

Criminal Justice Information Network Governing Board Report
to the
Chairs of the Senate and House Appropriations Committees,
the
Chairs of the Senate and House Appropriations Subcommittees on Justice and Public Safety
and the
Fiscal Research Division of the General Assembly

April 15, 1998

In 1994 the General Assembly appropriated monies for the study of a Criminal Justice Information Network (CJIN) which was completed and reported to the General Assembly in April 1995. The study identified a comprehensive plan to establish a statewide Criminal Justice Information Network which is detailed in the Criminal Justice Information Network Study Final Report dated April 7, 1995. Based on this plan, the first steps were taken to create CJIN in 1996 when the General Assembly created the CJIN Governing Board (hereafter, Board). The Board was subsequently directed to provide the following report.

During the 1997 Session of the General Assembly, the Board was directed to report on the following:

- “(1) The operations of the Board, including the Board’s progress in developing data-sharing standards in cooperation with State and local agencies and the estimated time of completion of the standards;
- (2) The operating budget of the Board, the expenditures of the Board as of the date of the report, and the amount of funds in reserve for the operation of the Board;
- (3) A long-term strategic plan and the cost analysis for statewide implementation of the Criminal Justice Information Network; and
- (4) The status of the implementation of the mobile data network system, including the amount of funds spent on the system as of the date of the report and the long-term costs of implementing the system statewide.”

The Board was further directed to give an interim report by November 1, 1997.

BOARD OPERATIONS AND DATA-SHARING STANDARDS:

Operations of the Board

Section 23.3 of Chapter 18 of the Session Laws of the 1996 Second Extra Session established the Criminal Justice Information Network Governing Board. The Board was established with an appropriation of \$400,000 in non-reverting funds. Of these funds, \$100,000 was designated for operating funds while the remaining \$300,000 was designated for the Data Sharing Standards project identified within the CJIN Study Final Report. There were no staff positions established for the Board and it was placed within the Department of Justice for administrative purposes only.

During the later months of 1996 the various appointments were made to the Board and Governor James B. Hunt, Jr. called the first meeting on February 17, 1997. During the meeting and as directed by the establishing legislation, Richard Moore, Secretary of the Department of Crime Control and Public Safety, was elected Chairman of the Board. The Board also elected Ronald P. Hawley, Assistant Director of the State Bureau of Investigation, as Vice-Chairman.

Since then the Board has met three times with the next meeting scheduled for Friday, April 24, 1998 in Wilmington, North Carolina. The Board has addressed a number of significant issues during its short tenure. Several of the more significant issues include the project approach for the Data Sharing Standards Project, review of the Mobile Data Network project administered by the North Carolina State Highway Patrol and the guidance of the Statewide Magistrate System being implemented by the Administrative office of the Courts (AOC). In addition, there have been actions taken regarding the Board's direction in funding issues. These have resulted in the support of grant requests as well as funding requests to the General Assembly.

Board actions and discussions are documented in the minutes of the various meetings. Minutes are available upon request of the CJIN office.

Data-Sharing Standards

As envisioned in the CJIN report, the data sharing standards project was initially estimated to cost approximately \$2,000,000 with annual recurring costs of approximately \$792,000. Thus, the \$300,000 appropriated for the project presented one of the earliest decisions for the CJIN Board. The question: how to move forward and identify appropriate Data Sharing Project expectations within the funding limitations. To address this issue, the Board approved a plan to proceed with the Data Sharing Standards Project at its February 17, 1997 meeting by authorizing the submission of a grant proposal to the Governor's Crime Commission. This approach used the \$300,000 appropriated by the General Assembly as matching funds and allowed the Board to obtain a funding level sufficient to begin work on the project. With the additional grant funding of \$287,017, the first year budget is set at \$382,690, and the scope of the project is to target the most critical data first. The total two year project is estimated at \$859,860 with recurring annual costs of \$300,000.

In addition to the funding limitations, the project has been administered in an ad hoc fashion due to the absence of staff. Given the absence of staff to run the project, SBI Assistant Director Ronald P. Hawley has operated as the Board's project manager.

