer to ensure our agencies are armed with the appropriate knowledge, skills, and information to successfully use our solutions. These methods include hands-on training on a system configured for WVDOT, go-live support, training manuals, user operator manuals, support bulletins, release notes, and refresher training.

Training Methodology

Professional training is one of the largest contributors to successful implementation. An effective and accurate training plan ensures that your staff will have all the tools they need to be successful with the new solution. SmartCOP provides comprehensive training for law enforcement and public safety agencies to ensure a successful implementation.

SmartCOP provides interactive, hands-on training to educate system users, system administrators, and maintenance personnel for our software suite. SmartCOP provides all instructional materials, presentation media, and course instructors.

Each Lead Trainer is an experienced law enforcement instructor and current user of the specific software product and is responsible for the effectiveness and administration of the training. Each trainer's experience as a daily end-user of the SmartCOP system in their respective agency allows them to provide real-world expertise in the classroom.

Prior to Go-Live, we recommend each end-user and administrator undergo comprehensive, hands-on training for each software application they will use or administer. We will work with your team throughout the training process to refine, enhance or modify proposed training in order to meet the agency's needs within the parameters of the contract.

To minimize interference with work schedules, SmartCOP provides on-site training utilizing the agency training facility. This simplifies training for all employees and eliminates their need for travel while offering flexibility to accommodate shift schedules.

Agencies are encouraged to provide a computer lab environment that will accommodate 10 to 25 students. The computer lab environment allows students to experience hands-on learning for the hardware and data specific to their agency. Live, hands-on learning enhances the implementation process.

Types of Training

System Administrator Training	Train-the-Trainer	End User Training	Refresher Training
<ul style="list-style-type: none"> • System Maintenance Utilities • Security Concepts • Hardware operation and Backup Procedures • System features and configuration • Failure Mode Procedures 	<ul style="list-style-type: none"> • Optional • Subject Matter Experts • Train Others • Maximize Effectiveness 	<ul style="list-style-type: none"> • Hands-on • End user application training • Integration with other applications • User configurable settings and preferences • Go-Live Support 	<ul style="list-style-type: none"> • Optional • Follow-up with advanced features • Web conference training



System Administrator training includes the following:

This training provides system administrators the information needed to configure the SmartCOP system, setting up and maintaining code tables, security concepts, managing users, granting user access privileges, backup procedures, and failure mode procedures. This training is limited to no more than ten (10) participants.

- Administrator training on system maintenance utilities, hardware operation, security concepts, system features, backup procedures, and failure mode procedures
- Application software features and integration with other applications
- System operation recovery
- Backup creation and maintenance

End User Training

SmartCOP provides onsite end-user training classes in an agency provided classroom for up to 25 people. End-user training prepares users for the new software system and is relevant to each user's position. Training will consist of hands-on training on installed SmartCOP applications for each employee based on their role within the agency. **Training is completed on an agency training system that has been configured specifically for the agency to enhance the learning experience and retention.** The training will include the following:

- Functional user training on each application
- Operational training on system orientation and familiarization
- Application software features and integration with other applications
- User configurable settings and preferences

Train-the-Trainer

The train-the-trainer format is conducted for a small, selected group of users, and many times these trainers are agency-certified. This training is more in-depth than end-user training so that your trainers will be prepared to conduct training and assist others once the system is live. SmartCOP recommends using a Train-the-Trainer approach for the phased implementation and training field officers around the state.

After the initial pilot, agency trainers will conduct training with LE agencies around the state on the use of SmartCOP's Crash Reporting and e-Citation Solutions, as they come onto the system. In our cost proposal, we have priced for train-the-trainer training sessions.

Video Based Training

SmartCOP will provide video-based (how to) training videos as a supplement to classroom training that can be used to train new users/agencies and for refresher training. SmartCOP will record the live training sessions that are conducted at WVDOT training facilities.

Refresher Training

SmartCOP provides continued training and training assistance to agencies after implementation. Optional training sessions may be structured at fixed periods after implementation; for instance, "refresher" or "expert" training 90-days after initial Go Live. This optional refresher training is an abbreviated instruction covering functionality and user commands to enable the user to become comfortable using the new system. Refresher training is normally provided via a web conference with our client success team.

Expert (advanced) user training is also available for those users ready to take their software knowledge to the next level. It provides more detailed functionality and system capability.



SmartCOP also provides release bulletins that define changes or enhancements to the affected products. We offer online web-based training and additional on-site user training for advanced product functionality. Additional training must be mutually agreed upon and is based on pre-defined or negotiated contractual obligations.

Training Class Description

Each user training session consists of one Lead Trainer and assistant trainers based on the required student/trainer ratio. During those training sessions, the trainers utilize real-life experiences and scenarios in order to enhance the training experience.

A Certificate of Completion will be awarded upon successful completion of each training class. The Training Module in SmartADMIN tracks and records information about employee training, educational background, certification, and experience. Training records are maintained to ensure agency employees remain current in their training requirements. The Training module can generate lists of all personnel that are nearing their re-certification dates.

Typically, end-user training times are:

- 911 Communications/Dispatchers – 8 hours (1 day)
- Patrol Officer – 4 hours (1/2 day)
- Records Clerk/Investigators – 8 hours (1 day)
- Corrections Officer – 8 hours (1 day)
- System Administrator – 4 hours (1/2 day)

Multiple training sessions are scheduled to accommodate shift schedules. **SmartCOP will work with your team throughout the training process to refine, enhance or modify proposed training in order to meet the agency's needs within the parameters of the contract.**

SmartCOP is committed to providing continued training and training assistance to customer agencies after implementation. To accomplish this, SmartCOP will provide product release bulletins or training bulletins that define changes or enhancements to the affected products. Additionally, help files are updated with each software release and contain all the latest enhancements and features.

All SmartCOP training classes emphasize hands-on learning in a classroom setting.

Core application training will be conducted from a training server configured for WVDOT.

With the exception of the System Administrator training, each class can accommodate from 10 to 25 participants.

It is recommended that no more than 10 students attend the System Administrator class.

Software user manuals will be provided, in digital format, to the customer agency prior to training for printing and class distribution.

Attendees will be required to sign in at the beginning of each class to verify attendance.

- Trainers will conduct training in three parts:
 1. Interactive demonstration and lecture as the student follows along.
 2. Discussion and case studies.

*Training will
be conducted
on a system
that is
specifically
configured
for
WVDOT*

3. Scenario-based practicum, requiring the student to successfully demonstrate software functionality.
- Successful completion of the scenario-based practicum will be documented by the trainers for each student to show successful completion of training.
 - Classes will be 50-minute segments with a 10-minute break unless another format is requested by the agency.
 - Course critiques will be provided to each student at the end of the training course in order to receive feedback from students. These critiques will be utilized to improve instruction for future classes and validate current training techniques.

Training Material

Training materials that are available for SmartCOP's software products include a combination of PowerPoint presentations and PDF files. Additionally, we provide a checklist document for the software products agency personnel are trained on prior to Go Live.

SmartCOP will provide training materials and user manuals. Additionally, the SmartCOP Support Portal contains a large library of information available to the County.

SmartCOP will provide training material that is tailored to WVDOT, and the specific configuration, requirements, and functionality required.

Material provided during implementation is typically both electronic and hard copy. Material through the SmartCOP Support Portal is electronic.

Test Database

SmartCOP will provide a training system that utilizes the agency's data. The training system operates stand-alone and mirrors the live system. It can be utilized to test configuration changes before implementation as well as provide a place for users to practice and train on system features and functions.

Online Training

The private user's area on our website, www.smartcop.com, includes additional interactive forums, greater access to training videos, information about upcoming releases, and the ability to download technical and user documentation. This area is available only to SmartCOP customers.

Training After Implementation

SmartCOP provides continued training and training assistance to agencies after implementation. To accomplish this, SmartCOP will provide product release bulletins or training bulletins that define changes or enhancements to the affected products. Additionally, help files are updated with each software release and contain all the latest enhancements and features. We can also structure optional training sessions at fixed periods after implementation; for instance, "refresher" or "expert" training 90-days after initial Go-Live.

Expert (advanced) user training is also available for those users ready to take their software knowledge to the next level. It provides more detailed functionality and system capability.

Web Conferencing Training

SmartCOP will schedule Web Conferencing Training (Webinars) through the Project Manager at the agency's request. Refresh Training is also available, upon request.



Training Plan – Pilot Phase

The following Training Plan details the type of onsite classes and go-live support SmartCOP has included in our Cost Proposal. If the agency feels they need additional training, beyond these needs, we will be happy to discuss further.

Phase I – Pilot - Training Plan					
Training Class/Description	Recommended Number of Participants	Location	Personnel Expected to Attend Training	Number of classes/ Days	Hours
Train-the-Trainer Sessions w/ CCMS components	10 Max per Class	Onsite - Classroom	Agency training staff	5 classes	8 hours/class
Field Based Reporting - Train-the-Trainer	10 Max per class	Onsite - Classroom	Agency field training staff	8 classes	6 hours/class
CCMS – Supervisor Training	10 Max per class	Onsite - Classroom	Agency supervisors	5 classes	4 hours/class
One-on-One Mobile Administrator Training	Determined by agency	Onsite	Mobile Administrators	6 classes	4 hours/class
ESRI/GIS Map Package Consultation (Location Referencing System)	1-5 max	Onsite	ESRI or LRS agency administrator	n/a	n/a
SmartADMIN Module – User Training	10 Max Per Class	Onsite - Classroom	System Administration Staff	3 classes	4 hours/class
Analytics & Reporting Training	10 Max per class	Onsite - Classroom	Agency supervisors	3 classes	4 hours/class
SmartADMIN One-on-One Administrator training	n/a	Onsite	System Administrator	1 class	4 hours/class
Go-Live On-site Support	n/a	Onsite			6 Days



10. SMARTCOP CUSTOMER REFERENCES

1. Florida Highway Patrol

Agencies include:	Highway Patrol, Commercial Vehicle Enforcement, Capital Police, Fish & Wildlife Conservation, State Fire Marshalls, Office of Agriculture Law Enforcement, Lottery, and Department of Environmental Protection.
Address	2900 Apalachee Parkway, Tallahassee, FL 32399
Contact	Joel Slanco
Phone:	850-617-2463
Email Address:	joelslanco@flhsmv.gov
Solutions Used	Computer Aided Dispatch, Mobile Data System, Field Based Reporting with eCitation and eCrash reporting, Records Management System, Analytics and Reporting.
Size	5,000+ Users with 3,001 sworn officers

Project Details

FHP has been a customer of SmartCOP since 2003.

SmartCOP has won 2 additional competitive bids with FHP following a competitive RFP process. In 2023, SmartCOP contracted with the State of Florida Highway Patrol to provide a consolidated Statewide CAD system with AVL mapping system. SmartCOP also provided FHP with hosting services at a SmartCOP data center with Disaster Recovery in the Cloud for redundancy. SmartCOP's integrated public safety solutions is the preferred vendor for the State of Florida.

SmartCOP has provided the State with its very first electronic: Single consolidated CAD with AVL and Mapping system; Officer Activity Reporting and Tracking System; Traffic Crash w/ Integrated Evidence Submission; Uniform Traffic Citation; Radar & Equipment Log; Traffic Stop Data Report; DUI Citation; Traffic Warning; Resource Citation; FIBRS/NIBRS Incident Report w/ Integrated Evidence Submission, and many more reports. SmartCOP is a true partner with FHP. A major component of that partnership includes continually adjusting to the evolving requirements and needs of the Department.

Field Based Reporting -SmartCOP provided FHP with a Field Based Reporting system that combined all the forms for the State of Florida into a single software solution to meet the needs of the State. Outcomes includes: **the ability to work on any report or form offline**; the ability to manage configurations of the 67 Florida Counties; the unique Boating, Traffic and Resource violations; local/regional configurations and state level configurations; the ability to easily manage and audit issued numbers with no loss or errors; the ability to configure a validation component to ensure data integrity for each form or report. This new system proved to be integral in allowing the consolidation of the FDOT MCCO into the FHP CVE, and the expansion of technologies at the officer report/form level to be completed successfully.

RMS: SmartCOP continually provides the State of Florida with new enhancements and products as they are developed. Examples of this development includes SmartCOP's delivery and implementation of a statewide Evidence system that greatly reduced officer reporting time, a Commercial Citation Payment System that resulted in a real time HotList, and Activity Reporting that improved data collection while greatly reducing officer administrative reporting time.



SmartCOP provided the State of Florida with its very first electronic:

- Statewide CAD System,
- Traffic Crash Report
- E-Citation (Including traffic and DUI)
- Citizen Demographic Report
- Commercial Vehicle Enforcement Citation
- Incident Report
- Boat Accident Report
- Boating Citation
- Booking/Arrest Report

FHP writes hundreds of thousands of eCrash and eCitation reports each year.



