

Office of the  
**Secretary of Public Safety and Homeland Security**

**INTERIM REPORT ON THE FEASIBILITY OF  
IMPLEMENTING AN INTEGRATED CRIMINAL  
JUSTICE SYSTEM WEB PORTAL**

**To The Governor and General Assembly**



**Commonwealth of Virginia**

**Richmond, December 1, 2015**

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# Commonwealth of Virginia

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## Office of the Secretary of Public Safety and Homeland Security

December 1, 2015

TO: The Honorable Terence R. McAuliffe  
Governor

The Honorable S. Chris Jones  
Chairman, House Appropriations Committee

The Honorable Charles J. Colgan  
Co-Chairman, Senate Finance Committee

The Honorable Walter A. Stosch  
Co-Chairman, Senate Finance Committee

Item 376 #1c of the 2015 Budget Bill directs the Secretary of Public Safety and Homeland Security to present a report on the feasibility of implementing an integrated criminal justice system web portal to the Governor and the Chairmen of the House Appropriations and Senate Finance Committees by December 1, 2015.

This report is respectfully submitted for your review. Please contact my office should you have questions regarding the report.

Sincerely,

A handwritten signature in black ink that reads "Brian Moran".

Brian J. Moran

## **Authority**

This report has been prepared and submitted to fulfill the requirement of Item 376 #1c of the 2015 Budget Bill. This item requires the Secretary of Public Safety and Homeland Security to present an interim report on the feasibility of implementing an integrated criminal justice system web portal to the Governor and the Chairmen of the House Appropriations and Senate Finance Committees by December 1, 2015.

Specifically, the web portal shall be for the purpose of securely disseminating information to federal, state, and local criminal justice agencies. It would be intended to provide real-time access to information residing in the data systems of the respective agencies participating in the web portal, through a single secure point of entry. The report shall consider the experience of other states in implementing web portals for similar purposes; the potential value to be gained from sharing information in Virginia's criminal justice system; the potential for supporting the costs for such a web portal through agency fees; and the costs, benefits, potential revenues, and time frames for implementing such a system. The interim report shall include initial findings and recommendations. This document contains the Secretary's report for 2015.

# Table of Contents

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Executive Summary .....	5
Overview of Previous Virginia Attempts to Integrate Criminal Justice Information .....	8
Review of Criminal Justice Data Sharing Efforts in Other States .....	10
Overview of Current Virginia Criminal Justice Data Systems .....	12
Review of Current Virginia Data Sharing Initiatives .....	14
Conclusions and Recommendations.....	20
APPENDIX 1: Previous Virginia Reports Citing Need for Criminal Justice Information Sharing .....	22
APPENDIX 2: Model of Potential Benefits of a Virginia Integrated Criminal Justice Data System.....	28
APPENDIX 3: Information Sources .....	29

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# Executive Summary

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*The Secretary of Public Safety and Homeland Security, in consultation with the Secretaries of Administration and Technology, shall review the feasibility of implementing an integrated criminal justice system web portal for the purpose of securely disseminating information to federal, state, and local criminal justice agencies. Such a web portal would be intended to provide real-time access to information residing in the data systems of the respective agencies participating in the web portal, through a single secure point of entry. Consideration shall be given to the experience of other states in implementing web portals for similar purposes; the potential value to be gained from sharing information in Virginia's criminal justice system; the potential for supporting the costs for such a web portal through agency fees; and the costs, benefits, potential revenues, and time frames for implementing such a system. A preliminary report, including initial findings and recommendations, shall be presented to the Governor and the Chairmen of the House Appropriations and Senate Finance Committees by December 1, 2015.*

— Item 376 #1c of the 2015 Budget Bill

## **DCJS conducted the above study by doing the following:**

- Reviewing previous Virginia government reports on the need for improved sharing of criminal justice information, and lessons learned from previous Virginia criminal justice data sharing efforts.
- Reviewing recent and ongoing statewide criminal justice data sharing initiatives in other states (Georgia, North Carolina, and Tennessee) to identify approaches used by these states, and lessons learned concerning time frames, governance, costs and benefits, and funding mechanisms.
- Reviewing major criminal justice data systems maintained by Virginia agencies containing information that might be shared through an integrated criminal justice information system, including systems maintained by the Departments of Corrections, Juvenile Justice, and State Police; by the Supreme Court of Virginia; and the Law Enforcement Information Exchange (LInX).
- Reviewing current Virginia government data sharing initiatives which are addressing various issues relevant to improving data sharing between Virginia state and local government agencies.

Based on the information gained from the reviews above, the conclusions and recommendations below are made concerning the feasibility of implementing an integrated criminal justice system web portal.

## **Conclusions**

1. The need for better sharing of criminal justice information among criminal justice agencies has been documented repeatedly by the Commonwealth's Executive, Legislative and Judicial branches for nearly 30 years. The lack of data sharing has been cited as contributing to inefficiencies in law enforcement, corrections, court operations, juvenile services,

victim's services, substance abuse prevention, school and campus violence, firearms violence, and domestic and sexual violence.

2. Virginia has made incremental improvements in data sharing between criminal justice and public safety agencies. However, past data sharing initiatives focused mainly on improving data sharing between a few agencies for specific, limited purposes. They were not developed within the context of moving Virginia public safety toward an effective, integrated criminal justice data system.
3. Virginia's public safety and judicial agencies now maintain sophisticated information system which collect and store the types of information that could be shared through an integrated system. However, these systems are not designed to easily exchange information in a way that would support an integrated criminal justice information system.
4. The information systems now maintained by Virginia's public safety and criminal justice agencies and organizations can serve as a starting point for developing an integrated criminal justice information system.
5. Other states have made significant progress in developing systems to share and integrate public safety and criminal justice information. Their experience can help guide Virginia's similar effort.
6. Virginia already has several initiatives underway to improve the sharing and use of data between different secretariats and agencies. These can be leveraged to help guide efforts to better share and use criminal justice data.

## **Recommendations**

1. Recognize that sharing and integrating data in Virginia's current criminal justice information systems is a long-term project. It cannot be accomplished quickly. Furthermore, if the system is to be maintained, a long-term funding mechanism must be established.
2. Development of an integrated criminal justice information system should not be viewed or managed as a *technology* project. It should be viewed and managed as a project to improve the *business processes* of the Commonwealth's public safety and criminal justice system.
3. Developing an integrated criminal justice information system will require the cooperative efforts of all branches and all levels of government. Local, regional, state and federal agencies will both provide data that feeds the system, and be the users of the data provided by the system. Representatives of all of these agencies should be included (at appropriate points) in planning for such a system.
4. Develop a data governance structure to ensure that information provided by an integrated criminal justice information system is useable and reliable, and that relevant privacy and security issues are addressed. Leverage work now being done in these areas by initiatives such as the Commonwealth Data Steward's Group, the Center for Behavioral Health and Justice, the Virginia Longitudinal Data System, and the Health and Criminal Justice Data Committee.