Even with the above noted limitations, the Data Sharing Project is still progressing and has been established to provide for the most effective return on our investment in a timely manner. The Board has hired a project manager and business analyst to manage this project. In addition, an Executive Group has been established to oversee the effort. This group is comprised of state and local officials who will insure that the approach provides for the earliest return on the investment toward establishing critical standards. These individuals, who are volunteers, bring the appropriate balance of state and local interests to the decision making process.

Utilizing valuable input from local officials working as a part of the Executive Team for this project, the main focus of the project is data sharing standards for those data elements used in interfacing with local agencies. The project is scheduled for completion by March 1, 1999. This project plan will allow for the development critical data-sharing standards so as to support key CJIN application development such as the Statewide Magistrate System, commonly referred to as the Criminal Tracking System - Magistrate Module. A copy of the statement of work and the project plan have been provided to fiscal research staff.

OPERATING BUDGET OF THE BOARD

Expenditures and Reserves

The General Assembly appropriated \$100,000 for the operations of the Board during the 1996 Second Extra Session. To date, the Board has utilized \$4,473.19 in travel and per diem expenses. Balance on hand is \$96,429.81 which is non-reverting.

The \$300,000 Data Sharing Project funds are non-reverting and now being utilized as matching money to the federal grant dollars obtained through the Governor's Crime Commission. Including the \$300,000, the total budget for the project is \$859,860. To date, the project has spent \$1,250.50.

Additional CJIN Funding - State Agencies

For the purposes of fully understanding the monies allocated and costs associated with the CJIN effort, there are other funding amounts that should be identified. They are listed by the project for which they are associated. The detail associated with this money will be identified in a subsequent part of this report.

- Criminal Justice Information Network Feasibility Study:
\$769,000 FY 94/95 State Appropriation

- Mobile Data Network (CJIN-MDN) - State Highway Patrol:
\$3,288,000 FY 96/97 State Appropriation
\$4,106,600 FY 97/98 State Appropriation
\$4,000,000 Federal Grant Funds

- Statewide Automated Fingerprint Identification System (SAFIS) - State Bureau of Investigation:
\$1,000,000 FY 97/98 State Appropriation
\$2,500,000 FY 98 Federal Grant Funds

- Statewide Magistrates System (Criminal Tracking System) - Administrative Office of the Courts:
\$2,000,000 FY 97/98 State Appropriation
\$0,396,000 FY 97 Federal Grant Funds
\$4,000,000 FY 98 Federal Grant Funds

- Networking and Security - State Bureau of Investigation:
\$3,500,000 FY 98 Federal Grant

- \$11,163,600 Total State Appropriations
\$14,396,000 Total Federal Grant Funds
\$25,559,600 TOTAL DIRECT FUNDING TO CJIN

Additional CJIN Funding - Local Agencies

The Governor' Crime Commission has awarded over \$6,900,000 in federal grant funds to local law enforcement agencies for CJIN related projects. This includes such items as automated fingerprint capture devices and mobile data terminals, but also includes automated records and crime reporting

systems. In addition to the federal funds awarded by the Crime Commission, the U.S. Department of Justice has also provided over \$20,000,000 in grants directly to local units of government for law enforcement purposes. These funds have been provided as a result of the Local Law Enforcement Block Grant Program, which began in 1996. Local law enforcement agencies have been encouraged by the Crime Commission to use the funds for CJIN related procurements, and many have done so.

Personnel

As previously noted, there have been no permanent positions appropriated to support the Board. Although this was acceptable in the earlier days as the Board began its work, the enormity of the tasks associated with this effort have outgrown the capacity of the various agency representatives to handle the Board's work in an ad hoc fashion. As already noted in this report, the Data Sharing Project has been slower in developing due in part to the fact the project manager had administrative obligations for an entire division within a state agency. Indeed, this report has been handicapped by these same limitations.