2. Georgia Department of Public Safety

Agencies include:	Highway Patrol, Motor Carrier Enforcement, Capital Police, Department of Natural Resources, Department of Agriculture and Forestry Commission.
Address	600 West Peachtree St, Atlanta, GA. 30308
Contact	Capt. Brian Screws Ph: 404-430-8354 bscrews@gsp.net
Solutions Used	Computer Aided Dispatch, Mobile Data System, Field Based Reporting with eCitation and eCrash reporting, Records Management System, Analytics and Reporting.
Size	2,000 sworn officers/state troopers, 2,500 mobile users
Description	<p>In 2008 Georgia State Patrol selected SmartCOP to provide a CAD, RMS, FBR and Mobile system for their Patrol. In 2017 and in 2022, the contracts were renewed for another 10 years.</p> <p>CAD/Mobile Solution: A completely electronic dispatch solution for nine (9) statewide communication centers that allows GSP to dispatch 2,000 users. The solution provides GSP with the ability to monitor each of the 9 regional areas. Troopers can self-dispatch across each region as they travel across the state. The solution provides dispatch with the ability to monitor each region to include the use of ESRI mapping and AVL for visibility of CAD call and unit locations.</p> <p>SmartCOP provided the State of Georgia with its very first electronic public safety solution:</p> <p>CAD system – Georgia Department of Public Safety (DPS) previously used a paper-based dispatch system. SmartCOP transitioned nine (9) statewide communication centers to a CAD system</p> <p>RMS / Field Based Reporting System - all reporting was previously paper based.</p> <p>SmartCOP provided the State of Georgia with its very first electronic public safety solution:</p> <p style="padding-left: 40px;">Traffic Crash Report Boating Citation Traffic Citation Resource Citations and Warnings Incident Report And many other more</p> <p style="padding-left: 40px;">Boat Accident Report (BARD)</p> <p>GA Department of Natural Resources (GA DNR) was completely paper based prior to SmartCOP implementation. The project allowed GA DNR to migrate to its very first electronic:</p>



	<p>Hunting Accident Report Incident Report Boating Accident Report And many other reports. Boating Citation</p> <p>GDPS writes over 50,000 crash reports and 150,000 citations each year.</p>
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3. State of Montana / Montana State Patrol

Agencies include:	Statewide Crash Reporting, Highway Patrol, Department of Transportation, Fish, Wildlife & Parks
Address	303 N. Roberts, Helena, MT. 59620-1405
Contact	Chan Barry Ph: 406-444-3954 Email: CBarry2@mt.gov
Solutions Used	Computer Aided Dispatch, Mobile Data System, Field Based Reporting with eCitation and eCrash reporting, Records Management System, Analytics and Reporting, and Mobile Driver's License (mDL).
Size	600 sworn officers across all agencies, 400 mobile users
Description	<p>In 2007, Montana Highway Patrol selected SmartCOP to provide a CAD, RMS, and Mobile system for the Patrol. The MHP has approximately 235 troopers that patrol 147 thousand square miles of Big Sky Country. The original implementation in 2007 included a statewide CAD, and Mobile Computer Terminals for 400+ users. By 2009, the full RMS and Field Based Reporting modules were implemented providing the full CAD, RMS, and Mobile solution for the patrol. Additional projects provided web-based traffic crash as well as onboarding Montana DOT, Dept of Fish, Wildlife, & Parks.</p> <p>The State of Montana was the first state in the country to achieve a 100% MMUCC compliant traffic crash report. The Montana solution is deployed from a single data center instance supporting all statewide CAD, RMS, and Mobile connectivity needs.</p> <p>In 2012 a statewide crash reporting solution was deployed for use by all local agencies. Those agencies that have their own record management system can transmit their reports to the state repository.</p> <p>In 2025, Montana implemented SmartCOP's Mobile Driver's License solution which allows troopers to use their iPhones to capture mobile driver's license information and populate crash and citation reports.</p> <p>Outcomes</p> <p>SmartCOP was successful in delivering the MHP project on-time, within scope and on-budget. Successful outcomes include delivering a CAD system that is in use by 4 different state agencies; delivering an integrated RMS/FBR for MHP with the first electronic citation; a new crash report system; a means of capturing trooper activity electronically. MHP project was a success that then led to 3 other state agencies implementing the system.</p> <p>SmartCOP provided the State of Montana with its very first electronic:</p>



	Traffic Crash Report (For all agencies in state) Incident Report E-Citation (Notice to Appear) Activity Reporting	Boating Accident Report (meets all BARD standards) Boating Citations and Warnings Resource Citations and Warning
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I. Exceptions to West Virginia RFP, General Terms and Conditions, Cloud Addendum

EXCEPTIONS AND CLARIFICATIONS: The Solicitation contains the specifications that shall form the basis of a contractual agreement. Vendor shall clearly mark any exceptions, clarifications, or other proposed modifications in its bid. Exceptions to, clarifications of, or modifications of a requirement or term and condition of the Solicitation may result in bid disqualification.

Exception Response

Proposer reserves the right to negotiate modifications to the terms in the below mentioned sections of the RFP. Modifications will be mutually acceptable and agreed to by all parties to the contract. Proposer notes the following sections of the RFP as particular areas of concern/exception:

1. Section 22. Exceptions and Clarifications

Exception: Proposer wishes to clarify that Proposer's submission of a proposal and signature of RFP documents shall constitute acceptance of, and intent to comply with, all of the RFP's terms, conditions, requirements, and instructions subject to Proposer's exceptions and required modifications. Proposer expects that any contract resulting from this RFP process will be duly negotiated.

General Terms and Conditions

2. Section 1. Contractual Agreement,

Exception: As stated above, Proposer expects that any contract resulting from this RFP process will be duly negotiated. Proposer takes exception to Proposer's signature on its bid signifying Proposer's agreement to be bound by and accept the terms and conditions of the sample Contract.

3. Section 6. Emergency Purchases

Exception: Proposer reserves the right to further discuss and negotiate this section with Customer.

4. Section 8. Insurance

Exception: Proposer reserves the right to further discuss and negotiate with Customer. The limits of insurance are arranged by our parent company, Constellation Software Inc., for the benefit of its various entities and subsidiaries. Proposer is willing to review the insurance requirements of the resulting contract; however, coverage should be limited as agreed upon by the parties. Proposer will provide a copy of its Certificate of Insurance upon award and upon contract signing. Any certificate of insurance shall state the insurer shall endeavour to give Customer at least 30 days written notice prior to any cancellation of the policy. Proposer clarifies that it will provide notice pursuant to standard market practices and it reserves the right to negotiate mutually agreeable terms with Customer.

Further, while Proposer possesses the requested policies and applicable limits, Proposer reserves the right to consult its insurance broker to ensure it can comply with specific insurance requirements.

5. Section 10. Venue

Exception: Proposer requests that in the event of a dispute, the venue of any actions would be federal courts given the nature and subject matter of the contract, and if subject matter jurisdiction is lacking, the venue should be in state courts for the indicated jurisdiction.

6. Section 11. Liquidated Damages

Exception: Proposer takes exception to section 11 and requests its deletion. Proposer's standard policy is that it does not agree to liquidated damages of any nature or penalties akin to liquidated damages, as it is



Proposer's experience that there are many variables beyond Proposer's control that could impact the timing of delivery/performance (such as availability of Customer officials, internal Customer procedures, etc.).

7. Section 12. Acceptance

Exception: Proposer takes exception to section 12. As stated above, Proposer expects that any contract resulting from this RFP process will be duly negotiated. Proposer takes exception to Proposer's signature on its bid signifying Proposer's agreement to be bound by and accept the terms and conditions of the sample Contract. Proposer's submission of a proposal and signature of RFP documents shall constitute acceptance of, and intent to comply with, all of the RFP's terms, conditions, requirements, and instructions subject to Proposer's exceptions and required modifications.

8. Section 13. Pricing

Exception: Proposer reserves the right to further discuss and negotiate this section with Customer.

9. Section 18. Funding

Exception: Proposer requests no less than ninety (90) days notice of termination for non-appropriation of funds.

10. Section 19. Cancellation

Exception: Proposer reserves the right to negotiate this clause to effect a reasonable standard to the determination as to whether the Proposer is in breach of the contract. Also, Proposer should be permitted a reasonable period of time to cure a breach (minimum of 30 days).

11. Section 20. Time

Exception: Proposer generally objects to "time is of the essence" clauses – standard termination rights with a cure period should apply and unforeseen delays can be dealt with via a change order process.

12. Section 27. Assignment

Exception: Proposer's standard policy is it agrees it will not assign, sell or transfer the contract without the prior written consent of Customer, which consent Customer shall not unreasonably withhold, except that Proposer may assign its interest in this Agreement in connection with a merger or other business combination in which Proposer is not the surviving entity, so long as the assignee agrees to fully abide by and accept all provisions under the Agreement.

13. Section 28. Warranty

Exception: Proposer reserves the right to negotiate any warranties related to software and implementation services in any resulting agreement(s) from this RFP process. Proposer's standard warranty is that the services will be performed in a professional and diligent manner by personnel who are competent in performing their individual tasks and that the software will substantially perform as described in the software documentation for a period of ninety (90) days from Completion of Services if the software is used in accordance with the documentation (which for the purposes of the warranty, includes the Functional Requirements as stated in the Statement of Work), the terms of this applicable license agreement. To the maximum extent permitted by law, Proposer specifically disclaims all implied warranties, including any warranties of merchantability or fitness for a particular purpose; that the Customer's use of the services and software will be uninterrupted or error-free; nor that the services, software, documentation and/or the information obtained by the Customer through the services, software and/or documentation will meet the Customer's requirements.



14. Section 30. Privacy, Security, and Confidentiality

Exception: Proposer reserves the right to further discuss and negotiate this section with Customer.

15. Section 31. Your Submission is a Public Document

Exception: Proposer requests notification of any requests for public disclosure of any of Proposer's proposals, responses, inquiries or correspondence related to this RFP prior to the Customer making said disclosure. Proposer further requests that any trade secrets, confidential or proprietary information of Proposer's not be disclosed, unless requested under court order, including but not limited to Proposer's software, know-how and implementation procedures.

16. Section 35. Vendor Relationship

Exception: Proposer takes exception to the indemnity contained in the second paragraph of section 35 and requests the deletion of that paragraph in its entirety.

17. Section 36. Indemnification

Exception: Proposer takes exception to the broad-based nature of the indemnity contained in section 36 and reserves the right to further discuss and negotiate any indemnity with Customer. Proposer's standard policy is to agree to defend the Customer against any third-party lawsuit arising out of injuries to persons, death, and damage to tangible property arising from the gross negligence or willful misconduct of Proposer and its employees, agents or independent contractors while on the customer's premises and Proposer will pay costs and damages that a court finally awards in such suit or that are agreed upon in settlement thereof. If the Customer or any third party has caused or contributed to a third-party claim, then Proposer will only indemnify the Customer up to the amount Proposer is deemed responsible. To the extent permitted by law, such obligation is conditioned upon mutual indemnification from the Customer. Each party's obligation in this regard is also contingent upon the other party cooperating in the defense of such lawsuit and allowing the party defending such lawsuit to settle any claim if the settlement does not admit liability, restrict use of the licensed/purchased items or require monetary payment from the protected party. In no event shall Proposer, or its supplier's, aggregate liability to the Customer for damages of any nature exceed, in the aggregate, i) the services fees paid by the Customer to Proposer pursuant to the relevant Statement of Work; ii) the license fees paid by the Customer pursuant to this agreement, and iii) the amount of support and maintenance fees actually paid by the Customer to Proposer under this agreement during the then-current term (which shall in no event be greater than twelve (12) months) of the agreement up to an including the date of termination.

18. Certification and Signature

Exception: As stated above, Proposer expects that any contract resulting from this RFP process will be duly negotiated. Proposer takes exception to Proposer's signature on its bid signifying Proposer's agreement to be bound by and accept the terms and conditions of the sample Contract. Proposer's submission of a proposal and signature of RFP documents shall constitute acceptance of, and intent to comply with, all of the RFP's terms, conditions, requirements, and instructions subject to Proposer's exceptions and required modifications.

19. General Exception

Exception: As a general note, Proposer anticipates that the resultant agreement shall be based on Proposer's and industry norm standard agreements for software licensing and maintenance or SaaS agreements, as applicable, and that the resultant agreement between the Proposer and Customer should include provisions typically seen in these types of software agreements, including: appropriate licensing terms, limitation of liability (which will be at one (1) times the contract value, will apply to indemnities, and



shall not include damages related to indirect, consequential, special or aggravated), warranty (as per the restrictions above), license use and restrictions (such as copying restrictions, User restrictions and reverse engineering type restrictions), mutually acceptable acceptance terms, payment terms (including the use of milestones for payment and license fees paid up front), maintenance terms, approved Statements of Work, and other provisions typical in software license/support/service and SaaS agreements and that the absence of any clauses in Customer's RFP will not affect Proposer's ability to negotiate such clauses and to make necessary modifications to include such clauses.