5. Build upon Virginia's current public safety and criminal justice data systems and infrastructure, to leverage the investments Virginia has already made in these systems. Avoid unnecessary duplication or "reinventing the wheel."
6. To the greatest extent possible, the integrated criminal justice information system should be developed to provide data not just for the daily operations of public safety and criminal justice agencies, but also to provide data for state and local officials using "data-driven" approaches to develop missions, policies, and budgets for these agencies.

# Overview of Previous Virginia Attempts to Integrate Criminal Justice Information

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Virginia government's need for improved sharing of criminal justice information has been thoroughly documented. All three branches of government in the Commonwealth – Executive, Legislative and Judicial – have produced numerous studies and reports citing why the criminal justice system would be more effective if criminal justice agencies did a better job of sharing the information that they now collect and store. *Appendix A* of this report illustrates how often the need for better criminal justice information sharing has been recognized. In every year between 1988 and 2015 – a span of nearly 30 years – a Virginia government agency has published a report highlighting this need.

Over this period of time, Virginia has made many improvements in information sharing. In 2015, information sharing between criminal justice agencies is much more effective than it was in 1988. However, the goal of an “integrated criminal justice system” with “access through a single secure point of entry” has not been achieved. The information sharing that has occurred has been produced mainly through limited, one-time efforts to improve information sharing between a few agencies, rather than efforts to integrate sharing among the larger criminal justice system.

In the 1990s, a DCJS-led Integrated Criminal Justice Information System (ICJIS) initiative produced a prototype data portal that combined and presented, through a single terminal, criminal justice information on offenders drawn from multiple public safety agencies including the Departments of Corrections, Juvenile Justice, and State Police (see *Figure 1* for an ICJIS concept model).

The ICJIS prototype demonstrated that such data sharing is *technologically* possible. However, the information presented by the portal had limited value because the data from these agencies' systems used different methods of identifying individuals, cases, offenses and charges. There were no data standards in place to enable the information provided by these different agency systems to be integrated and interpreted in a meaningful way. Additionally, the administrative and legal agreements needed for sustained, effective data sharing between agencies were not yet in place, which conflicted with various state and federal laws and regulations concerning data privacy. Finally, the initiative was funded by a series of federal grants and earmarks, with no long-term plans for long-term funding of the system. For these reasons, there was no further development of the prototype portal.

The challenges identified in this previous attempt to integrate and share criminal justice data in Virginia must be addressed if Virginia is to succeed in creating an integrated criminal justice system web portal. In particular, the feasibility of developing such a portal will depend on recognizing and addressing the following:

- Developing and implementing an integrated criminal justice information sharing system is a long-term project.

- Project management and governance are critical to success; the project should be managed not as merely a technology project, but as a project to improve the *business processes* of the criminal justice system.
- Developing data standards that allow shared data to be understood and interpreted by all users is critical. There is no value in sharing data if the people receiving it cannot understand what it means.
- Input and participation by all of the parties that produce, share and use the information is critical. For a statewide criminal justice information system, participation by the courts is critical. Therefore, cooperation between different branches and different levels of government is required.
- Because the operation and maintenance of a statewide criminal justice information system is long-term, planning for the system must include a sustained funding mechanism.

# Review of Criminal Justice Data Sharing Efforts in Other States

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Several other southeastern U.S. states have developed, or are currently developing, statewide criminal justice information sharing systems that provide capabilities similar to the proposed Virginia integrated justice system web portal. The experience of these states regarding their systems' purpose, participating agencies, costs and funding, and governance are reviewed below and can provide lessons for Virginia if it chooses to develop and implement such a system.

## **Tennessee**

Tennessee's Integrated Criminal Justice (ICJ) Web Portal, developed in 2006, is a secure browser-based interface into state criminal justice agency databases which provides the ability to query many available databases in one place. According to Tennessee officials, the ICJ Web Portal is "an important first step toward the dissemination of critical information to criminal justice entities, regardless of whether they are local, state or federal."

The ICJ Web Portal provides a single connection to the following information sources:

- Tennessee Bureau of Investigation – Sex Offender Registry, Protection Orders, Wanted Persons
- Department of Correction – Offender information (mug shots, photos, gang affiliation, etc.)
- Board of Parole – Active Parole Violation Warrants
- Department of Safety – Drivers License General and Historical information
- Department of Revenue – Title and Registration information

The Tennessee system is now used by over 150 agencies and about 3,000 individual users. Participants are located throughout the state and include Police Departments, Sheriffs Offices, 911 Centers, District Attorneys, Drug Task Forces and various other justice and justice-affiliated agencies. Federal law enforcement agencies are also able to access the system following the required training.

According to Tennessee reports, the ICJ web portal, from design to implementation, cost a total of \$200,000.

The ICJ Web Portal is supported by agency fees. For an annual cost of \$75.00, an entity can have ten people identified as users of the system. Tennessee reports that this has resulted in significant savings for many smaller agencies, because they no longer have to rely on more expensive third party systems to access the data available through the ICJ Web Portal.

Tennessee has cited numerous benefits of the ICJ Web Portal. It enhances the ability to positively identify criminals; facilitates easy access to information by state, county, federal, local law enforcement and criminal justice agencies; and bolsters cross-agency information sharing. It promotes increased web-based transmission and retrieval of information, facilitates integration and information sharing with state and local criminal justice agencies, and improves the safety and security of Tennessee's citizens with a single point of access to critical criminal justice data.

Soon after implementation of the ICJ Web Portal, user agencies reported that the information it provides assisted agencies in solving a broad range of crimes, both those that occurred recently and those that have been open for some time.

Governance of the ICJ Web Portal is provided by the Tennessee Integrated Criminal Justice (ICJ) Steering Committee. Participants include upper management from a number of State agencies including the Tennessee Bureau of Investigation, Administrative Office of the Court, District Attorneys General Conference, District Public Defenders Conference, Department of Correction, the State's Chief Information Officer, and others. The Tennessee Legislature formalized the work of the ICJ Steering Committee through the Integrated Criminal Justice Act of 2006.

## **North Carolina**

North Carolina's Criminal Justice Law Enforcement Automated Data Services (CJLEADS) is a database of comprehensive information about criminals that can be accessed via the Internet. It integrates data including warrants; prison and jail records; court records; probation and parole status; sex offender registration; driver records; and concealed handgun permits. It provides up-to-date information about offenders in a centralized location via a secure connection for use by state and local government criminal justice professionals. Access to CJLEADS is 24 x 7, 365 days a year.