As the Board began its work, there were the slow moving organizational requirements of getting started that allowed time to work Board needs in with the daily efforts of the various agency representatives. However, the Board is now fully functional and has been extremely successful in moving the CJIN plan forward through the acquisition of both State and Federal funding. This success has greatly increased the work of the Board to the point that it is no longer possible for the ad hoc efforts of the past to support and move it forward. The time available from the various agency representatives to address Board needs is now required by the agencies to focus on the development pieces of the plan, i.e., Statewide Tracking, Networking Security, and Statewide AFIS.

In order to respond to the ever growing demands of CJIN, the Secretary of Crime Control and Public Safety Richard Moore authorized the use of an existing position within the State Highway Patrol to be allocated as a Administrative Assistant. This person will be used to handle the growing administrative demands on the Board. In addition, the administrative assistant will provide support for Secretary Richard Moore and Assistant Director Ronald P. Hawley who currently function cooperatively as the "Executive Director" of CJIN.

Although this additional support will assist with the efforts of CJIN, it will not replace the need for a full time Executive Director who will direct the daily activities of CJIN. It is therefore hoped, that as the General Assembly reviews this report and reflects on the growing demands of this developing network, it will see the need for and support permanent positions for the Director and the Administrative Assistant positions.

CJIN Board Membership

During a recent presentation to the Appropriations Subcommittees on Justice and Public Safety by Senator Thomas LaFontine Odom and Mecklenburg County officials, the issue of CJIN Board membership was raised. This issue is also a source of concern for many of the Judicial Branch agencies whose elected members feel there is inadequate representation. Based on these facts, this issue has been included in the report for the purpose of fully informing the General Assembly.

Table 1 lists the current CJIN Governing Board membership, including Board member and who he or she was appointed by. Table 2 lists the CJIN Governing Board membership as initially proposed by the CJIN Study Committee.

TABLE 1
CJIN Governing Board Membership
 (Current Membership)

Board Member	Appointed By:
Director or employee of State correction agency	Governor
Employee of NC Department of Crime Control and Public Safety	Governor
Representative recommended by the Association of Chiefs of Police	Governor
Two representative of general public recommended by the President Pro Tempore of the Senate	General Assembly
Individual who is a member of or working directly for the governing board of a North Carolina municipality and recommended by the President Pro Tempore of the Senate	General Assembly
Two representative of general public recommended by the Speaker of the House of Representatives	General Assembly
Individual who is a member of or working directly for the governing board of a North Carolina county recommended by the Speaker of the House of Representatives	General Assembly
Employee of the Attorney General	Attorney General
Representative recommended by the North Carolina Sheriffs' Association	Attorney General
Director or employee of the Administrative Office of the Courts	Chief Justice of the North Carolina Supreme Court
Either a Clerk of Superior Court or District Attorney	Chief Justice of the North Carolina Supreme Court
Chair or member of the Information Resource Management Commission (IRMC)	Chair of the Information Resource Management Commission
Active member of the North Carolina Chapter of Public Communications Officials International	President of the North Carolina Chapter of Public Communications Officials International

TABLE 2
CJIN Board Membership
(Membership As Initially Proposed)

Board Member	Appointed By:
Director or employee of State correction agency	Governor
Employee of NC Department of Crime Control and Public Safety	Governor
Representative recommended by the Association of Chiefs of Police	Governor
Representative of general public recommended by the President Pro Tempore of the Senate	General Assembly
Individual who is a member of or working directly for the governing board of a North Carolina municipality and recommended by the President Pro Tempore of the Senate	General Assembly
Representative of general public recommended by the Speaker of the House of Representatives	General Assembly
Individual who is a member of or working directly for the governing board of a North Carolina county recommended by the Speaker of the House of Representatives	General Assembly
Employee of the Attorney General	Attorney General
Representative recommended by the North Carolina Sheriffs' Association	Attorney General
Director or employee of the Administrative Office of the Courts	Chief Justice of the North Carolina Supreme Court
Clerk of Superior Court	Chief Justice of the North Carolina Supreme Court
Two judges of the trial division of the General Court of Justice	Chief Justice of the North Carolina Supreme Court
District Attorney	Chief Justice of the North Carolina Supreme Court
Chair or member of the Information Resource Management Commission (IRMC)	Chair of the Information Resource Management Commission

It should be noted that this original recommendation for Board membership included additional representatives from the Judicial Branch of Government due to the large number of constituents involved with criminal justice and public safety. In developing this recommendation, considerable effort was exerted to insure balances between the branches of government as well as the levels of government. Although the Board has yet to take an official position on the issue of proper representation, members have expressed concern and further debate is planned.