Attachment D State of West Virginia Cloud Addendum/ Software as a Service Addendum

Proposer reserves the right to further discuss and negotiate the terms of the Software as a Service Addendum.

20. Section 1. Definitions, 'Data Breach' & 'Security Incident'

Exception: Proposer takes exception to the inclusion of "suspected" incidents or events where the provider "reasonably believes" a breach occurred within the definition of reportable events. To avoid false positives and unnecessary escalation, Proposer provides notification only in respect of confirmed Security Incidents and Data Breaches. The definitions and reporting obligations must be updated to reflect "confirmed" status rather than "reasonable belief."

21. Section 2. Data Ownership

Exception: With respect to the first sentence of Section 2, Proposer clarifies that it does not grant any ownership rights to Customer in respect of its intellectual property, including in its software and documentation. In accordance with industry standard software licensing agreements, Proposer would grant Customer a limited right to use its proprietary software, or in the case of a SaaS solution, a limited right to access and use the hosted software and associated services. Except for those items that are explicitly detailed in the final contract to vest to Customer, Proposer maintains ownership of all materials, whether developed prior to, during or after the contract with Customer. Proposer clarifies that Customer will maintain ownership of all customer data provided under the contract and the reports generated regarding such data.

22. Section 3. Data Protection and Privacy

Exception: Proposer reserves the right to further discuss and negotiate this section with Customer. Proposer takes exception to the warranty contained in subsection (b), and requests that such obligation be in the form of a covenant.

23. Section 4. Security Incident or Data Breach Notification

Exception: Proposer reserves the right to further discuss and negotiate this section with Customer. Proposer requires a minimum of 72 hours following the confirmation of a Data Breach or Security Incident to provide notice to Customer.

24. Section 5. Breach Responsibilities

Exception: Proposer reserves the right to further discuss and negotiate this section with Customer. As stated above, Proposer requires a minimum of 72 hours following the confirmation of a Data Breach or Security Incident to provide notice to Customer.

Proposer takes exception to subsection (e) and reserves the right to further discuss and negotiate Customer's requirements regarding costs.

25. Section 7. Termination and Suspension of Service



Exception: Proposer reserves the right to further discuss and negotiate this section with Customer. Post-termination assistance will be provided on a time and materials basis.

26. Section 10. Access to Security Logs and Reports

Exception: Proposer reserves the right to further discuss and negotiate this section with Customer. Proposer objects to the broad requirement to provide undefined security logs, as this may compromise the security and integrity of the multi-tenant SaaS environment. The specific scope, content, and format of such logs and reports shall be subject to the parties' mutual agreement and strictly limited to data exclusively pertaining to the Customer.

27. Section 13. Change Control and Advance Notice

Exception: Proposer takes exception to the section 13 requirement of providing 30 days' advance notice for any upgrade that may impact service availability and performance. Proposer can agree to provide reasonable advance notice only for material changes that significantly and negatively impact the Customer's use of the Services.

28. Section 19. Right to Remove Individuals

Exception: Proposer will collaborate to replace personnel promptly where practicable. At all times, Proposer intends to function as an independent contractor and therefore efforts to control Proposer's hiring decisions and assignment of its personnel must be kept at a minimum as to not be interpreted to create an employer/employee relationship between Customer and Proposer.

29. Section 21. Compliance with Accessibility Standards

Exception: Proposer reserves the right to further discuss and negotiate this section with Customer.

30. Section 23. Encryption of Data at Rest

Exception: Proposer reserves the right to further discuss and negotiate this section with Customer.

31. Section 24. Subscription Terms

Exception: Proposer reserves the right to further discuss and negotiate this section with Customer. In accordance with industry standard software licensing agreements, Proposer would grant Customer a limited right to use its proprietary software, or in the case of a SaaS solution, a limited right to access and use the hosted software and associated services.

32. Section 25. Equitable Relief

Exception: Proposer requests that this section be made mutual.



II. Section 6 – Evaluation and Award - Executed

REQUEST FOR PROPOSAL

West Virginia Department of Transportation CRFP DOT2600000002

SECTION 6: EVALUATION AND AWARD

- 6.1. Evaluation Process:** Proposals will be evaluated in two parts by a committee of three (3) or more individuals. The first evaluation will be of the technical proposal, and the second will be an evaluation of the cost proposal. The Vendor that demonstrates it meets all mandatory specifications, attains the minimum acceptable score, and achieves the highest overall point score shall be awarded the contract.
- 6.2. Evaluation Criteria:** Proposals will be evaluated based on criteria set forth in the solicitation and information contained in the proposals submitted in response to the solicitation. The technical evaluation will be based on the point allocations below, totaling 70 of the 100 points. Cost represents 30 of the 100 total points. The cost score will be determined based on the Vendor's proposed costs for operations and maintenance services.

Evaluation Point Allocation:

Project Goals and Proposed Approach (§ 4.2)

- Approach & Methodology to Goals/Objectives (§ 4.2.1) (15) Points Possible
- Approach & Methodology to Compliance with Mandatory Project Requirements (§ 4.2.2) (15) Points Possible
- Exceeding Mandatory Requirements through Expedited Statewide Implementation (§ 4.2.3.2) (5) Points Possible

Qualifications and experience (§ 4.3)

- Qualifications and Experience Generally (§ 4.3.1) (10) Points Possible
- Exceeding Mandatory Qualification/Experience Requirements (§ 4.3.2) (5) Points Possible

Oral interview, if applicable) (§ 4.4) (20) Points Possible

Total Technical Score: 70 Points Possible

Total Cost Score: 30 Points Possible

Total Proposal Score: 100 Points Possible

- 6.3. Technical Bid Opening:** At the technical bid opening, the Purchasing Division will open and announce the technical proposals received prior to the bid opening deadline. Once opened, the technical proposals will be provided to the Agency evaluation committee for technical evaluation.
- 6.4. Technical Evaluation:** The Agency evaluation committee will review the technical proposals, assign points where appropriate, and make a final written recommendation to the Purchasing Division.

REQUEST FOR PROPOSAL

West Virginia Department of Transportation CRFP DOT2600000002

6.5. Proposal Disqualification:

6.5.1. **Minimum Acceptable Score (“MAS”):** Vendors must score a minimum of 70% (49 points) of the total technical points possible in order to move past the technical evaluation and have their cost proposal evaluated. All vendor proposals not attaining the MAS will be disqualified.

6.5.2. **Failure to Meet Mandatory Requirement:** Vendors must meet or exceed all mandatory requirements in order to move past the technical evaluation and have their cost proposals evaluated. Proposals failing to meet one or more mandatory requirements of the RFP will be disqualified.

6.6. **Cost Bid Opening:** The Purchasing Division will schedule a date and time to publicly open and announce cost proposals after technical evaluation has been completed and the Purchasing Division has approved the technical recommendation of the evaluation committee. All cost bids received will be opened. Cost bids for disqualified proposals will be opened for record-keeping purposes only and will not be evaluated or considered. Once opened, the cost proposals will be provided to the Agency evaluation committee for cost evaluation.

The Purchasing Division reserves the right to disqualify a proposal based upon deficiencies in the technical proposal even after the cost evaluation.

6.7. **Cost Evaluation:** The Agency evaluation committee will review the cost proposals, assign points in accordance with the cost evaluation formula contained herein and make a final recommendation to the Purchasing Division.

Cost Evaluation Formula: Each cost proposal will have points assigned using the following formula for all Vendors not disqualified during the technical evaluation. The lowest cost of all proposals is divided by the cost of the proposal being evaluated to generate a cost score percentage. That percentage is then multiplied by the points attributable to the cost proposal to determine the number of points allocated to the cost proposal being evaluated.

Step 1: $\text{Lowest Cost of All Proposals} / \text{Cost of Proposal Being Evaluated} = \text{Cost Score Percentage}$

Step 2: $\text{Cost Score Percentage} \times \text{Points Allocated to Cost Proposal} = \text{Total Cost Score}$

Example:

Proposal 1 Cost is \$1,000,000

Proposal 2 Cost is \$1,100,000

Points Allocated to the Cost Proposal is 25

Proposal 1: Step 1 – $\$1,000,000 / \$1,000,000 = \text{Cost Score Percentage of } 1 \text{ (100\%)}$

Step 2 – $1 \times 25 = \text{Total Cost Score of } 25$

Proposal 2: Step 1 – $\$1,000,000 / \$1,100,000 = \text{Cost Score Percentage of } 0.909091 \text{ (90.9091\%)}$

Step 2 – $0.909091 \times 25 = \text{Total Cost Score of } 22.727275$

6.8. **Best and Final Offer:** The Agency, if it feels it is in the State’s interest to do so, may conduct discussions with, and obtain best and final offers from, responsive and responsible Vendors who submit proposals determined to be reasonably susceptible of being selected for award for the purpose

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of clarification to assure full understanding of, and responsiveness to, the solicitation requirements. Vendors will be accorded fair and equal treatment with respect to any opportunity for discussion and revision of proposals, and revisions may be permitted after submissions and prior to award for the purpose of obtaining best and final offers. In conducting discussions, there will be no disclosure of any information derived from proposals submitted by competing bidders.

The Vendor's BAFO response, if requested, will include submission of revised technical and cost proposals. If BAFOs are requested by the State and submitted by the Vendor, they will be evaluated and scored, using the evaluation criteria in Section 6.2. Please note that the Agency reserves the right to award a contract based on the initial proposals received. Therefore, the Vendor should ensure their initial proposal provides the State the best terms from a price and technical standpoint.

- 6.9. Availability of Information:** Proposal submissions become public and are available for review immediately after opening pursuant to West Virginia Code §5A-3-11(h). All other information associated with the RFP, including but not limited to, technical scores and reasons for disqualification, will not be available until after the contract has been awarded pursuant to West Virginia Code of State Rules §148-1-6.3.d.

By signing below, I certify that I have reviewed this Request for Proposal in its entirety; understand the requirements, terms and conditions, and other information contained herein; that I am submitting this proposal for review and consideration; that I am authorized by the bidder to execute this bid or any documents related thereto on bidder's behalf; that I am authorized to bind the bidder in a contractual relationship; and that, to the best of my knowledge, the bidder has properly registered with any State agency that may require registration.

SmartCOP, Inc.

(Company)

Steven J. Williams

Steven Williams, Executive Vice President

(Representative Name, Title)

850-429-0082

(Contact Phone/Fax Number)

3/7/2026

(Date)



III. WVDOT General Terms and Conditions

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SECTION 3: GENERAL TERMS AND CONDITIONS

Terms and conditions begin on next page.

GENERAL TERMS AND CONDITIONS:

1. CONTRACTUAL AGREEMENT: Issuance of an Award Document signed by the Purchasing Division Director, or his designee, and approved as to form by the Attorney General's office constitutes acceptance by the State of this Contract made by and between the State of West Virginia and the Vendor. Vendor's signature on its bid, or on the Contract if the Contract is not the result of a bid solicitation, signifies Vendor's agreement to be bound by and accept the terms and conditions contained in this Contract.

2. DEFINITIONS: As used in this Solicitation/Contract, the following terms shall have the meanings attributed to them below. Additional definitions may be found in the specifications included with this Solicitation/Contract.

2.1. "Agency" or "Agencies" means the agency, board, commission, or other entity of the State of West Virginia that is identified on the first page of the Solicitation or any other public entity seeking to procure goods or services under this Contract.

2.2. "Bid" or "Proposal" means the vendors submitted response to this solicitation.

2.3. "Contract" means the binding agreement that is entered into between the State and the Vendor to provide the goods or services requested in the Solicitation.

2.4. "Director" means the Director of the West Virginia Department of Administration, Purchasing Division.

2.5. "Purchasing Division" means the West Virginia Department of Administration, Purchasing Division.

2.6. "Award Document" means the document signed by the Agency and the Purchasing Division, and approved as to form by the Attorney General, that identifies the Vendor as the contract holder.

2.7. "Solicitation" means the official notice of an opportunity to supply the State with goods or services that is published by the Purchasing Division.

2.8. "State" means the State of West Virginia and/or any of its agencies, commissions, boards, etc. as context requires.

2.9. "Vendor" or "Vendors" means any entity submitting a bid in response to the Solicitation, the entity that has been selected as the lowest responsible bidder, or the entity that has been awarded the Contract as context requires.