More recent additions to the CJLEADS system include information on Administrative Office of the Court Infractions Data (requested by law enforcement for a more complete offender profile); Alcohol Law Enforcement Background Checks; DMV Restrictions; Misdemeanant Eligibility for Appointed Counsel; and Pending DWI Report Updates. Future updates planned for the system include Pistol Purchase Permit Revocation Reporting; Gang Information; Scars, Marks and Tattoos; a Habitual Felon icon; and DMV enhancements including information on Stolen/Towed Vehicles, Handicap Placards, and additional information on driver's current and former addresses. Efforts are also continuing to enhance the CJLEADS interface with Federal information systems and criminal information, specifically Hot File access for wanted persons, stolen vehicles and stolen weapons.

CJLEADS is used by about 28,000 federal, state, and local criminal justice professionals with an operational presence in North Carolina. On a weekly basis, an average of 12,407 users access CJLEADS. In the last 12 months, CJLEADS users have run almost 19.9 million searches and accessed over 17 million offender and DMV records.

CJLEADS was developed and deployed at an initial cost of \$25.5 million with estimated annual operation costs of \$9 million. CJLEADS has served the criminal justice community since 2010. North Carolina estimates the cumulative time savings in data searching statewide is approximately \$13.3 million annually, and that by 2015 the annual return on investment based on time savings, increased productivity and lives saved is estimated to be \$19.5 million.

Overall governance of CJLEADS is provided by the Government Data Analytics Center (GDAC), within the North Carolina Office of Information Technology Services (OITS).

## Georgia

Georgia's criminal justice agencies have initiated a statewide effort to integrate their criminal justice operations through the Georgia Justice Data Exchange (Georgia JDX). The goals of Georgia JDX are to:

- Enable users with the appropriate levels of access to request criminal information at any time from any place and to receive complete and accurate information in a timely manner.
- Create opportunities for cost savings by promoting efficient administration of individual criminal justice functions.
- Create a distributed, protected and trusted environment for data sharing.
- Provide mechanisms to permit criminal justice agencies at the Circuit and County levels to share data based on common standards and practices.
- Supply capabilities to discover and link justice information on a statewide basis, including detecting relationships among people, places, things, and events.
- Leverage applications and networks currently utilized by participating agencies.
- Enhance strategic decision making capabilities through improved access to relevant data.
- Ensure the availability of current, valid statistical information to support monitoring and assessment of the Georgia criminal justice system.
- Support proactive caseload management and heightened accountability relative to state and federal guidelines and procedures.
- Improve public safety in a cost effective manner.

Participants in the Georgia JDX system will include Police, Sheriffs, Circuit and County level prosecutors and public defenders, circuit and county level court judges, clerks and magistrates, and state and local corrections officials including probation and parole.

Georgia reportedly will provide dedicated funding for justice system technology and data-sharing projects. This would be done, in part, by dedicating a portion of the \$125 filing fee paid to the court superior court for each civil matter filed in the court.

Georgia anticipates an incremental development cycle for Georgia JDX. Its action plan envisions short, medium and long-term implementation of the system. Short term goals include developing the governance structure, and initial development of the technology infrastructure. Medium-term goals include scaling the project to add additional users and assessing progress to date, and long-term plans include building out additional technology and users, developing new and additional applications, and on-going maintenance of the system.

Georgia JDX governance will be provided by the Georgia JDX Executive Council. The Council will provide the leadership and direction to the Georgia JDX project, and will include stakeholders from each Circuit to provide policy and operational guidance to the project. The Council will receive guidance from the following committees:

*Standards Committee:* The Standards Committee will be responsible for establishing and monitoring the standards being used by the Georgia JDX project. It will review requests for

changes from the members of the Georgia JDX project and makes recommendations to the Executive Council.

*Data Quality Committee:* The Data Quality Committee will establish data owners, create data quality guidelines, create data quality monitoring processes, monitor the data and identify and resolve data quality issues.

*Architecture Committee:* The Architecture Committee will establish and monitor the enterprise architecture of the Georgia JDX project. It will periodically review the architecture to identify any modifications that may be required to stay abreast of emerging technologies or changes in business practices.

*Technology Committee:* The Technology Committee will establish and monitor the technology infrastructure for the Georgia JDX project. It will periodically review the technology infrastructure to identify any changes that may be required based on operational and policy issues.

### **Summary of Lessons Learned from Other States**

This review of statewide criminal justice data integration efforts by three southeastern states provides several overall lessons that may help guide any similar Virginia effort. These lessons mirror and reinforce the lessons learned during Virginia's previous ICJIS data integration project in the 1990s.

*Incremental development.* These states approached their statewide criminal justice data sharing initiatives as multi-phased, multi-year projects. There was no expectation that projects of this size and complexity would be quickly implemented.

*Inclusive user participation.* These states recognized that public safety and criminal justice operations depend on information collected and provided by local, regional, state and Federal government entities. They also recognized that these same entities would be the primary users of the data provided by integrated data sharing systems. All of these entities were involved in the planning and operation of the systems in these states.

*Governance.* These states established dedicated offices or committees to provide oversight for both the planning and development, and for the ongoing operation and maintenance of their statewide systems. These governance structures included processes for developing and maintaining data standards and data quality, and addressing all relevant privacy and security issues.

*Adequate funding mechanisms.* These states established mechanisms to provide ongoing state and/or local participant funding to maintain these systems. Although federal grant funds were sometimes used for initial system planning and development, the states realized that they must invest in these systems if they were to realize the ongoing benefits they provide. States that have already established systems report that these investments have provided costs savings as well as improvements in criminal justice system efficiencies and improved public safety.

# Overview of Current Virginia Criminal Justice Data Systems

Virginia public safety and judicial agencies currently maintain sophisticated information systems which collect and store the types of information that would be shared through integrated criminal justice data system web portal. Among the major systems maintained by Virginia agencies are:

- Virginia Criminal Information Network (VCIN). VCIN, operated by the Department of State Police, currently provides criminal history and other related information to many criminal justice agencies throughout Virginia, and includes computerized links to local, regional, and national law enforcement systems.
- Law Enforcement Information Exchange (LInX). LInX allows the sharing of selected information drawn from the records management systems of more than 300 local, state, and federal law enforcement agencies.
- Corrections Information System (CORIS). CORIS, operated by the Department of Corrections, is an integrated, web-based offender management system that enables jurisdictions to manage offenders under community or institutional supervision. It provides a single electronic offender record and centralized database that allows users to obtain and maintain a thorough view of the offender's history, current status, risk profile, and sentencing/release information. CORIS has recently incorporated the State Compensation Board's Local Inmate Data System (LIDS), which maintains information on individuals admitted to local jails in Virginia.
- Juvenile Tracking System (JTS)/Balanced Approach Data Gathering Environment (BADGE). JTS/BADGE, operated by the Department of Juvenile Justice, supports the DJJ's management of juvenile offenders under its custody and supervision, as well as programs, services, and other resources. It covers both institutional and community based activities.
- Courts Automated Information System (CAIS). CAIS, operated by the Supreme Court, manages and provides information on cases within Virginia's Supreme Court, appellate courts, and circuit, general district, and juvenile and domestic relations courts.