LONG-TERM STRATEGIC PLAN AND COST ANALYSIS INCLUDING THE MOBILE DATA NETWORK

In the original CJIN Study Final Report there were a number of initiatives that were identified that, if completed, would establish a solidly integrated Criminal Justice Information Network. Those initiatives, as identified in the CJIN Study Final Report, are listed below and provide the framework for addressing the long-term plan and cost analysis.

Management: Governing Board

Infrastructure: Data Sharing Standards
CJIN Network Security
TCP/IP (Networking Protocols)
End-User Technology
Mobile Data and Voice Network (CJIN-MDN and CJIN-VTN)

Applications: Statewide Automated Fingerprint Identification System (SAFIS)
Statewide Magistrate System (Criminal Tracking System - Magistrate Module)
Statewide Identification Index
Statewide Integrated Criminal History Repository
Statewide Warrant System
Courtroom Automation
Juvenile Justice Information Systems

Your support in the 1996 legislative session through the establishment of a Board established the foundation for this work and considerable progress has been made to date. For example, the last phases of developing the Mobile Data Network are scheduled for completion between 2000 and 2001. The SAFIS is looking to deploy its first phase of live scan devices in 1999 and could complete state coverage within the same time frame if the second phase funding is obtained. Finally, the Criminal Tracking System - Magistrate Module has been piloted and is the foundation for developing the system requirements. In each of the cases noted above, the Board was able to utilize the leadership and support provided by the North Carolina General Assembly to seek additional funding to further the individual projects.

For the next five years, the Board will focus its attention on the completion of the projects currently underway while identifying the next initiatives that would provide the most return on the investments already made. Given the ever changing technological scene and the Board's experience in its first years of existence, to strategically plan beyond five years would not be productive. However, keep in mind that for beyond five years, the Board has a long-term objective which remains as valid as it was when first established.

- "To identify alternatives for development of a statewide criminal justice information network that will enable a properly authorized user to readily access and effectively use information regardless of its location in a national, state, or local databases."

The Board will continue to follow this objective as it explores the next steps beyond the five years.

The following details the progress made with CJIN to date. It includes original initiatives that became projects such as the Statewide Magistrate System (Criminal Tracking System - Magistrate Module), Statewide Automated Fingerprint Identification System (SAFIS), Courtroom Automation, and the Mobile Data Network. Further, there will be discussion on those initiatives that have either received or requested funding, but have not begun. These include the Network and CJIN Security, Statewide Mobile Voice or Voice Trunking Network (CJIN-VTN), Juvenile Justice Information Systems, and End-User Technology. There has been much progress made and the next five years should continue that trend. As these projects approach completion, the CJIN Governing Board will focus its attention to developing a single comprehensive Statewide Criminal History Repository.

Statewide Magistrate System (Criminal Tracking System - Magistrate Module)

An automated magistrate system would allow magistrates to produce warrants and other processes on a real time basis and would reduce the amount of effort required to produce a single process. Standardized language formerly written for each warrant could be automatically filled in upon the keying of codes in predefined fields. An automated magistrate system would also reduce inefficiency by eliminating redundant data entry and would free up clerk time currently spent re-entering warrant information into the AOC's Criminal Court Information System (CIS). Information would also be much more accurate if it is only being entered once.

Standard offense codes keyed into the system by a magistrate, tied to the appropriate statutory citation and offense information could be printed on charging documents. Magistrates would no longer have to look up charging information from manual tables. This would reduce the errors from copying charging codes and text from manual tables.

With an interface to the AOC's CIS Criminal System, all warrant information could be captured in a timely manner which would greatly benefit clerks - who would not have to rekey the documents and law enforcement - who would be able to search statewide on outstanding warrants.