3. CONTRACT TERM; RENEWAL; EXTENSION: The term of this Contract shall be determined in accordance with the category that has been identified as applicable to this Contract below:

Term Contract

Initial Contract Term: The Initial Contract Term will be for a period of 5 years upon award. The Initial Contract Term becomes effective on the effective start date listed on the first page of this Contract, identified as the State of West Virginia contract cover page containing the signatures of the Purchasing Division, Attorney General, and Encumbrance clerk (or another page identified as _____), and the Initial Contract Term ends on the effective end date also shown on the first page of this Contract.

Renewal Term: This Contract may be renewed upon the mutual written consent of the Agency, and the Vendor, with approval of the Purchasing Division and the Attorney General's office (Attorney General approval is as to form only). Any request for renewal should be delivered to the Agency and then submitted to the Purchasing Division thirty (30) days prior to the expiration date of the initial contract term or appropriate renewal term. A Contract renewal shall be in accordance with the terms and conditions of the original contract. Unless otherwise specified below, renewal of this Contract is limited to (5) renewals successive one (1) year periods or multiple renewal periods of less than one year, provided that the multiple renewal periods do not exceed the total number of months available in all renewal years combined. Automatic renewal of this Contract is prohibited. Renewals must be approved by the Vendor, Agency, Purchasing Division and Attorney General's office (Attorney General approval is as to form only)

Alternate Renewal Term – This contract may be renewed for _____ successive _____ year periods or shorter periods provided that they do not exceed the total number of months contained in all available renewals. Automatic renewal of this Contract is prohibited. Renewals must be approved by the Vendor, Agency, Purchasing Division and Attorney General's office (Attorney General approval is as to form only)

Delivery Order Limitations: In the event that this contract permits delivery orders, a delivery order may only be issued during the time this Contract is in effect. Any delivery order issued within one year of the expiration of this Contract shall be effective for one year from the date the delivery order is issued. No delivery order may be extended beyond one year after this Contract has expired.

Fixed Period Contract: This Contract becomes effective upon Vendor's receipt of the notice to proceed and must be completed within _____ days.

Fixed Period Contract with Renewals: This Contract becomes effective upon Vendor's receipt of the notice to proceed and part of the Contract more fully described in the attached specifications must be completed within _____ days. Upon completion of the work covered by the preceding sentence, the vendor agrees that:

the contract will continue for _____ years;

the contract may be renewed for _____ successive _____ year periods or shorter periods provided that they do not exceed the total number of months contained in all available renewals. Automatic renewal of this Contract is prohibited. Renewals must be approved by the Vendor, Agency, Purchasing Division and Attorney General's Office (Attorney General approval is as to form only).

One-Time Purchase: The term of this Contract shall run from the issuance of the Award Document until all of the goods contracted for have been delivered, but in no event will this Contract extend for more than one fiscal year.

Construction/Project Oversight: This Contract becomes effective on the effective start date listed on the first page of this Contract, identified as the State of West Virginia contract cover page containing the signatures of the Purchasing Division, Attorney General, and Encumbrance clerk (or another page identified as _____), and continues until the project for which the vendor is providing oversight is complete.

Other: Contract Term specified in _____

4. AUTHORITY TO PROCEED: Vendor is authorized to begin performance of this contract on the date of encumbrance listed on the front page of the Award Document unless either the box for "Fixed Period Contract" or "Fixed Period Contract with Renewals" has been checked in Section 3 above. If either "Fixed Period Contract" or "Fixed Period Contract with Renewals" has been checked, Vendor must not begin work until it receives a separate notice to proceed from the State. The notice to proceed will then be incorporated into the Contract via change order to memorialize the official date that work commenced.

5. QUANTITIES: The quantities required under this Contract shall be determined in accordance with the category that has been identified as applicable to this Contract below.

Open End Contract: Quantities listed in this Solicitation/Award Document are approximations only, based on estimates supplied by the Agency. It is understood and agreed that the Contract shall cover the quantities actually ordered for delivery during the term of the Contract, whether more or less than the quantities shown.

Service: The scope of the service to be provided will be more clearly defined in the specifications included herewith.

Combined Service and Goods: The scope of the service and deliverable goods to be provided will be more clearly defined in the specifications included herewith.

One-Time Purchase: This Contract is for the purchase of a set quantity of goods that are identified in the specifications included herewith. Once those items have been delivered, no additional goods may be procured under this Contract without an appropriate change order approved by the Vendor, Agency, Purchasing Division, and Attorney General's office.

Construction: This Contract is for construction activity more fully defined in the specifications.

6. EMERGENCY PURCHASES: The Purchasing Division Director may authorize the Agency to purchase goods or services in the open market that Vendor would otherwise provide under this Contract if those goods or services are for immediate or expedited delivery in an emergency. Emergencies shall include, but are not limited to, delays in transportation or an unanticipated increase in the volume of work. An emergency purchase in the open market, approved by the Purchasing Division Director, shall not constitute of breach of this Contract and shall not entitle the Vendor to any form of compensation or damages. This provision does not excuse the State from fulfilling its obligations under a One-Time Purchase contract.

7. REQUIRED DOCUMENTS: All of the items checked in this section must be provided to the Purchasing Division by the Vendor as specified:

LICENSE(S) / CERTIFICATIONS / PERMITS: In addition to anything required under the Section of the General Terms and Conditions entitled Licensing, the apparent successful Vendor shall furnish proof of the following licenses, certifications, and/or permits upon request and in a form acceptable to the State. The request may be prior to or after contract award at the State's sole discretion.

The apparent successful Vendor shall also furnish proof of any additional licenses or certifications contained in the specifications regardless of whether or not that requirement is listed above.

8. INSURANCE: The apparent successful Vendor shall furnish proof of the insurance identified by a checkmark below prior to Contract award. The insurance coverages identified below must be maintained throughout the life of this contract. Thirty (30) days prior to the expiration of the insurance policies, Vendor shall provide the Agency with proof that the insurance mandated herein has been continued. Vendor must also provide Agency with immediate notice of any changes in its insurance policies, including but not limited to, policy cancelation, policy reduction, or change in insurers. The apparent successful Vendor shall also furnish proof of any additional insurance requirements contained in the specifications prior to Contract award regardless of whether that insurance requirement is listed in this section.

Vendor must maintain:

Commercial General Liability Insurance in at least an amount of: \$1,000,000.00 per occurrence.

Automobile Liability Insurance in at least an amount of: \$1,000,000.00 per occurrence.

Professional/Malpractice/Errors and Omission Insurance in at least an amount of: \$2,000,000.00 per occurrence. Notwithstanding the forgoing, Vendor's are not required to list the State as an additional insured for this type of policy.

Commercial Crime and Third Party Fidelity Insurance in an amount of: _____ per occurrence.

Cyber Liability Insurance in an amount of: \$10,000,000.00 per occurrence.

Builders Risk Insurance in an amount equal to 100% of the amount of the Contract.

Pollution Insurance in an amount of: _____ per occurrence.

Aircraft Liability in an amount of: _____ per occurrence.

9. WORKERS' COMPENSATION INSURANCE: Vendor shall comply with laws relating to workers compensation, shall maintain workers' compensation insurance when required, and shall furnish proof of workers' compensation insurance upon request.

10. VENUE: All legal actions for damages brought by Vendor against the State shall be brought in the West Virginia Claims Commission. Other causes of action must be brought in the West Virginia court authorized by statute to exercise jurisdiction over it.

11. LIQUIDATED DAMAGES: This clause shall in no way be considered exclusive and shall not limit the State or Agency's right to pursue any other available remedy. Vendor shall pay liquidated damages in the amount specified below or as described in the specifications:

_____ for _____.

Liquidated Damages Contained in the Specifications.

Liquidated Damages Are Not Included in this Contract.

12. ACCEPTANCE: Vendor's signature on its bid, or on the certification and signature page, constitutes an offer to the State that cannot be unilaterally withdrawn, signifies that the product or service proposed by vendor meets the mandatory requirements contained in the Solicitation for that product or service, unless otherwise indicated, and signifies acceptance of the terms and conditions contained in the Solicitation unless otherwise indicated.

13. PRICING: The pricing set forth herein is firm for the life of the Contract, unless specified elsewhere within this Solicitation/Contract by the State. A Vendor's inclusion of price adjustment provisions in its bid, without an express authorization from the State in the Solicitation to do so, may result in bid disqualification. Notwithstanding the foregoing, Vendor must extend any publicly advertised sale price to the State and invoice at the lower of the contract price or the publicly advertised sale price.

14. PAYMENT IN ARREARS: Payments for goods/services will be made in arrears only upon receipt of a proper invoice, detailing the goods/services provided or receipt of the goods/services, whichever is later. Notwithstanding the foregoing, payments for software maintenance, licenses, or subscriptions may be paid annually in advance.

15. PAYMENT METHODS: Vendor must accept payment by electronic funds transfer and P-Card. (The State of West Virginia's Purchasing Card program, administered under contract by a banking institution, processes payment for goods and services through state designated credit cards.)

16. TAXES: The Vendor shall pay any applicable sales, use, personal property or any other taxes arising out of this Contract and the transactions contemplated thereby. The State of West Virginia is exempt from federal and state taxes and will not pay or reimburse such taxes.

17. ADDITIONAL FEES: Vendor is not permitted to charge additional fees or assess additional charges that were not either expressly provided for in the solicitation published by the State of West Virginia, included in the Contract, or included in the unit price or lump sum bid amount that Vendor is required by the solicitation to provide. Including such fees or charges as notes to the solicitation may result in rejection of vendor's bid. Requesting such fees or charges be paid after the contract has been awarded may result in cancellation of the contract.

18. FUNDING: This Contract shall continue for the term stated herein, contingent upon funds being appropriated by the Legislature or otherwise being made available. In the event funds are not appropriated or otherwise made available, this Contract becomes void and of no effect beginning on July 1 of the fiscal year for which funding has not been appropriated or otherwise made available. If that occurs, the State may notify the Vendor that an alternative source of funding has been obtained and thereby avoid the automatic termination. Non-appropriation or non-funding shall not be considered an event of default.

19. CANCELLATION: The Purchasing Division Director reserves the right to cancel this Contract immediately upon written notice to the vendor if the materials or workmanship supplied do not conform to the specifications contained in the Contract. The Purchasing Division Director may also cancel any purchase or Contract upon 30 days written notice to the Vendor in accordance with West Virginia Code of State Rules § 148-1-5.2.b.

20. TIME: Time is of the essence regarding all matters of time and performance in this Contract.

21. APPLICABLE LAW: This Contract is governed by and interpreted under West Virginia law without giving effect to its choice of law principles. Any information provided in specification manuals, or any other source, verbal or written, which contradicts or violates the West Virginia Constitution, West Virginia Code, or West Virginia Code of State Rules is void and of no effect.

22. COMPLIANCE WITH LAWS: Vendor shall comply with all applicable federal, state, and local laws, regulations and ordinances. By submitting a bid, Vendor acknowledges that it has reviewed, understands, and will comply with all applicable laws, regulations, and ordinances.

SUBCONTRACTOR COMPLIANCE: Vendor shall notify all subcontractors providing commodities or services related to this Contract that as subcontractors, they too are required to comply with all applicable laws, regulations, and ordinances. Notification under this provision must occur prior to the performance of any work under the contract by the subcontractor.

23. ARBITRATION: Any references made to arbitration contained in this Contract, Vendor's bid, or in any American Institute of Architects documents pertaining to this Contract are hereby deleted, void, and of no effect.

24. MODIFICATIONS: This writing is the parties' final expression of intent. Notwithstanding anything contained in this Contract to the contrary no modification of this Contract shall be binding without mutual written consent of the Agency, and the Vendor, with approval of the Purchasing Division and the Attorney General's office (Attorney General approval is as to form only). Any change to existing contracts that adds work or changes contract cost, and were not included in the original contract, must be approved by the Purchasing Division and the Attorney General's Office (as to form) prior to the implementation of the change or commencement of work affected by the change.

25. WAIVER: The failure of either party to insist upon a strict performance of any of the terms or provision of this Contract, or to exercise any option, right, or remedy herein contained, shall not be construed as a waiver or a relinquishment for the future of such term, provision, option, right, or remedy, but the same shall continue in full force and effect. Any waiver must be expressly stated in writing and signed by the waiving party.

26. SUBSEQUENT FORMS: The terms and conditions contained in this Contract shall supersede any and all subsequent terms and conditions which may appear on any form documents submitted by Vendor to the Agency or Purchasing Division such as price lists, order forms, invoices, sales agreements, or maintenance agreements, and includes internet websites or other electronic documents. Acceptance or use of Vendor's forms does not constitute acceptance of the terms and conditions contained thereon.