These systems currently share certain types of data (for example, the CCRE criminal history records receive court case disposition data from the Supreme Court's CAIS system, and correctional status information from the DOC CORIS Offender Management System . However, these systems are not designed to easily exchange information to support an integrated criminal justice information system.

Two of the systems above, used primarily for law enforcement purposes, are systems that currently are primarily oriented toward providing extensive criminal justice information to a wide range of statewide users. These systems are reviewed in more detail below.



## **Virginia Criminal Information Network**

The Virginia Criminal Information Network (VCIN), managed by the Department of State Police, currently provides criminal history and other related information to many criminal justice agencies throughout Virginia, and includes computerized links to local, regional, and national law enforcement systems including the National Crime Information Center (NCIC) and the National Law Enforcement Telecommunications System (NLETS).

Fingerprint-based individual criminal history records maintained in the State Police Central Criminal Records Exchange (CCRE) are available through VCIN and contain information including, but not limited to, the following:

- Name and demographics of individuals arrested
- Arrest locality
- Arrest offense(s)
- Court disposition for each charge
- Current and past correctional status

In addition to providing information to law enforcement officers to indicate prior history and the propensity for violence an individual may have; criminal history records available through VCIN may be used to serve a judge's review prior to sentencing; guiding a correctional official in assigning a custody level to an inmate; determining probation/parole status; and to efficiently support computerized criminal justice programs such as the firearms transaction programs on the state/national level, etc.

Membership in the VCIN system is regulated by Title 52, Chapter 2 of the *Code of Virginia*. VCIN is available to any department or division of state government which meets the definition of a criminal justice agency as defined by § 9.1-101. These agencies include any county, city, town, railroad, or college campus police department, special police departments maintained by corporations in Virginia, and federal criminal justice agencies, subject to the approval of the Superintendent of State Police.

Applicants approved for VCIN access agree to assume and pay all rentals for sending and receiving stations, or receiving stations only, as authorized by the State Police for installation within the applicant's jurisdiction, and any and all costs of installation and operation of such stations. The Commonwealth pays all rentals for necessary wire or circuit mileage required to connect such stations operated by criminal justice agencies of the Commonwealth and its political subdivisions, or the Federal Bureau of Investigation, with the basic system. All other agencies must agree to assume and pay all rentals for necessary wire or circuit mileage required to connect such stations with the basic system.

## **Virginia's Law Enforcement Information Exchange (LInX)**

Virginia's Law Enforcement Information Exchange (LInX) links crime information from more than 300 local, state, and federal law enforcement agencies. LInX permits users to share information by breaking down jurisdictional and technical barriers among participating local, state, and federal law enforcement agencies to anticipate, solve and prevent crime and terrorism.

More than 350 local, state, federal and campus law enforcement agencies from Virginia, Maryland and the District of Columbia are members of Virginia LInX. With the exception of a handful of town police departments, all Virginia local law enforcement agencies are LInX members, making Virginia LInX one of the most comprehensive law enforcement information sharing system in the nation and the largest of the eleven LInX regions in the U.S. LInX also provides connectivity to federal data sharing systems of the Department of Justice, Federal Bureau of Investigation, Immigration and Customs Enforcement, and Department of Defense.

LInX is built to National Information Exchange Model (NIEM) standards and is accessed through a secure Web-based application from any computer or mobile data terminal. The data shared is selected by each user and generally includes the contents of each agency's records management system. All participating agencies' data may be examined with several search and analysis tools.

The comprehensive information contained in LInX draws on participating agency record management systems and may include items such as:

- Adult criminal history
- Jail booking records
- Traffic crash reports
- Traffic summons data
- Sex offender registry
- Statewide mug shots
- Incident data (including narratives and supplemental reports)
- Investigative reports
- Field interviews/suspicious incidents
- Pawn shop records/pawn tickets
- Warrants

LInX is maintained regionally primarily with local funds. Annual maintenance fees are approximately \$200-300 per agency. There are no other costs to users.

Virginia LInX is managed by a board of governors which makes the rules, establishes policies and is responsible for the administration, operation and technical aspects of the system.

The following Table (Table 1) indicates the extent to which the LInX capacities and information compare with capacities and information of the proposed integrated criminal justice system web portal.

**TABLE 1**  
**Comparison of Proposed Integrated Criminal Justice System Web Portal**  
**and the Law Enforcement Information Exchange (LInX)**

<b>Proposed integrated criminal justice system web portal (per Item 376 #1c, 2015 Budget Bill)</b>	<b>Virginia Law Enforcement Information Exchange (LInX)</b>
“... an integrated criminal justice system web portal”	Accessed through a secure Web-based application from any computer or mobile data terminal.
“securely disseminating information to federal, state, and local criminal justice agencies”	More than 350 local, state, federal and campus law enforcement agencies from Virginia, Maryland and the District of Columbia are members of Virginia LInX.
“provide real-time access to information residing in the data systems of the respective agencies participating in the web portal”	Data in from Virginia law enforcement agencies’ records management systems are copied and placed into LInX nightly.
“through a single secure point of entry”	Users query all available shared data with a standard Web browser as if it were a single system.
“Consideration shall be given to the experience of other states in implementing web portals for similar purposes ...”	Other users of LInX include: <ul style="list-style-type: none"> <li>• National Capitol Region (DC-MD-VA)</li> <li>• Florida/Georgia</li> <li>• Texas (Gulf Coast region)</li> <li>• New Mexico</li> <li>• Hawaii</li> <li>• Seattle/Puget Sound WA region</li> <li>• Los Angeles CA region (in progress)</li> <li>• New London CN (in progress)</li> </ul>
“... to the potential value to be gained from sharing information in Virginia’s criminal justice system ...”	LInX users in Virginia and other states/regions with LInX systems have documented numerous cases solved based on LInX data.
“... to the potential for supporting the costs for such a web portal through agency fees ...”	Annual maintenance fees are about \$200-300 per agency. There are no other costs to users. Builds upon existing systems; does not force agencies to buy new systems.
“... and to the costs, benefits, potential revenues, and time frames for implementing such a system.”	LInX users in Virginia and other states/regions with LInX have documented many cases solved based on LInX data. In 2015, only a few VA law enforcement agencies are not in LInX.

# Review of Current Virginia Data Sharing Initiatives

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“A decision-making body or governance structure is fundamental to the proper implementation of a statewide justice information sharing (JIS) program. These governing bodies allow states to manage the task of working across multiple agencies and to create and implement strategic plans for JIS. Such arrangements are vital to success because they facilitate collective decision-making and formalize the decision-making process.”