As of the date of this report, \$2,400,000 has been received for this project. In addition, there is another \$4,000,000 identified in the FY 1998 Federal budget. This funding will allow for this project to move forward with development and is scheduled for completion by January 1, 2001. This completion date is contingent upon the additional funding of \$2,350,000.

When the Magistrate System is fully deployed, it is expected to cost \$8,750,000. The recurring support costs are estimated at approximately \$2,250,000 per year for 5 years.

Statewide Automated Fingerprint Identification System (SAFIS)

This project is designed to provide for the electronic submission of fingerprint data to the State Bureau of Investigation from every county in North Carolina. The submission of electronic data will contribute greatly to CJIN in two extremely significant ways. First, the data can be transferred and examined within acceptable time frames. This will allow for positive identification of arrested individuals within minutes rather than the current situation which takes months. It is this positive identification that will allow for better decisions about the individuals being processed and could result in saving lives. Second, the speed and quality of electronic data will allow for timely updates to the criminal history record. Completing this statewide system for electronic submission is a critical step toward a comprehensive integrated criminal history record. In the interim, the data will be exchanged

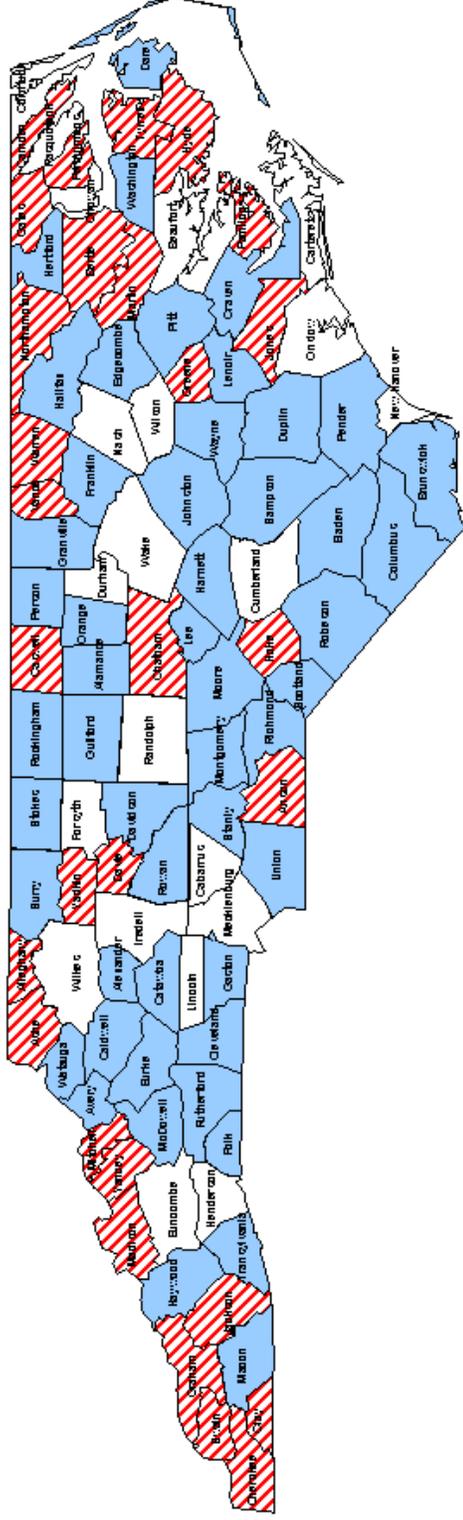
electronically from the SAFIS to the Criminal History Record Information (CHRI) housed at the State Bureau of Investigation.

The implementation of this project has begun and is planned in two phases. The first phase has been supported with the State appropriation of \$1,000,000. This is being used to match for a Governor's Crime Commission grant and will allow for the use of an additional \$2,250,000. With this money approximately 48 additional counties will receive Live Scan devices. The implementation for these is scheduled to begin in the third quarter of 1998 and run through March 1999. Completion of phase two of this project is contingent on the \$2,500,000 funding request which will be included in the CJIN expansion budget requests for FY 98/99. If funding is received, phase two should begin in the fourth quarter of 1998 and be completed by December 1999. There will be recurring support costs associated with the system. These costs are to be covered by leasing costs paid by the local departments.