27. ASSIGNMENT: Neither this Contract nor any monies due, or to become due hereunder, may be assigned by the Vendor without the express written consent of the Agency, the Purchasing Division, the Attorney General's office (as to form only), and any other government agency or office that may be required to approve such assignments.

28. WARRANTY: The Vendor expressly warrants that the goods and/or services covered by this Contract will: (a) conform to the specifications, drawings, samples, or other description furnished or specified by the Agency; (b) be merchantable and fit for the purpose intended; and (c) be free from defect in material and workmanship.

29. STATE EMPLOYEES: State employees are not permitted to utilize this Contract for personal use and the Vendor is prohibited from permitting or facilitating the same.

30. PRIVACY, SECURITY, AND CONFIDENTIALITY: The Vendor agrees that it will not disclose to anyone, directly or indirectly, any such personally identifiable information or other confidential information gained from the Agency, unless the individual who is the subject of the information consents to the disclosure in writing or the disclosure is made pursuant to the Agency's policies, procedures, and rules. Vendor further agrees to comply with the Confidentiality Policies and Information Security Accountability Requirements, set forth in www.state.wv.us/admin/purchase/privacy.

31. YOUR SUBMISSION IS A PUBLIC DOCUMENT: Vendor's entire response to the Solicitation and the resulting Contract are public documents. As public documents, they will be disclosed to the public following the bid/proposal opening or award of the contract, as required by the competitive bidding laws of West Virginia Code §§ 5A-3-1 et seq., 5-22-1 et seq., and 5G-1-1 et seq. and the Freedom of Information Act West Virginia Code §§ 29B-1-1 et seq.

DO NOT SUBMIT MATERIAL YOU CONSIDER TO BE CONFIDENTIAL, A TRADE SECRET, OR OTHERWISE NOT SUBJECT TO PUBLIC DISCLOSURE.

Submission of any bid, proposal, or other document to the Purchasing Division constitutes your explicit consent to the subsequent public disclosure of the bid, proposal, or document. The Purchasing Division will disclose any document labeled "confidential," "proprietary," "trade secret," "private," or labeled with any other claim against public disclosure of the documents, to include any "trade secrets" as defined by West Virginia Code § 47-22-1 et seq. All submissions are subject to public disclosure without notice.

32. LICENSING: In accordance with West Virginia Code of State Rules § 148-1-6.1.e, Vendor must be licensed and in good standing in accordance with any and all state and local laws and requirements by any state or local agency of West Virginia, including, but not limited to, the West Virginia Secretary of State's Office, the West Virginia Tax Department, West Virginia Insurance Commission, or any other state agency or political subdivision. Obligations related to political subdivisions may include, but are not limited to, business licensing, business and occupation taxes, inspection compliance, permitting, etc. Upon request, the Vendor must provide all necessary releases to obtain information to enable the Purchasing Division Director or the Agency to verify that the Vendor is licensed and in good standing with the above entities.

SUBCONTRACTOR COMPLIANCE: Vendor shall notify all subcontractors providing commodities or services related to this Contract that as subcontractors, they too are required to be licensed, in good standing, and up-to-date on all state and local obligations as described in this section. Obligations related to political subdivisions may include, but are not limited to, business licensing, business and occupation taxes, inspection compliance, permitting, etc. Notification under this provision must occur prior to the performance of any work under the contract by the subcontractor.

33. ANTITRUST: In submitting a bid to, signing a contract with, or accepting a Award Document from any agency of the State of West Virginia, the Vendor agrees to convey, sell, assign, or transfer to the State of West Virginia all rights, title, and interest in and to all causes of action it may now or hereafter acquire under the antitrust laws of the United States and the State of West Virginia for price fixing and/or unreasonable restraints of trade relating to the particular commodities or services purchased or acquired by the State of West Virginia. Such assignment shall be made and become effective at the time the purchasing agency tenders the initial payment to Vendor.

34. VENDOR NON-CONFLICT: Neither Vendor nor its representatives are permitted to have any interest, nor shall they acquire any interest, direct or indirect, which would compromise the performance of its services hereunder. Any such interests shall be promptly presented in detail to the Agency.

35. VENDOR RELATIONSHIP: The relationship of the Vendor to the State shall be that of an independent contractor and no principal-agent relationship or employer-employee relationship is contemplated or created by this Contract. The Vendor as an independent contractor is solely liable for the acts and omissions of its employees and agents. Vendor shall be responsible for selecting, supervising, and compensating any and all individuals employed pursuant to the terms of this Solicitation and resulting contract. Neither the Vendor, nor any employees or subcontractors of the Vendor, shall be deemed to be employees of the State for any purpose whatsoever. Vendor shall be exclusively responsible for payment of employees and contractors for all wages and salaries, taxes, withholding payments, penalties, fees, fringe benefits, professional liability insurance premiums, contributions to insurance and pension, or other deferred compensation plans, including but not limited to, Workers' Compensation and Social Security obligations, licensing fees, etc. and the filing of all necessary documents, forms, and returns pertinent to all of the foregoing.

Vendor shall hold harmless the State, and shall provide the State and Agency with a defense against any and all claims including, but not limited to, the foregoing payments, withholdings, contributions, taxes, Social Security taxes, and employer income tax returns.

36. INDEMNIFICATION: The Vendor agrees to indemnify, defend, and hold harmless the State and the Agency, their officers, and employees from and against: (1) Any claims or losses for services rendered by any subcontractor, person, or firm performing or supplying services, materials, or supplies in connection with the performance of the Contract; (2) Any claims or losses resulting to any person or entity injured or damaged by the Vendor, its officers, employees, or subcontractors by the publication, translation, reproduction, delivery, performance, use, or disposition of any data used under the Contract in a manner not authorized by the Contract, or by Federal or State statutes or regulations; and (3) Any failure of the Vendor, its officers, employees, or subcontractors to observe State and Federal laws including, but not limited to, labor and wage and hour laws.

37. NO DEBT CERTIFICATION: In accordance with West Virginia Code §§ 5A-3-10a and 5-22-1(i), the State is prohibited from awarding a contract to any bidder that owes a debt to the State or a political subdivision of the State. By submitting a bid, or entering into a contract with the State, Vendor is affirming that (1) for construction contracts, the Vendor is not in default on any monetary obligation owed to the state or a political subdivision of the state, and (2) for all other contracts, neither the Vendor nor any related party owe a debt as defined above, and neither the Vendor nor any related party are in employer default as defined in the statute cited above unless the debt or employer default is permitted under the statute.

38. CONFLICT OF INTEREST: Vendor, its officers or members or employees, shall not presently have or acquire an interest, direct or indirect, which would conflict with or compromise the performance of its obligations hereunder. Vendor shall periodically inquire of its officers, members and employees to ensure that a conflict of interest does not arise. Any conflict of interest discovered shall be promptly presented in detail to the Agency.

39. REPORTS: Vendor shall provide the Agency and/or the Purchasing Division with the following reports identified by a checked box below:

Such reports as the Agency and/or the Purchasing Division may request. Requested reports may include, but are not limited to, quantities purchased, agencies utilizing the contract, total contract expenditures by agency, etc.

Quarterly reports detailing the total quantity of purchases in units and dollars, along with a listing of purchases by agency. Quarterly reports should be delivered to the Purchasing Division via email at purchasing.division@wv.gov.

40. BACKGROUND CHECK: In accordance with W. Va. Code § 15-2D-3, the State reserves the right to prohibit a service provider's employees from accessing sensitive or critical information or to be present at the Capitol complex based upon results addressed from a criminal background check. Service providers should contact the West Virginia Division of Protective Services by phone at (304) 558-9911 for more information.

41. PREFERENCE FOR USE OF DOMESTIC STEEL PRODUCTS: Except when authorized by the Director of the Purchasing Division pursuant to W. Va. Code § 5A-3-56, no contractor may use or supply steel products for a State Contract Project other than those steel products made in the United States. A contractor who uses steel products in violation of this section may be subject to civil penalties pursuant to W. Va. Code § 5A-3-56. As used in this section:

- a. "State Contract Project" means any erection or construction of, or any addition to, alteration of or other improvement to any building or structure, including, but not limited to, roads or highways, or the installation of any heating or cooling or ventilating plants or other equipment, or the supply of and materials for such projects, pursuant to a contract with the State of West Virginia for which bids were solicited on or after June 6, 2001.
- b. "Steel Products" means products rolled, formed, shaped, drawn, extruded, forged, cast, fabricated or otherwise similarly processed, or processed by a combination of two or more or such operations, from steel made by the open heath, basic oxygen, electric furnace, Bessemer or other steel making process.
- c. The Purchasing Division Director may, in writing, authorize the use of foreign steel products if:
 1. The cost for each contract item used does not exceed one tenth of one percent (.1%) of the total contract cost or two thousand five hundred dollars (\$2,500.00), whichever is greater. For the purposes of this section, the cost is the value of the steel product as delivered to the project; or
 2. The Director of the Purchasing Division determines that specified steel materials are not produced in the United States in sufficient quantity or otherwise are not reasonably available to meet contract requirements.

42. PREFERENCE FOR USE OF DOMESTIC ALUMINUM, GLASS, AND STEEL: In Accordance with W. Va. Code § 5-19-1 et seq., and W. Va. CSR § 148-10-1 et seq., for every contract or subcontract, subject to the limitations contained herein, for the construction, reconstruction, alteration, repair, improvement or maintenance of public works or for the purchase of any item of machinery or equipment to be used at sites of public works, only domestic aluminum, glass or steel products shall be supplied unless the spending officer determines, in writing, after the receipt of offers or bids, (1) that the cost of domestic aluminum, glass or steel products is unreasonable or inconsistent with the public interest of the State of West Virginia, (2) that domestic aluminum, glass or steel products are not produced in sufficient quantities to meet the contract requirements, or (3) the available domestic aluminum, glass, or steel do not meet the contract specifications. This provision only applies to public works contracts awarded in an amount more than fifty thousand dollars (\$50,000) or public works contracts that require more than ten thousand pounds of steel products.

The cost of domestic aluminum, glass, or steel products may be unreasonable if the cost is more than twenty percent (20%) of the bid or offered price for foreign made aluminum, glass, or steel products. If the domestic aluminum, glass or steel products to be supplied or produced in a "substantial labor surplus area", as defined by the United States Department of Labor, the cost of domestic aluminum, glass, or steel products may be unreasonable if the cost is more than thirty percent (30%) of the bid or offered price for foreign made aluminum, glass, or steel products. This preference shall be applied to an item of machinery or equipment, as indicated above, when the item is a single unit of equipment or machinery manufactured primarily of aluminum, glass or steel, is part of a public works contract and has the sole purpose or of being a permanent part of a single public works project. This provision does not apply to equipment or machinery purchased by a spending unit for use by that spending unit and not as part of a single public works project.

All bids and offers including domestic aluminum, glass or steel products that exceed bid or offer prices including foreign aluminum, glass or steel products after application of the preferences provided in this provision may be reduced to a price equal to or lower than the lowest bid or offer price for foreign aluminum, glass or steel products plus the applicable preference. If the reduced bid or offer prices are made in writing and supersede the prior bid or offer prices, all bids or offers, including the reduced bid or offer prices, will be reevaluated in accordance with this rule.

43. INTERESTED PARTY SUPPLEMENTAL DISCLOSURE: W. Va. Code § 6D-1-2 requires that for contracts with an actual or estimated value of at least \$1 million, the Vendor must submit to the Agency a disclosure of interested parties prior to beginning work under this Contract. Additionally, the Vendor must submit a supplemental disclosure of interested parties reflecting any new or differing interested parties to the contract, which were not included in the original pre-work interested party disclosure, within 30 days following the completion or termination of the contract. A copy of that form is included with this solicitation or can be obtained from the WV Ethics Commission. This requirement does not apply to publicly traded companies listed on a national or international stock exchange. A more detailed definition of interested parties can be obtained from the form referenced above.

44. PROHIBITION AGAINST USED OR REFURBISHED: Unless expressly permitted in the solicitation published by the State, Vendor must provide new, unused commodities, and is prohibited from supplying used or refurbished commodities, in fulfilling its responsibilities under this Contract.

45. VOID CONTRACT CLAUSES: This Contract is subject to the provisions of West Virginia Code § 5A-3-62, which automatically voids certain contract clauses that violate State law.

46. ISRAEL BOYCOTT: Bidder understands and agrees that, pursuant to W. Va. Code § 5A-3-63, it is prohibited from engaging in a boycott of Israel during the term of this contract.

DESIGNATED CONTACT: Vendor appoints the individual identified in this Section as the Contract Administrator and the initial point of contact for matters relating to this Contract.