*Issues Brief: Overview of State Justice Information Sharing Governance Structures  
National Governors Association Center for Best Practices, July 2009*

Various initiatives are now underway to improve data sharing among Virginia state agencies. Although not all were created with a major focus on sharing criminal justice information, each initiative has identified certain criminal justice information as a logical component. Furthermore, these initiatives are successfully addressing many of the issues that have vexed previous public safety data-sharing initiatives, including governance, data quality and standards, and legal and privacy issues.

Any future work to plan, develop and implement a Virginia integrated criminal justice information system by should leverage the work of these initiatives.

## *1. The Commonwealth Data Stewards Group*

Initiated by the Secretary of Technology to harness “big data analytics” and enhance information sharing and data-driven decision-making across state agencies, this effort initially focused on sharing data among health agencies but now includes representatives from public safety agencies including the Departments of Corrections, Criminal Justice Services, Juvenile Justice and State Police.

This group is examining data governance issues such as:

- MOUs and other sharing agreements between agencies.
- Data quality and accuracy issues.
- Linking and tracking individual records across multiple data systems.
- Legal constraints on sharing data (state and federal).
- Compliance with VITA and Secretary of Technology standards, and security and FOIA issues.

## *2. The Center for Behavioral Health and Justice*

Recently, Executive Order #4 (2015) established the Center for Behavioral Health and Justice, an “interagency collaborative to better coordinate behavioral health and justice services.” Its missions include developing a “multi-systems approach to data collection and analytics” and a “one stop shop for access to data.” The Center is still in its planning stages and is not yet operational.

It will be overseen by the Deputy Secretaries of Public Safety and Homeland Security and Health and Human Resources and an Executive Leadership Council including the Commissioners of the Department of Behavioral Health and Developmental Services and the Department of Health, the Director of the Department of Medical Assistance Services, and from public safety the Directors of the Departments of Corrections, Criminal Justice Services, and Juvenile Justice.

### 3. *The Virginia Department of Education's Virginia Longitudinal Data System (VLDS)*

The Virginia Department of Education created the Virginia Longitudinal Data System (VLDS) which “provides state policy makers, authorized researchers and citizens with access to educational and workforce training data from multiple sources...” VLDS participating state agencies include the Virginia Department of Education, State Council of Higher Education for Virginia, Virginia Employment Commission), Virginia Department of Social Services and Virginia Community College System. VLDS was designed to allow the addition of data from other state agencies in the future.

A major feature of the VLDS is that it provides access to “de-identified” data on individuals. This allows individuals to be tracked across different state data systems, but without using personal identifiers that raise complex privacy concerns. The data portal study may wish to examine the VLDS model for its applicability in tracking offenders through the criminal justice system, particularly with regard to how such a system could provide data to support meaningful evaluations of programs to reduce offender recidivism.

### 4. *Health and Criminal Justice Data Committee*

Virginia should draw on the insights and expertise of data analysts in public safety, health and other agencies who are “on the ground” and who often share data in their everyday work. These analysts have considerable experience working together to solve everyday data sharing problems and keep the Commonwealth informed about critical issues in criminal justice and public health. Toward this end, the June 2015 report *Recommendations of the Governor's Task Force on Prescription Drug and Heroin Abuse* recommended creating a Health and Criminal Justice Data Committee, comprised of data analysts from the Secretariats of Public Safety and Homeland Security and Health and Human Resources.

In September 2015, the Secretary of Public Safety and Homeland Security and the Secretary of Health and Human Resources asked their agencies to join and provide data to the Health and Criminal Justice Data Committee “to glean the most complete picture of the public safety and public health issues confronting the Commonwealth.” Public safety agencies include the Departments of Corrections, Criminal Justice Services, Forensic Science, Juvenile Justice, and State Police. Health and Human Services agencies include the Departments of Behavioral Health and Developmental Services, Health, and Health Professions. The Office of the Executive Secretary of the Supreme Court of Virginia, the Virginia Criminal Sentencing Commission, and the State Compensation Board were also asked to provide representation and data to the committee.

The Health and Criminal Justice Data Committee should be consulted on issues of data standardization and data quality with regard to how data provided by an integrated criminal justice information system could be used to support “data-driven” planning, policy, and evaluation efforts.

# Conclusions and Recommendations

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## Conclusions

The need for better sharing of criminal justice information among criminal justice agencies has been documented repeatedly by the Commonwealth's Executive, Legislative and Judicial branches for nearly 30 years. The lack of data sharing has been cited as contributing to inefficiencies in law enforcement, corrections, court operations, juvenile services, victim's services, substance abuse prevention, school and campus violence, firearms violence, and domestic and sexual violence.

Virginia has made incremental improvements in data sharing between criminal justice and public safety agencies. However, past data sharing initiatives focused mainly on improving data sharing between a few agencies for specific, limited purposes. They were not developed within the context of moving Virginia public safety toward an effective, integrated criminal justice data system.

Virginia's public safety and judicial agencies now maintain sophisticated information system which collect and store the types of information that could be shared through an integrated system. However, these systems are not designed to easily exchange information in a way that would support an integrated criminal justice information system.

The information systems now maintained by Virginia's public safety and criminal justice agencies and organizations can serve as a starting point for developing an integrated criminal justice information system.

Other states have made significant progress in developing systems to share and integrate public safety and criminal justice information. Their experience can help guide Virginia's similar effort.

Virginia already has several initiatives underway to improve the sharing and use of data between different secretariats and agencies. These can be leveraged to help guide efforts to better share and use criminal justice data.

## Recommendations

1. Recognize that sharing and integrating data in Virginia's current criminal justice information systems is a long-term project. It cannot be accomplished quickly. Furthermore, if the system is to be maintained, a long-term funding mechanism must be established.
2. Development of an integrated criminal justice information system should not be viewed or managed as a *technology* project. It should be viewed and managed as a project to improve the *business processes* of the Commonwealth's public safety and criminal justice system.
3. Developing an integrated criminal justice information system will require the cooperative efforts of all branches and all levels of government. Local, regional, state and federal agencies will both provide data that feeds the system, and be the users of the data provided

by the system. Representatives of all of these agencies should be represented (at appropriate points) in the planning for such a system.

4. Develop a data governance structure to ensure that information provided by an integrated criminal justice information system is useable and reliable, and that relevant privacy and security issues are addressed. Leverage work now being done in these areas by initiatives such as the Commonwealth Data Steward's Group, the Center for Behavioral Health and Justice, the Virginia Longitudinal Data System, and the Health and Criminal Justice Data Committee.
5. Build upon Virginia's current public safety and criminal justice data systems and infrastructure, to leverage the investments Virginia has already made in these systems. Avoid unnecessary duplication or "reinventing the wheel."
6. To the greatest extent possible, the integrated criminal justice information system should be developed to provide data not just for the daily operations of public safety and criminal justice agencies, but also to provide data for state and local officials using "data-driven" approaches to develop missions, policies, and budgets for these agencies.