The SAFIS for criminal submission of fingerprinting is expected to cost \$6,750,000 when fully implemented and recurring costs for networking and maintenance of approximately \$1,310,400.

NC SAFIS

Live Scan Implementation



□ Current Live Scan (21 Counties)

■ Live Scan - Phase I (50 Counties) Completion December 31, 1998

▨ Live Scan - Phase II (29 Counties) Completion July 1, 1998 - June 30, 1999

CHART

Criminal Justice Information Network
SAFIS – Live Scan Implementation
Phase One 1997 – 1998
(broken down by county -- did not convert)

CHART

Criminal Justice Information Network
SAFIS – Live Scan Implementation
Phase Two 1998 – 1999
(broken down by county -- did not convert)

CHART

Criminal Justice Information Network
SAFIS – Live Scan Implementation
(broken down by Current Situation, Phase One, Phase Two, and Totals -- did not convert)

Mobile Data Network

The State Highway Patrol has utilized a logical, phased-in approach as its method of deployment for expanding the service area of the Criminal Justice Information Network - Mobile Data Network (CJIN-MDN). A central site to house the CJIN-MDN message switch, radio network controllers, and telecommunication peripherals was established at the State Highway Patrol Information Management Unit. This facility is located on state government property jointly occupied by the State Highway Patrol and State Bureau of Investigation in Raleigh, NC. The Patrol utilizes technical and logistical assistance from the SBI Division of Criminal Information, National Crime Information Center, Administrative Office of the Courts, Department of Correction, Division of Motor Vehicles, State Information Processing Service (SIPS), and local government agencies to assist in managing the network.

Full statewide coverage was initiated with the implementation of CJIN-MDN Phase One during fiscal year 1996-97. Phase One, funded through state appropriations and a federal grant from the Governor's Crime Commission (Drug Control and System Improvements - Byrne Grant #130-196-15B-D038), established the network control center and furnished mobile data service following the Interstate 85 and Interstate 95 corridors from Virginia to the South Carolina state lines. Phase One cost: \$2,500,000, provides service to 20 North Carolina counties; serves a population of 3,784,858 citizens; and, made CJIN access possible for 217 criminal justice agencies in the coverage area.

CJIN-MDN Phase Two, currently being installed, will be completed by June 30, 1998. Phase Two, funded through state appropriations and a federal grant from the Governor's Crime Commission (Drug Control and System Improvements - Byrne Grant # 130-1-97-15B-D-080), is expanding the mobile data coverage area to an additional 32 counties; serving an additional population of 2,169,081; and, making CJIN access possible for another 285 criminal justice agencies. Phase Two cost: \$2,900,000.

The initial phases of CJIN-MDN are being built on the concept of "Shared Resources". Costs to all participating agencies are reduced by simply sharing available resources that constitute the network. In formulating partnerships with other state agencies and local governments, the State Highway Patrol shares resources such as engineering support, network monitoring and troubleshooting, currently licensed 800 MHZ frequencies (spectrum), a premier microwave communication system used for data transport, and other network administrative responsibilities in return for their sharing of resources such as tower sites, base station controllers, leased telecommunication lines, digital sending units, and access to 800 MHZ Radio Frequency (RF) infrastructures that are already in place. A standard Memorandum of Agreement is used to validate the sharing of resources, provides an itemized list of resources shared with the network, and identifies which agency is providing the resource.

It is projected that CJIN-MDN can be completed in four phases, with a proposed fifth phase to be implemented if needed.

CJIN-MDN Phase Three is currently planned for fiscal year 1998-1999. The Governor's Crime Commission has recommended a federal grant to assist in funding CJIN-MDN Phase Three. Phase Three will provide mobile data service to 23 additional counties; will serve a population of 855,887 citizens; and will make CJIN access possible for 144 criminal justice agencies in those counties. Phase Three, as proposed, will be completed by June 30, 1999 and will cost \$2,900,000.