(Printed Name and Title) Steven Williams, Executive Vice President

(Address) 410 E. Government St., Pensacola, FL 32502

(Phone Number) / (Fax Number) 850-429-0082

(email address) steven.williams@smartcop.com

CERTIFICATION AND SIGNATURE: By signing below, or submitting documentation through wvOASIS, I certify that: I have reviewed this Solicitation/Contract in its entirety; that I understand the requirements, terms and conditions, and other information contained herein; that this bid, offer or proposal constitutes an offer to the State that cannot be unilaterally withdrawn; that the product or service proposed meets the mandatory requirements contained in the Solicitation/Contract for that product or service, unless otherwise stated herein; that the Vendor accepts the terms and conditions contained in the Solicitation, unless otherwise stated herein; that I am submitting this bid, offer or proposal for review and consideration; that this bid or offer was made without prior understanding, agreement, or connection with any entity submitting a bid or offer for the same material, supplies, equipment or services; that this bid or offer is in all respects fair and without collusion or fraud; that this Contract is accepted or entered into without any prior understanding, agreement, or connection to any other entity that could be considered a violation of law; that I am authorized by the Vendor to execute and submit this bid, offer, or proposal, or any documents related thereto on Vendor's behalf; that I am authorized to bind the vendor in a contractual relationship; and that to the best of my knowledge, the vendor has properly registered with any State agency that may require registration.

By signing below, I further certify that I understand this Contract is subject to the provisions of West Virginia Code § 5A-3-62, which automatically voids certain contract clauses that violate State law; and that pursuant to W. Va. Code 5A-3-63, the entity entering into this contract is prohibited from engaging in a boycott against Israel.

SmartCOP, Inc. Agreed with exception as documented in our RFP response.

(Company) Steven J. Williams 3/7/2026

(Signature of Authorized Representative) Steven Williams, Executive Vice President

(Printed Name and Title of Authorized Representative) (Date) 850-429-0082

(Phone Number) (Fax Number) steven.williams@smartcop.com

(Email Address)



IV. WVDOT Cloud Addendum

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West Virginia Department of Transportation CRFP DOT2600000002

Attachment D: State of West Virginia Cloud Addendum

Please refer to the State of West Virginia Cloud Addendum, which will be incorporated as part of the Contract with the successful Vendor.

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Software as a Service Addendum

1. Definitions:

Acceptable alternative data center location means a country that is identified as providing equivalent or stronger data protection than the United States, in terms of both regulation and enforcement. DLA Piper's Privacy Heatmap shall be utilized for this analysis and may be found at <https://www.dlapiperdataprotection.com/index.html?t=world-map&c=US&c2=IN>.

Authorized Persons means the service provider's employees, contractors, subcontractors or other agents who have responsibility in protecting or have access to the public jurisdiction's personal data and non-public data to enable the service provider to perform the services required.

Data Breach means the unauthorized access and acquisition of unencrypted and unredacted personal data that compromises the security or confidentiality of a public jurisdiction's personal information and that causes the service provider or public jurisdiction to reasonably believe that the data breach has caused or will cause identity theft or other fraud.

Individually Identifiable Health Information means information that is a subset of health information, including demographic information collected from an individual, and (1) is created or received by a health care provider, health plan, employer or health care clearinghouse; and (2) relates to the past, present or future physical or mental health or condition of an individual; the provision of health care to an individual; or the past, present or future payment for the provision of health care to an individual; and (a) that identifies the individual; or (b) with respect to which there is a reasonable basis to believe the information can be used to identify the individual.

Non-Public Data means data, other than personal data, that is not subject to distribution to the public as public information. It is deemed to be sensitive and confidential by the public jurisdiction because it contains information that is exempt by statute, ordinance or administrative rule from access by the general public as public information.

Personal Data means data that includes information relating to a person that identifies the person by first name or first initial, and last name, and has any of the following personally identifiable information (PII): government-issued identification numbers (e.g., Social Security, driver's license, state identification card); financial account information, including account number, credit or debit card numbers; or protected health information (PHI).

Protected Health Information (PHI) means individually identifiable health information transmitted by electronic media, maintained in electronic media, or transmitted or maintained in any other form or medium. PHI excludes education records covered by the Family Educational Rights and Privacy Act (FERPA), as amended, 20 U.S.C. 1232g, records described at 20 U.S.C. 1232g(a)(4)(B)(iv) and employment records held by a covered entity in its role as employer.

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Public Jurisdiction means any government or government agency that uses these terms and conditions. The term is a placeholder for the government or government agency.

Public Jurisdiction Data means all data created or in any way originating with the public jurisdiction, and all data that is the output of computer processing or other electronic manipulation of any data that was created by or in any way originated with the public jurisdiction, whether such data or output is stored on the public jurisdiction's hardware, the service provider's hardware or exists in any system owned, maintained or otherwise controlled by the public jurisdiction or by the service provider.

Public Jurisdiction Identified Contact means the person or persons designated in writing by the public jurisdiction to receive security incident or breach notification.

Restricted data means personal data and non-public data.

Security Incident means the actual unauthorized access to personal data or non-public data the service provider believes could reasonably result in the use, disclosure or theft of a public jurisdiction's unencrypted personal data or non-public data within the possession or control of the service provider. A security incident may or may not turn into a data breach.

Service Provider means the contractor and its employees, subcontractors, agents and affiliates who are providing the services agreed to under the contract.

Software-as-a-Service (SaaS) means the capability provided to the consumer to use the provider's applications running on a cloud infrastructure. The applications are accessible from various client devices through a thin-client interface such as a Web browser (e.g., Web-based email) or a program interface. The consumer does not manage or control the underlying cloud infrastructure including network, servers, operating systems, storage or even individual application capabilities, with the possible exception of limited user-specific application configuration settings.

2. Data Ownership: The public jurisdiction will own all rights, title and interest in its data that is related to the services provided by this contract. The service provider shall not access public jurisdiction user accounts or public jurisdiction data, except (1) in the course of data center operations, (2) in response to service or technical issues, (3) as required by the express terms of this contract or (4) at the public jurisdiction's written request.

3. Data Protection and Privacy: Protection of personal privacy and data shall be an integral part of the business activities of the service provider to ensure there is no inappropriate or unauthorized

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use of public jurisdiction information at any time. To this end, the service provider shall safeguard the confidentiality, integrity and availability of public jurisdiction information and comply with the following conditions:

- a) The service provider shall implement and maintain appropriate administrative, technical and physical security measures to safeguard against unauthorized access, disclosure or theft of personal data and non-public data. In Appendix A, the public jurisdiction shall indicate whether restricted information will be processed by the service provider. Such security measures shall be in accordance with recognized industry practice and not less stringent than the measures the service provider applies to its own personal data and non-public data of similar kind. The service provider shall ensure that all such measures, including the manner in which personal data and non-public data are collected, accessed, used, stored, processed, disposed of and disclosed, comply with applicable data protection and privacy laws, as well as the terms and conditions of this Addendum and shall survive termination of the underlying contract.
- b) The service provider represents and warrants that its collection, access, use, storage, disposal and disclosure of personal data and non-public data do and will comply with all applicable federal and state privacy and data protection laws, as well as all other applicable regulations, policies and directives.
- c) The service provider shall support third-party multi-factor authentication integration with the public jurisdiction third-party identity provider to safeguard personal data and non-public data.
- d) If, in the course of its engagement by the public jurisdiction, the service provider has access to or will collect, access, use, store, process, dispose of or disclose credit, debit or other payment cardholder information, the service provider shall at all times remain in compliance with the Payment Card Industry Data Security Standard ("PCI DSS") requirements, including remaining aware at all times of changes to the PCI DSS and promptly implementing all procedures and practices as may be necessary to remain in compliance with the PCI DSS, in each case, at the service provider's sole cost and expense. All data obtained by the service provider in the performance of this contract shall become and remain the property of the public jurisdiction.
- e) All personal data shall be encrypted at rest and in transit with controlled access. Unless otherwise stipulated, the service provider is responsible for encryption of the personal data.
- f) Unless otherwise stipulated, the service provider shall encrypt all non-public data at rest and in transit, in accordance with recognized industry practice. The public jurisdiction shall identify data it deems as non-public data to the service provider.
- g) At no time shall any data or process - that either belong to or are intended for the use of a public jurisdiction or its officers, agents or employees - be copied, disclosed or retained by the service provider or any party related to the service provider for subsequent use in any transaction that does not include the public jurisdiction.
- h) The service provider shall not use or disclose any information collected in connection with the service issued from this proposal for any purpose other than fulfilling the service.
- i) Data Location. For non-public data and personal data, the service provider shall provide its data center services to the public jurisdiction and its end-users solely from data centers in the U.S. Storage of public jurisdiction data at rest shall be located solely in data centers in the U.S. The service provider shall not allow its personnel or contractors to store public

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jurisdiction data on portable devices, including personal computers, except for devices that are used and kept only at its

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U.S. data centers. With agreement from the public jurisdiction, this term may be met by the service provider providing its services from an acceptable alternative data center location, which agreement shall be stated in Appendix A. The Service Provider may also request permission to utilize an acceptable alternative data center location during a procurement's question and answer period by submitting a question to that effect. The service provider shall permit its personnel and contractors to access public jurisdiction data remotely only as required to provide technical support.

4. Security Incident or Data Breach Notification: The service provider shall inform the public jurisdiction of any confirmed security incident or data breach.

- a) Incident Response: The service provider may need to communicate with outside parties regarding a security incident, which may include contacting law enforcement, fielding media inquiries and seeking external expertise as defined by law or contained in the contract. Discussing security incidents with the public jurisdiction shall be handled on an urgent as-needed basis, as part of service provider communication and mitigation processes defined by law or contained in the contract.
- b) Security Incident Reporting Requirements: The service provider shall report a confirmed Security Incident as soon as practicable, but no later than twenty-four (24) hours after the service provider becomes aware of it, to: (1) the department privacy officer, by email, with a read receipt, identified in Appendix A; and, (2) unless otherwise directed by the public jurisdiction in the underlying contract, the WVOT Online Computer Security and Privacy Incident Reporting System at <https://apps.wv.gov/ot/ir/Default.aspx>, and (3) the public jurisdiction point of contact for general contract oversight/administration. The following information shall be shared with the public jurisdiction: (1) incident phase (detection and analysis; containment, eradication and recovery; or post-incident activity), (2) projected business impact, and (3) attack source information.
- c) Breach Reporting Requirements: Upon the discovery of a data breach or unauthorized access to non-public data, the service provider shall immediately report to: (1) the department privacy officer, by email, with a read receipt, identified in Appendix A; and, (2) unless otherwise directed by the public jurisdiction in the underlying contract, the WVOT Online Computer Security and Privacy Incident Reporting System at <https://apps.wv.gov/ot/ir/Default.aspx>, and the public jurisdiction point of contact for general contract oversight/administration.

5. Breach Responsibilities: This section only applies when a data breach occurs with respect to personal data within the possession or control of the service provider.

- a) Immediately after being awarded a contract, the service provider shall provide the public jurisdiction with the name and contact information for an employee of service provider who shall serve as the public jurisdiction's primary security contact and shall be available to assist the public jurisdiction twenty-four (24) hours per day, seven (7) days per week as a contact in resolving obligations associated with a data breach. The service provider may provide this information in Appendix A.

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- b) Immediately following the service provider's notification to the public jurisdiction of a data breach, the parties shall coordinate cooperate with each other to investigate the data breach. The service provider agrees to fully cooperate with the public jurisdiction in the public jurisdiction's handling of the matter, including, without limitation, at the public jurisdiction's request, making available all relevant records, logs, files, data reporting and other materials required to comply with applicable law and regulation.
- c) Within 72 hours of the discovery, the service provider shall notify the parties listed in 4(c) above, to the extent known: (1) date of discovery; (2) list of data elements and the number of individual records; (3) description of the unauthorized persons known or reasonably believed to have improperly used or disclosed the personal data; (4) description of where the personal data is believed to have been improperly transmitted, sent, or utilized; and, (5) description of the probable causes of the improper use or disclosure.
- d) The service provider shall (1) cooperate with the public jurisdiction as reasonably requested by the public jurisdiction to investigate and resolve the data breach, (2) promptly implement necessary remedial measures, if necessary, and prevent any further data breach at the service provider's expense in accordance with applicable privacy rights, laws and regulations and (3) document responsive actions taken related to the data breach, including any post-incident review of events and actions taken to make changes in business practices in providing the services, if necessary.
- e) If a data breach is a direct result of the service provider's breach of its contract obligation to encrypt personal data or otherwise prevent its release, the service provider shall bear the costs associated with (1) the investigation and resolution of the data breach; (2) notifications to individuals, regulators or others required by state or federal law; (3) a credit monitoring service (4) a website or a toll-free number and call center for affected individuals required by state law - all not to exceed the average per record per person cost calculated for data breaches in the United States in the most recent Cost of Data Breach Study: Global Analysis published by the Ponemon Institute at the time of the data breach (or other similar publication if the named publication has not issued an updated average per record per cost in the last 5 years at the time of the data breach); and (5) complete all corrective actions as reasonably determined by service provider based on root cause. The service provider agrees that it shall not inform any third party of any data breach without first obtaining the public jurisdiction's prior written consent, other than to inform a complainant that the matter has been forwarded to the public jurisdiction's legal counsel and/or engage a third party with appropriate expertise and confidentiality protections for any reason connected to the data breach. Except with respect to where the service provider has an independent legal obligation to report a data breach, the service provider agrees that the public jurisdiction shall have the sole right to determine: (1) whether notice of the data breach is to be provided to any individuals, regulators, law enforcement agencies, consumer reporting agencies or others, as required by law or regulation, or otherwise in the public jurisdiction's discretion; and (2) the contents of such notice, whether any type of remediation may be offered to affected persons, and the nature and extent of any such remediation. The service provider retains the right to report activity to law enforcement.