# APPENDIX A

## Previous Virginia Reports Citing Need for Criminal Justice Information Sharing

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This list of reports by Virginia agencies from all three branches of government – spanning nearly 30 years – illustrate how frequently the Commonwealth has recognized the need for public safety and criminal justice agencies to share data. As the excerpts from these reports show, the failure to share data degrades the effectiveness of routine, everyday operations by Virginia agencies, and degrades the ability of officials to make informed, long-range policy decisions affecting public safety.

Year	Title	Finding
1988	<i>Report of the Joint Subcommittee Studying the Creation of a Clearinghouse for Juvenile "Criminal" Records</i> House Document No. 36, Report to the General Assembly, 1988	"... the joint subcommittee heard considerable testimony focusing on the needs for complete, accurate and accessible data on the entire criminal justice system. The data is necessary to ensure the development and implementation of policies consistent with the public interest."
1989	<i>Commission on Prison and Jail Overcrowding</i> December, 1989	"... the Commission became acutely aware of the fragmented nature of the criminal justice system. Spread across three branches of government and all levels...the system lacks a consistent policy and comprehensive data for management purposes."
1990	<i>Drug Usage Data Systems Report to the Secretary of Public Safety, 1990</i>	"A major drawback with both current systems and new initiatives is that there is little or no coordination between state agencies and individual data systems. This lack of coordination affects both the consistency and quality of available data ..."
1991	<i>Report of the Joint Subcommittee Studying Acts of Violence and Crime By Students On School Property</i> House Document No. 61, Report to the General Assembly, 1991	"Data concerning the incidence of acts of violence and crime in the public schools had not been previously compiled, was not easily extracted, and is not verifiable for many reasons."
1992	<i>Virginia Summit on Drugs II. The Conference Proceedings</i> August, 1992	"... critical information about offenders is not transferred with them as they move from one step in the criminal justice process to the next."
1993	<i>Report of the Virginia Commission on Youth on The Study of Serious Juvenile Offenders</i> House Document No. 33, Report to the General Assembly, 1993	"Individual juveniles cannot be tracked from the arrest stage through disposition. The State Police's Uniform Crime Reports data system is not tied into the Department of Youth and Family Services intake and learning data systems. Nor are either of these two systems tied into the Department of Corrections' Pre-sentence Investigation System. In addition, data collected at the J&DR and Circuit Court levels are not detailed regarding the transfer of juveniles, nor does this data base tie into any other data system."



1994	<i>Governor's Commission on Violent Crime in Virginia: Final Report 1994</i>	“These systems support individual components of the criminal justice system, but restrict efforts to produce system-wide data. The numerous different ways that offenders and offenses are identified in law enforcement, courts and corrections data systems makes it impossible to track and analyze information about offenders and cases as they progress through the criminal justice system.”
1995	<i>Improvements to the Criminal Justice System</i> Virginia State Crime Commission House Document No. 30, Report to the General Assembly, 1995	“WHEREAS, this information, which is necessary for the operation and administration of the programs of the various criminal justice agencies, is not necessarily shared among them or among any components of the criminal justice system ... Resolved by the RESOLVED by the House of Delegate/Senate, the Senate/House of Delegates concurring, that the Criminal Justice Information Systems Committee be directed to prepare a plan for the development and operation of an integrated criminal justice information system designed to improve the policy decision making process and to insure broader use of the information now being collected and maintained.”
1996	<i>Report of the Commission on Family Violence</i> Commission on Family Violence House Document No. 50, Report to the General Assembly, 1996	The Supreme Court maintains two systems relevant to the tracking of family violence through the legal system. ... Although this system includes codes for spouse abuse-related cases and fields to document case disposition, there is currently no way to aggregate data at the state level nor to communicate case dispositions from court to court. The Criminal Justice Information System (CJIS) is an umbrella system that includes information from several law enforcement-related agencies. Although information collected by State Police, Probation and Parole (PSI), and the Department of Youth and Family Services is included within this system, this information is more readily accessible through the individual data sources that compile the data. The promise of these systems in assessing the movement of family violence cases through the legal system could be improved.
1997	<i>Recommendations for the Development of a Virginia Integrated Criminal Justice Information System</i> The Analytical Sciences Corporation, May, 1997	“It is no secret that attempts have been made in the past at developing an ICJIS in Virginia, and that they have not been very successful ...” “... a realistic and cooperative approach to contributing and relying on common information must exist for ICJIS to succeed. All participants must be prepared for, and accept, this new way of thinking about data.”

1998	<i>Evaluation of the Virginia Juvenile Community Crime Control Act</i> Commission on Youth House Document No. 73 Report to the General Assembly, 1998	“Further, in order for the VJCCA (Virginia Juvenile Community Crime Control Act) to be accountable, data systems on the state and local levels must be established and monitored to ensure the program is meeting its goals.”
1999	<i>Victim Notification Systems</i> Virginia State Crime Commission House Document No. 59, Report to the General Assembly, 19	“While the Virginia Department of Corrections uses a centralized computer operating system, Virginia’s regional jails rely on a wide variety of hardware and software configurations ...” “ <u>Recommendation</u> . The Virginia State Crime Commission recommends that the Secretary of Public Safety issue a request for proposals to determine the cost and feasibility of integrating the Department of Correction’s facilities and Virginia’s regional jails into a victim information and notification system.”
2000	<i>Report on Post-Dispositional Detention</i> Commission on Youth House Document No. 41, Report to the General Assembly, 2000	“Until DJJ has developed and maintained adequate data collection and retrieval mechanisms, the state will continually be hampered in their planning and policy implementation efforts ...” “While detention facilities attempt to segregate juveniles based on age, size or charge, they are often doing so without complete information. This lack of information has resulted in juveniles charged with minor offenses sharing cells with convicted sex offenders. The lack of information puts juveniles and facilities at risk.”
2001	<i>Central Criminal Records Exchange, Richmond, Virginia, Special Report</i> Auditor of Public Accounts, Commonwealth of Virginia January 15, 2001	“The lack of an integrated criminal justice system reduces the timeliness and accuracy of pertinent information. It also can pose a threat to public safety and civil rights.”
2002	<i>Studying Treatment Options for Offenders Who have Mental Health or Substance Abuse Disorders</i> Committee of the Joint Commission of Behavioral Health Care, State Crime Commission, and the Commission on Youth Senate Document No. 25, Report to the General Assembly, 2002	“No comprehensive mechanism exists to systematically collect complete and accurate data on treatment services provided to and needed by adult offenders, or to evaluate the effectiveness of the services.” “Recommendation 12: Request that the Secretary of Public Safety, in conjunction with the Secretary of Health and Human Resources and the Secretary of Administration, develop a plan ... for the collection of data on treatment services provided to and needed by state-responsible offenders and for the evaluation of the effectiveness of treatment services.”
2003	<i>Interim Report - Study of Bail Bondsmen and Bounty Hunters</i> Virginia State Crime Commission House Document No. 21, Report to the General Assembly, 2003	“There is no reliable source of data and information for neither surety bail bondsmen nor property bail bondsmen in Virginia. ... As requests for property bail bondsmen were incomplete and often unavailable from the circuit courts of the Commonwealth, no definitive information was received by the Crime Commission as to how many property bail bondsmen there are operating in the Commonwealth.”