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6. Notification of Legal Requests: The service provider shall contact the public jurisdiction upon receipt of any electronic discovery, litigation holds, discovery searches and expert testimonies related to the public jurisdiction's data under this contract, or which in any way might reasonably require access to the data of the public jurisdiction. The service provider shall not respond to subpoenas, service of process and other legal requests related to the public jurisdiction without first notifying the public jurisdiction, unless prohibited by law from providing such notice.

1. Termination and Suspension of Service:

- a) In the event of a termination of the contract, the service provider shall implement an orderly return of public jurisdiction data within the time period and format specified in the contract (or in the absence of a specified time and format, a mutually agreeable time and format) and after the data has been successfully returned, securely and permanently dispose of public jurisdiction data.
- b) During any period of service suspension, the service provider shall not take any action to intentionally erase any public jurisdiction data.
- c) In the event the contract does not specify a time or format for return of the public jurisdiction's data and an agreement has not been reached, in the event of termination of any services or agreement in entirety, the service provider shall not take any action to intentionally erase any public jurisdiction data for a period of:
 - 10 days after the effective date of termination, if the termination is in accordance with the contract period
 - 30 days after the effective date of termination, if the termination is for convenience
 - 60 days after the effective date of termination, if the termination is for causeAfter such period, the service provider shall have no obligation to maintain or provide any public jurisdiction data and shall thereafter, unless legally prohibited, delete all public jurisdiction data in its systems or otherwise in its possession or under its control.
- d) The public jurisdiction shall be entitled to any post-termination assistance generally made available with respect to the services, unless a unique data retrieval arrangement has been established as part of the Contract.
- e) The service provider shall securely dispose of all requested data in all of its forms, such as disk, CD/ DVD, backup tape and paper, when requested by the public jurisdiction. Data shall be permanently deleted and shall not be recoverable, according to National Institute of Standards and Technology (NIST)-approved methods. Certificates of destruction shall be provided to the public jurisdiction.

8. Background Checks: The service provider shall conduct criminal background checks in compliance with W.Va. Code §15-2D-3 and not utilize any staff to fulfill the obligations of the contract, including subcontractors, who have been convicted of any crime of dishonesty, including but not limited to criminal fraud, or otherwise convicted of any felony or misdemeanor offense for which incarceration for up to 1 year is an authorized penalty. The service provider shall promote and maintain an awareness of the importance of securing the public jurisdiction's information

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among the service provider's employees and agents.

9. Oversight of Authorized Persons: During the term of each authorized person's employment or engagement by service provider, service provider shall at all times cause such persons to abide strictly by service provider's obligations under this Agreement and service provider's standard policies and procedures. The service provider further agrees that it shall maintain a disciplinary process to address any unauthorized access, use or disclosure of personal data by any of service provider's officers, partners, principals, employees, agents or contractors.

10. Access to Security Logs and Reports: The service provider shall provide reports to the public jurisdiction in CSV format agreed to by both the service provider and the public jurisdiction. Reports shall include user access (successful and failed attempts), user access IP address, user access history and security logs for all public jurisdiction files and accounts related to this contract.

11. Data Protection Self-Assessment: The service provider shall perform a Cloud Security Alliance STAR Self-Assessment by completing and submitting the "Consensus Assessments Initiative Questionnaire" to the Public Jurisdiction Identified Contact. The service provider shall submit its self-assessment to the public jurisdiction prior to contract award and, upon request, annually thereafter, on the anniversary of the date of contract execution. Any deficiencies identified in the assessment will entitle the public jurisdiction to disqualify the bid or terminate the contract for cause.

12. Data Center Audit: The service provider shall perform an audit of its data center(s) at least annually at its expense and provide a redacted version of the audit report upon request. The service provider may remove its proprietary information from the redacted version. A Service Organization Control (SOC) 2 audit report or approved equivalent sets the minimum level of a third-party audit. Any deficiencies identified in the report or approved equivalent will entitle the public jurisdiction to disqualify the bid or terminate the contract for cause.

13. Change Control and Advance Notice: The service provider shall give 30 days, advance notice (to the public jurisdiction of any upgrades (e.g., major upgrades, minor upgrades, system changes) that may impact service availability and performance. A major upgrade is a replacement of hardware, software or firmware with a newer or better version in order to bring the system up to date or to improve its characteristics.

14. Security:

- a) At a minimum, the service provider's safeguards for the protection of data shall include:
- (1) securing business facilities, data centers, paper files, servers, back-up systems and computing equipment, including, but not limited to, all mobile devices and other equipment with information storage capability;
 - (2) implementing network, device application, database and platform security;
 - (3) securing information transmission, storage

and disposal; (4) implementing authentication and access controls within media,

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applications, operating systems and equipment; (5) implementing appropriate personnel security and integrity procedures and practices, including, but not limited to, conducting background checks consistent with applicable law; and (6) providing appropriate privacy and information security training to service provider's employees.

- b) The service provider shall execute well-defined recurring action steps that identify and monitor vulnerabilities and provide remediation or corrective measures. Where the service provider's technology or the public jurisdiction's required dependence on a third-party application to interface with the technology creates a critical or high risk, the service provider shall remediate the vulnerability as soon as possible. The service provider must ensure that applications used to interface with the service provider's technology remain operationally compatible with software updates.
- c) Upon the public jurisdiction's written request, the service provider shall provide a high-level network diagram with respect to connectivity to the public jurisdiction's network that illustrates the service provider's information technology network infrastructure.

15. Non-disclosure and Separation of Duties: The service provider shall enforce separation of job duties, require commercially reasonable non-disclosure agreements, and limit staff knowledge of public jurisdiction data to that which is absolutely necessary to perform job duties.

16. Import and Export of Data: The public jurisdiction shall have the ability to securely import, export or dispose of data in standard format in piecemeal or in entirety at its discretion without interference from the service provider. This includes the ability for the public jurisdiction to import or export data to/from other service providers identified in the contract (or in the absence of an identified format, a mutually agreeable format).

17. Responsibilities: The service provider shall be responsible for the acquisition and operation of all hardware, software and network support related to the cloud services being provided. The technical and professional activities required for establishing, managing and maintaining the environments are the responsibilities of the service provider.

18. Subcontractor Compliance: The service provider shall ensure that any of its subcontractors to whom it provides any of the personal data or non-public data it receives hereunder, or to whom it provides any personal data or non-public data which the service provider creates or receives on behalf of the public jurisdiction, agree to the restrictions, terms and conditions which apply to the service provider hereunder.

19. Right to Remove Individuals: The public jurisdiction shall have the right at any time to require that the service provider remove from interaction with public jurisdiction any service provider representative who the public jurisdiction believes is detrimental to its working relationship with the service provider. The public jurisdiction shall provide the service provider with notice of its determination, and the reasons it requests the removal. If the public jurisdiction signifies that a potential security violation exists with respect to the request, the service provider shall immediately remove such individual. The service provider shall not assign the person to any aspect of the contract without the public jurisdiction's consent.

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20. Business Continuity and Disaster Recovery: The service provider shall provide a business continuity and disaster recovery plan executive summary upon request. Lack of a plan will entitle the public jurisdiction to terminate this contract for cause.

21. Compliance with Accessibility Standards: The service provider shall comply with and adhere to Accessibility Standards of Section 508 Amendment to the Rehabilitation Act of 1973.

22. Web Services: The service provider shall use web services exclusively to interface with the public jurisdiction's data in near real time when possible.

23. Encryption of Data at Rest: The service provider shall ensure hard drive encryption consistent with validated cryptography standards as referenced in PIPS 140-2, Security Requirements for Cryptographic Modules for all personal data.

24. Subscription Terms: Service provider grants to a public jurisdiction a license to:

- a. Access and use the service for its business purposes;
- b. For SaaS, use underlying software as embodied or used in the service; and
- c. View, copy, upload, download (where applicable), and use service provider's documentation.

25. Equitable Relief: Service provider acknowledges that any breach of its covenants or obligations set forth in Addendum may cause the public jurisdiction irreparable harm for which monetary damages would not be adequate compensation and agrees that, in the event of such breach or threatened breach, the public jurisdiction is entitled to seek equitable relief, including a restraining order, injunctive relief, specific performance and any other relief that may be available from any court, in addition to any other remedy to which the public jurisdiction may be entitled at law or in equity. Such remedies shall not be deemed to be exclusive but shall be in addition to all other remedies available at law or in equity, subject to any express exclusions or limitations in this Addendum to the contrary.

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AGREED: With exception noted in SmartCOP response.

Name of Agency: _____

Name of Vendor: SmartCOP, Inc. _____

Signature: _____

Signed by:
Signature: *Steven J. Williams*
6F5CB7E5098341C... _____

Title: _____

Title: Executive Vice President _____

Date: _____

Date: 3/7/2026 _____

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Attachment E: Abbreviations and Acronyms

For the reader's convenience, the following table contains a list of abbreviations, terms, and acronyms used in this document.

ABBREVIATION/ ACRONYM	DESCRIPTION
AAMVA	American Association of Motor Vehicle Administrators
AASHTOWare™	American Association of State Highway Transportation Officials Software
API	Application Program Interface
CPD	Charleston Police Department
DH	Department of Health
DMVorWVDMV	(West Virginia) Division of Motor Vehicles
DNR	(West Virginia) Division of Natural Resources
EMS	Emergency Medical Services
FMCSA	Federal Motor Carrier Safety Administration
FRICEW	Forms, Reports, Interfaces, Conversions, Enhancements, and Workflows
FTI	Federal Tax Information
GHSP	West Virginia Governor's Highway Safety Program
GHSP	Governor's Highway Safety Program
HSIP	Highway Safety Improvement Program
ITIL	Information Technology Infrastructure Library
JAWS	Job Access with Speech
LRS	Linear Referencing System
MMUCC	Model Minimum Uniform Crash Criteria
NHTSA	National Highway Traffic Safety Administration
NIST	National Institute of Standards and Technology
NTP	Notice to Proceed
PII	Personally Identifiable Information
PMI	Project Management Institute
PMP	Project Management Professional
RACI	Responsible Accountable Consulted Informed Project Management Form
RMS	Records Management System
RTM	Requirements Traceability Matrix
SEDC	State Electronic Data Collection
SHSP	(West Virginia) Strategic Highway Safety Plan
SMTF	(West Virginia) Safety Management Task Force
SSOLV	Social Security Online Verification
StateRAMP	State Risk and Authorization Management Program
STO	State Treasurer's Office
WCAG	Web Content Accessibility Guidelines
WV	West Virginia
WVDOT	West Virginia Department of Transportation
WVDOT IT	WVDOT Information Technology
WVOT (or OT)	West Virginia Office of Technology

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Data Security Addendum

This Addendum outlines the rights, responsibilities, and obligations of both parties concerning the protection, privacy, and security of all data handled by the Service Provider in accordance with the terms of the underlying Agreement. The parties agree that this Addendum, including all terms and conditions herein, shall govern the Service Provider's handling of Public Jurisdiction/Agency data, including any sensitive or confidential information.