2004	<p><i>Treatment Options for Offenders Who Have Mental Illness or Substance Abuse Disorders</i>          Joint Commission on Behavioral Health Care; Virginia State Crime Commission; Virginia Commission on Youth          Senate Document No. 9, Report to the General Assembly, 2004</p>	<p>Summary Public Safety Evaluation Challenges:</p> <ul style="list-style-type: none"> <li>• Difficult to evaluate current programs that did not have evaluation as part of program design</li> <li>• Offenders must be tracked across different institutional and community settings, between public safety and mental health systems</li> <li>• Agency data systems do not provide data needed for evaluation</li> </ul>
2005	<p><i>Substance Abuse Services Council Annual Report and Plan to the Governor and the General Assembly</i>          Substance Abuse Services Council Report Document No. 242, Report to the General Assembly, December, 2005</p>	<p>“Several states have used available data to address accountability, quality improvement, and fiscally responsible resource allocation. ... These states have linked information systems from various agencies to provide concrete data to measure the effectiveness of services. ... These states have legislated requirements for interagency cooperation in sharing the necessary data. ... Virginia agencies have taken some steps in this direction. The Departments of Corrections and Juvenile Justice have collaborated with the State Police to share data. ... Generally speaking, each of the three agencies has the capability to report data on the costs of service and the number of individuals served. Beyond reporting these “process” indicators, however, the current resources do not allow these three agencies to fully evaluate the effectiveness of treatment. ... A number of factors limit the ability to collect, analyze and report on outcome measures as well as to use these data to improve services. These factors include lack of information technology infrastructure, data quality in existing information systems...”</p>
2006	<p><i>Annual Report and Plan of the Substance Abuse Services Council</i>          Substance Abuse Services Council Report Document No. 213, Report to the General Assembly, October 1, 2006</p>	<p>“Outcome evaluation, while currently very much the focus of federal and state initiatives, is very expensive. It requires extensive record keeping on each program participant, tracking of the participant once the treatment experience is complete, data collection and storage, and analysis. ... Publicly funded substance abuse treatment services in the Commonwealth of Virginia are provided by the following state agencies: the Department of Mental Health, Mental Retardation and Substance Abuse Services; the Department of Juvenile Justice; and the Department of Corrections. ... A number of factors limit the ability to collect, analyze and report on outcome measures. These factors include lack of information technology infrastructure and data quality in existing information systems.”</p>

2007	<p><i>Report on the Offender Population Forecasts (FY2008 to FY2013)</i>  Secretary of Public Safety  Report Document 217, Report to the General Assembly, 2007</p>	<p>“Several recent trends have had an impact on the jail population. ... Regulation of bail bondsmen and bail enforcement agents may have had an impact on the prisoners awaiting trial.”  “These regulations may have been a factor in the growth in the number of persons in jail awaiting trial, particularly in FY2006. Because data on bail bondsmen and bounty hunters is not available for the period prior to regulation, the impact of these policy changes is difficult to quantify.”</p>
2008	<p><i>Mitigating the Costs of Substance Abuse in Virginia</i>  Report of the Joint Legislative Audit and Review Commission To the Governor and The General Assembly of Virginia  House Document No.19, Report to the General Assembly, 2008</p>	<p>“The lack of comprehensive evaluations appears to result from insufficient human resources and technology to facilitate the analysis and sharing of information, although some changes are underway to improve access to data within certain agencies. In addition, the most insightful evaluations will require Virginia agencies to share data with each other, but information systems are currently not structured to facilitate this process.”</p>
2009	<p><i>HJR 113 (2008) Final Report: Study of Virginia’s Juvenile Justice System</i>  Virginia State Crime Commission  House Document No. 9, Report to the General Assembly, 2009</p>	<p>“One of the difficulties in studying the transfer and certification of juveniles to circuit court was the lack of data on juvenile offenders who have been transferred to circuit court. Currently, data is not available from the Supreme Court of Virginia. ... This scenario creates a “black hole,” in that juveniles are not being counted because they are no longer considered juveniles at the time of trial.”  “As there is no statewide databank that captures all of the transfer data by jurisdiction, there is no means, short of going to each locality to review juvenile case files in Commonwealth’s Attorneys’ offices, to obtain this information.”</p>
2010	<p><i>Executive Summary of the Joint Subcommittee to Study Strategies and Models of Substance Abuse Treatment and Prevention</i>  Division of Legislative Services, Joint Subcommittee to Study Strategies and Models for Substance Abuse Prevention and Treatment  Senate Document No. 6, Report to the General Assembly, 2010</p>	<p>“Jail- and community-based recovery and reentry programs for offenders should be developed and funded in the Commonwealth, to reduce rates of recidivism and bring about fiscal savings for the Commonwealth.”  “The work of the Department of Health Professions to initiate and establish interoperability between Virginia’s Prescription Monitoring Program and other states’ programs should be recognized, and the Department should be urged to continue efforts to pursue interoperability.”</p>

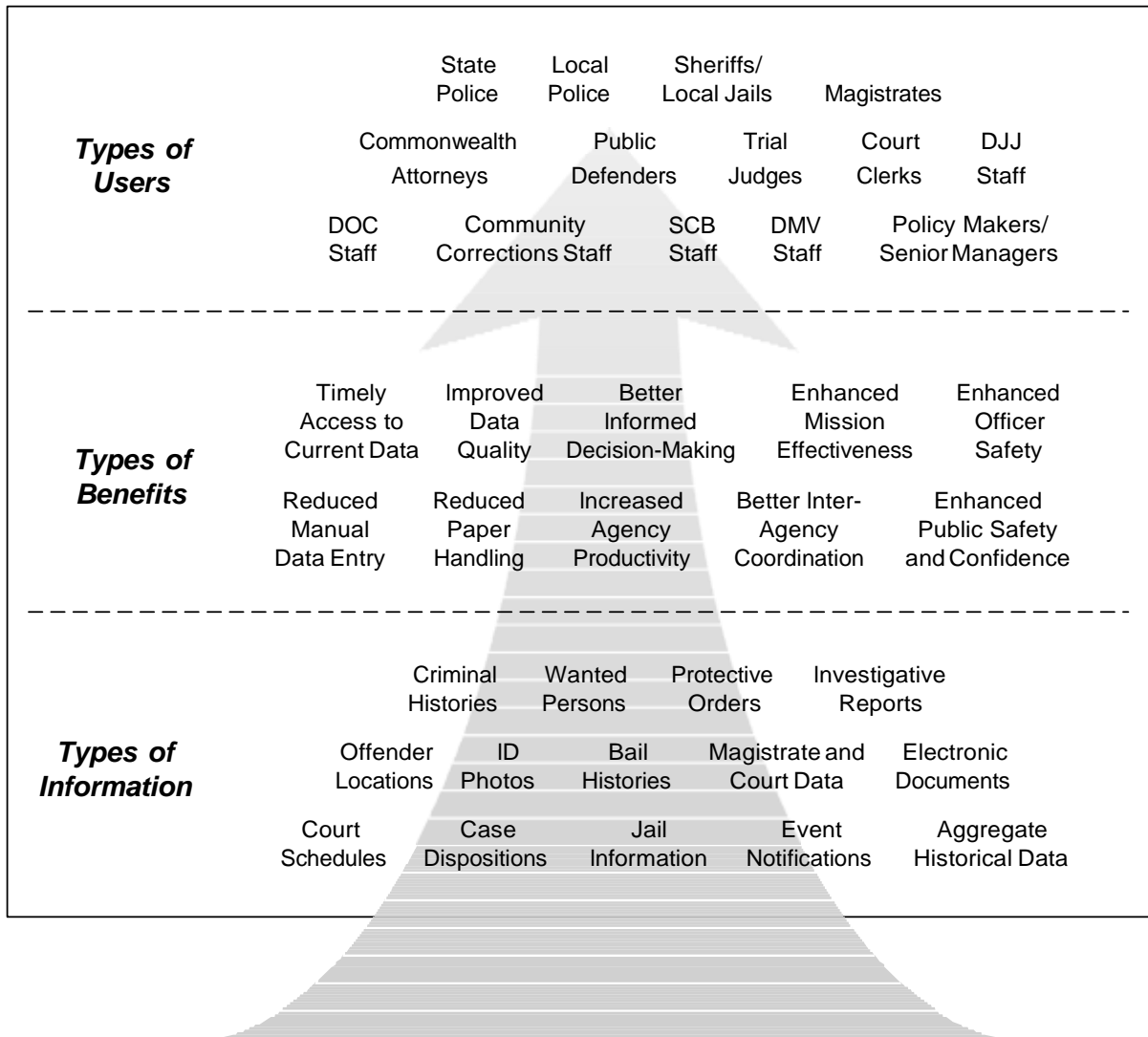
2011	<p><i>A Study of Training and Education Services Available in Jails and Juvenile Detention Centers in Virginia</i> Virginia Department of Criminal Justice Services in conjunction with the Virginia Department of Correctional Education September, 2011</p>	<p>“In regard to vocational and training programs..... DOE is unable to determine a cost-per-student figure. A lack of automated data systems for this population created an information gap ...” “... because education services in jails are provided through a number of different entities and may be funded by various means which are not direct to the facility, identifying exactly how many inmates are served and the amount of funding going towards those services cannot be easily accomplished. Additional study to better determine such information would be a significant undertaking, requiring extensive staff time and resources.”</p>
2012	<p><i>2012 Substance Abuse Services Council Response to Code of Virginia § 2.2-2697</i> Substance Abuse Services Council Report Document No. 265, Report to the General Assembly, 2012</p>	<p>“While the agencies that provide substance abuse treatment may place different priorities on the outcomes experienced by their clients, several measures of program effectiveness should be shared between them, such as employment and recidivism. Consequently, agencies that offer substance abuse treatment should undertake a coordinated effort to obtain needed data from other State agencies.”</p>
2013	<p><i>2013 Substance Abuse Services Council Response to Code of Virginia § 2.2-2697</i> Substance Abuse Services Council. Report Document No. 267, 2013</p>	<p>“Based on a review of the research literature and interviews with staff at numerous State agencies, it appears that robust evaluations of substance abuse services must include participants’ outcomes after they have completed treatment. Yet, obtaining this information can be very challenging because substance abuse has a variety of effects that are captured by numerous agencies whose information systems are not intended to perform an evaluation function. For example, the analysis presented . . . relies on data supplied by nine Virginia agencies, and some agencies have multiple internal information systems. In addition to the complexity of receiving and managing data supplied by multiple agencies, issues arise from attempting to transform existing data into information that can be used for evaluation purposes. Furthermore, because every agency uses a different approach to identifying their clients, it can be difficult to ensure that individuals are correctly matched across agencies.”</p>
2015	<p><i>2014 Annual Report on Domestic and Sexual Violence in Virginia</i> Office of the Attorney General and Department of Law Research Document 1 Report to the General Assembly, December 29, 2014</p>	<p>“Although changes to the protective order laws were enacted on July 1, 2011, due to the inconsistency of data collected by the relevant agencies, it is still somewhat unclear how these changes have impacted the issuance of protective orders as reflected by the available data, including the number of protective orders issued or the number of arrests for protective order violations.”</p>

# APPENDIX B

## Model of Potential Benefits of a Virginia Integrated Criminal Justice Data System

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(From *Business Case for Virginia Integrated Justice: Integrated Criminal Justice Information System*. Virginia Department of Criminal Justice Services. March, 2001).



# APPENDIX C

## Information Sources

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*CORIS Virginia Department of Corrections.* Abilis Solutions Corporation. Retrieved from: [www.coris.net/cms/home/coris\\_oms/case\\_studies/case\\_vadoc](http://www.coris.net/cms/home/coris_oms/case_studies/case_vadoc). October, 2015.

*Final Report of the Senate Unified Courts Technology Study Committee.* Georgia Senate Research Office. November, 2014.

*Georgia Information Sharing Environment Architecture (G-ISE) Solution Architecture.* Tetrus. November, 2010.

*Issues Brief: Overview of State Justice Information Sharing Governance Structures.* National Governors Association Center for Best Practices, July 2009.

*Judicial Information Technology.* Supreme Court of Virginia. Retrieved from: [www.courts.state.va.us/courtadmin/aoc/djit/home.html](http://www.courts.state.va.us/courtadmin/aoc/djit/home.html). October, 2015.

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*Proposal for the 2014 Byrne-JAG Justice Information Sharing Initiative.* Georgia's Criminal Justice Coordinating Council, 2014

*Report to the Chairs of the House of Representatives Appropriations Committee, Chairs of the Senate Based Budget/Appropriations Committee, and Joint Legislative Oversight Committee on Information Technology Fiscal Research.* North Carolina Data Analytics Center, December 2014.

*Tennessee Criminal Justice Information Sharing initiative.* Justice Information Sharing Practitioners Network. June, 2015.

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*Virginia Criminal Information Network.* Virginia Department of State Police. Retrieved from: [www.vsp.state.va.us/CJIS\\_VCIN.shtm](http://www.vsp.state.va.us/CJIS_VCIN.shtm). October, 2015.