1. Definitions

- **Agency / Public Jurisdiction:** Any government or government agency that uses these terms and conditions. The term is a placeholder for the government or government agency.
- **Agency Data / Public Jurisdiction Data:** All data created by or in any way originating with the Public Jurisdiction/Agency, and all data that is the output of computer processing or other electronic manipulation of any data that was created by or in any way originated with the Public Jurisdiction/Agency, whether such data or output is stored on the Public Jurisdiction/Agency's hardware, the Service Provider's hardware, or exists in any system owned, maintained, or otherwise controlled by either party.
- **Agency Identified Contact / Public Jurisdiction Identified Contact:** The person or persons designated in writing by the Public Jurisdiction/Agency to receive security incident notification.
- **Authorized Persons:** The Service Provider's employees, contractors, subcontractors, or other agents who have responsibility in protecting or have access to the Public Jurisdiction's/Agency's personal data and sensitive data to enable the Service Provider to perform the required services.
- **Container as a Service (CaaS):** A cloud computing model where a third-party provider manages the underlying infrastructure, including the operating systems, servers, and storage for running containers.
- **FIPS 140-3 (Federal Information Processing Standard Publication 140-3):** The official U.S. government computer security standard that specifies the security requirements for cryptographic modules.
- **Incident:** An event that involves attempted or actual unauthorized access, use, disclosure, modification, or destruction of data, or interference with system operations, which may compromise the confidentiality, integrity, or availability of the data.

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- **Individually Identifiable Health Information:** Information that is a subset of health information, including demographic information collected from an individual, and (1) is created or received by a health care provider, health plan, employer or health care clearinghouse; and (2) relates to the past, present or future physical or mental health or condition of an individual, the provision of health care to an individual, or the past, present or future payment for the provision of health care to an individual; and (a) that identifies the individual; or (b) with respect to which there is a reasonable basis to believe the information can be used to identify the individual.
- **Infrastructure as a Service (IaaS):** A cloud computing model where a provider gives customers access to fundamental computing resources over the internet.
- **Personal Data:** Data that includes information relating to a person that identifies the person by first name or first initial, and last name, and has any of the following personally identifiable information (PII): government-issued identification numbers (e.g., Social Security, driver's license, state identification card); financial account information, including account number, credit or debit card numbers; or protected health information (PHI).
- **Platform as a Service (PaaS):** A cloud computing model where a third-party provider delivers hardware and software tools—usually for application development—to users over the internet.
- **Protected Health Information (PHI):** Any individually identifiable health information that is created, received, maintained, or transmitted by a covered entity or its business associate, as defined by HIPAA. PHI includes data related to an individual's past, present, or future physical or mental health condition, the provision of healthcare, or payment for healthcare services, and can exist in any form—electronic, paper, or oral.
- **Restricted data:** Personal data and sensitive data.
- **Security Incident:** The actual unauthorized access to personal data or sensitive data the Service Provider believes could reasonably result in the use, disclosure, or theft of a Public Jurisdiction's/Agency's unencrypted personal data or sensitive data within the possession or control of the Service Provider. A security incident may or may not turn into a data incident.
- **Sensitive Data:** Data, other than personal data, that is not subject to distribution to the public as public information. It is deemed to be sensitive and confidential by the Public Jurisdiction/Agency because it contains information that is exempt by statute, ordinance, or administrative rule from access by the general public as public information.

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- **Service Provider:** The contractor and its employees, subcontractors, agents, and affiliates who are providing the services agreed to under the contract.
- **Software-as-a-Service (SaaS):** The capability provided to the consumer to use the provider's applications running on a cloud infrastructure.

2. Data Ownership

The Public Jurisdiction/Agency will own all rights, title, and interest in its data that is related to the services provided by this contract. The Service Provider shall not access Public Jurisdiction/Agency user accounts or data, except (1) in the course of data center operations, (2) in response to service or technical issues, (3) as required by the express terms of this contract, or (4) at the Public Jurisdiction's/Agency's written request.

3. Data Protection and Privacy

Protection of personal privacy and data shall be an integral part of the business activities of the Service Provider to ensure there is no inappropriate or unauthorized use of Public Jurisdiction/Agency information at any time. The Service Provider shall safeguard the confidentiality, integrity, and availability of Public Jurisdiction/Agency information and comply with the following:

- The Service Provider shall implement and maintain appropriate administrative, technical, and physical security measures to safeguard against unauthorized access, disclosure, or theft of personal data and sensitive data.
- Security standards shall be in accordance with federal, state, and recognized industry practices and not less stringent than the measures the Service Provider applies to its own personal and sensitive data of similar kind.
- The Service Provider warrants that its handling of personal and sensitive data will comply with all applicable federal and state privacy and data protection laws, regulations, policies, and directives, and shall survive termination of the underlying contract.
- The Service Provider shall support third-party multi-factor authentication integration with the Public Jurisdiction/Agency third-party identity provider.
- The Service Provider must remain compliant with Payment Card Industry Data Security Standard ("PCI DSS") requirements if handling credit, debit, or other payment cardholder information.

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- All data obtained by the Service Provider shall become and remain the property of the Public Jurisdiction/Agency.
- All data shall be encrypted at rest and in transit with controlled access, and the Service Provider is responsible for encryption of personal data unless otherwise stipulated.
- The Service Provider shall not copy, disclose, or retain any data or process intended for the use of the Public Jurisdiction/Agency for subsequent use in any transaction that does not include the Public Jurisdiction/Agency.
- The Service Provider shall not use or disclose any information collected in connection with the service for any purpose other than fulfilling the service.
- Data Location: Data center services, including storage of Public Jurisdiction/Agency data at rest, shall be located solely in the U.S..
- Personnel Location: All personnel, including employees and subcontractors, who have access to Customer Data must be located within the United States, and no personnel outside the U.S. shall be permitted to collect, store, or access any data.

4. Security Incident and Data Incident Notification and Responsibilities

The Service Provider shall inform the Public Jurisdiction/Agency of any confirmed security incident, data incident, or unauthorized access of data as soon as practicable, but no later than twenty-four (24) hours after the Service Provider becomes aware of it.

- **Initial Notification (within 24 hours of discovery):**
 - The Service Provider shall report the confirmed incident to the designated agency and department privacy officer (by email with read receipt), the WVOT Online Computer Security and Privacy Incident Reporting System, and the agency point of contact for general contract oversight.
 - The report shall include the type of incident, incident phase (detection and analysis; containment, eradication and recovery; or post-incident activity), projected business impact, and attack source information.
- **Detailed Information (within 24 hours or 72 hours of discovery):**

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- The Service Provider shall also notify the parties listed above with, to the extent known: (1) date of discovery; (2) list of data elements and the number of individual records; (3) description of the unauthorized persons known or reasonably believed to have improperly accessed, used, or disclosed the personal data; (4) description of where the personal data is believed to have been improperly transmitted, sent, or utilized; and, (5) description of the probable causes of the improper use or disclosure.
- **Responsibilities and Costs:**
 - The parties shall coordinate and cooperate to investigate the incident, and the Service Provider agrees to fully cooperate with the Public Jurisdiction/Agency.
 - The Service Provider shall promptly implement necessary remedial measures and prevent further incidents at the Service Provider's expense.
 - The Public Jurisdiction/Agency shall have the sole right to determine whether notice of the incident is to be provided to individuals, regulators, law enforcement, or others, and the contents and remediation of such notice.
 - If a data incident results from the Service Provider's failure to meet a contractual obligation to encrypt personal data, the Service Provider shall bear the costs associated with the investigation, resolution, notifications, and credit monitoring services, up to the average per record per person cost calculated in the most recent Cost of Data Incident Study: Global Analysis published by the Ponemon Institute.

5. Other Contractual Clauses

- **Notification of Legal Requests:** The Service Provider must contact the Public Jurisdiction/Agency upon receipt of any electronic discovery, litigation holds, subpoenas, or other legal requests related to the Public Jurisdiction's/Agency's data before responding, unless prohibited by law.
- **Termination and Suspension of Service:** Upon termination, the Service Provider shall implement an orderly return of Public Jurisdiction/Agency data in a specified or mutually agreeable time and format, and securely and permanently dispose of the data after successful return. During any service suspension, the Service Provider shall not intentionally erase any Public Jurisdiction/Agency data.

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- **Background Checks:** The Service Provider shall conduct criminal background checks in compliance with W. Va. Code §15-2D-3 and not utilize any staff who have been convicted of any crime of dishonesty, felony, or misdemeanor offense for which incarceration for up to one (1) year is an authorized penalty.
- **Oversight of Authorized Persons:** The Service Provider shall ensure Authorized Persons abide by the Agreement and maintain a disciplinary process to address any unauthorized access, use, or disclosure of personal data.
- **Access to Security Logs and Reports:** The Service Provider shall provide reports to the Public Jurisdiction/Agency, including user access (successful and failed attempts), user access IP address, user access history, and security logs for all Public Jurisdiction/Agency files and accounts.
- **Data Protection Self-Assessment & Data Center Audit:** The Service Provider shall perform a Cloud Security Alliance STAR Self-Assessment and an audit of its data center(s) at least annually, providing a redacted report upon request. Deficiencies may entitle the Public Jurisdiction/Agency to disqualify a bid or terminate the contract for cause.
- **Change Control and Advance Notice:** The Service Provider shall give thirty (30) days advance notice of any upgrades that may impact service availability and performance.
- **Security:** The Service Provider's safeguards shall include: securing facilities/equipment, implementing network/device/application/database/platform security, securing transmission/storage/disposal, implementing authentication and access controls, and providing appropriate training.
- **Non-disclosure and Separation of Duties:** The Service Provider shall enforce separation of job duties, require commercially reasonable non-disclosure agreements, and limit staff knowledge of data to that which is absolutely necessary.
- **Import and Export of Data:** The Public Jurisdiction/Agency shall have the ability to securely import, export, or dispose of data in standard format in piecemeal or in entirety at its discretion without interference.

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- **Responsibilities (Cloud Service Models):** The Service Provider is responsible for the acquisition and operation of all hardware, software, and network support. Specific responsibilities vary by model:
 - **CaaS (Container as a Service):** The provider manages the underlying infrastructure, including OS, servers, and storage for running containers.
 - **IaaS (Infrastructure as a Service):** The customer is responsible for managing and securing the operating system, applications, data, network configuration, and access control.
 - **PaaS (Platform as a Service):** The customer manages their applications, data, and identities, while the provider handles the underlying infrastructure and OS.
 - **SaaS (Software as a Service):** The provider handles the infrastructure, platform, and the application, and the customer is primarily responsible for their data and access management.
- **Subcontractor Compliance:** The Service Provider shall ensure that any subcontractor who receives Public Jurisdiction/Agency data agrees to the restrictions, terms, and conditions that apply to the Service Provider.
- **Right to Remove Individuals:** The Public Jurisdiction/Agency has the right to require the Service Provider to remove any representative believed to be detrimental to the working relationship.
- **Business Continuity and Disaster Recovery:** The Service Provider shall provide an executive summary of its business continuity and disaster recovery plan upon request. Lack of a plan will entitle the Public Jurisdiction/Agency to terminate the contract for cause.
- **Compliance with Accessibility Standards:** The Service Provider shall comply with and adhere to Accessibility Standards of Section 508 Amendment to the Rehabilitation Act of 1973.
- **Web Services:** The Service Provider shall use web services exclusively to interface with the Public Jurisdiction's/Agency's data in near real time when possible.
- **Encryption of Data:** The Service Provider shall ensure encryption consistent with validated cryptography standards as referenced in FIPS 140-3 for all personal data.

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- **Subscription Terms:** Service provider grants to a Public Jurisdiction/Agency a license to access and use the service for its business purposes, use underlying software (for SaaS and PaaS), and view, copy, upload, download, and use provider's documentation.
- **Equitable Relief:** The Service Provider acknowledges that any breach of its covenants may cause irreparable harm to the Public Jurisdiction/Agency, entitling the Public Jurisdiction/Agency to seek equitable relief, including a restraining order or injunctive relief.

6. Approvals:

WV Office of Technology	Name of Authorized Signatory	Title

WVOT	Name of Authorized Signatory	Title

Agency Signature	Name of Authorized Signatory	Title

Signed by: Steven J. Williams 3/9/2026
8F5CB7E5008341C

Vendor Signature **Date**
SmartCOP looks forward to discussion data security in depth with during negotiations.

DocuSign Envelope ID: F00C4E1E-E9A2-8CC7-803F-EFCBE8BF1FEA

Data Security Addendum

Appendix A

(To be completed by the Agency's Procurement Officer prior to the execution of the Addendum, and shall be made a part of the Addendum. Required information not identified prior to execution of the Addendum may only be added by amending Appendix A and the Addendum, via Change Order.)

Name of Service Provider/Vendor: _____

Name of Agency:uu _____

Agency/public jurisdiction's required information:

1. Will restricted information be processed by the service provider?

Yes
No

2. If yes to #1, does the restricted information include personal data?

Yes
No

3. If yes to #1, does the restricted information include sensitive data?

Yes
No

4. Provide name and email address for the Department privacy officer:

Name: _____

Email address: _____

Vendor/Service Provider's required information:

5. Provide name and contact information for vendor's employee who shall serve as the public jurisdiction's primary security contact:

Name: _____

Email address: _____

Phone Number: _____