CJIN-MDN Phase Four is planned for implementation during fiscal year 1999-2000, unless funding is provided sooner. Phase Four, as proposed, will expand mobile data coverage into the last 25 counties of North Carolina. This phase will serve a population of 449,417 citizens and extend CJIN access to an additional 128 criminal justice agencies. Phase Four is projected to cost \$2,800,000.

CJIN-MDN Phase Five is an optional phase. Phase Five has been proposed in an effort to insure complete and sound mobile data coverage throughout North Carolina. Once the network has been fully deployed, a thorough engineering analyst will be conducted to evaluate and determine if any geographic areas of the state are receiving weak or unacceptable RF signals. If so, funding provided by Phase Five will be used to provide “fill in” base station transmitters to resolve the problem, or, to add additional capacity in areas experiencing excessive activity. Phase Five, if completely utilized, will cost \$1,200,000.

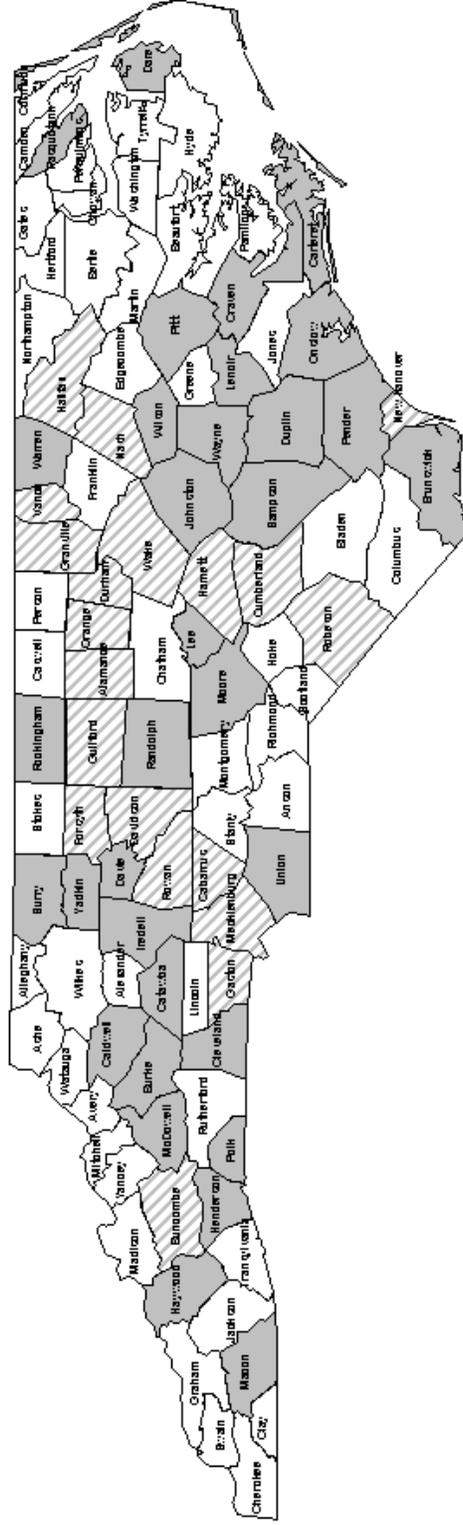
To insure full and long term satisfaction, the CJIN-MDN technology provides North Carolina with a complete solution to current requirements and provides a data communications road map that will grow with the state’s changing needs well into the next century. The involvement of the criminal justice and public safety community is essential to the success of CJIN-MDN. The integrated mobile data network will provide services to criminal justice agencies, regardless of size or location within the state. It provides a method for interagency networking and data communications utilizing advanced technology, while sharing basic resources.

CJIN-MDN, once fully implemented, is projected to cost a total of \$12,500,000. Recurring costs should not exceed \$250,000 per year. The attached spreadsheet itemizes costs for each phase and summarizes total cost for the multi-phase project.

CJIN

Mobile Data Network

Phase One
1996- 1997



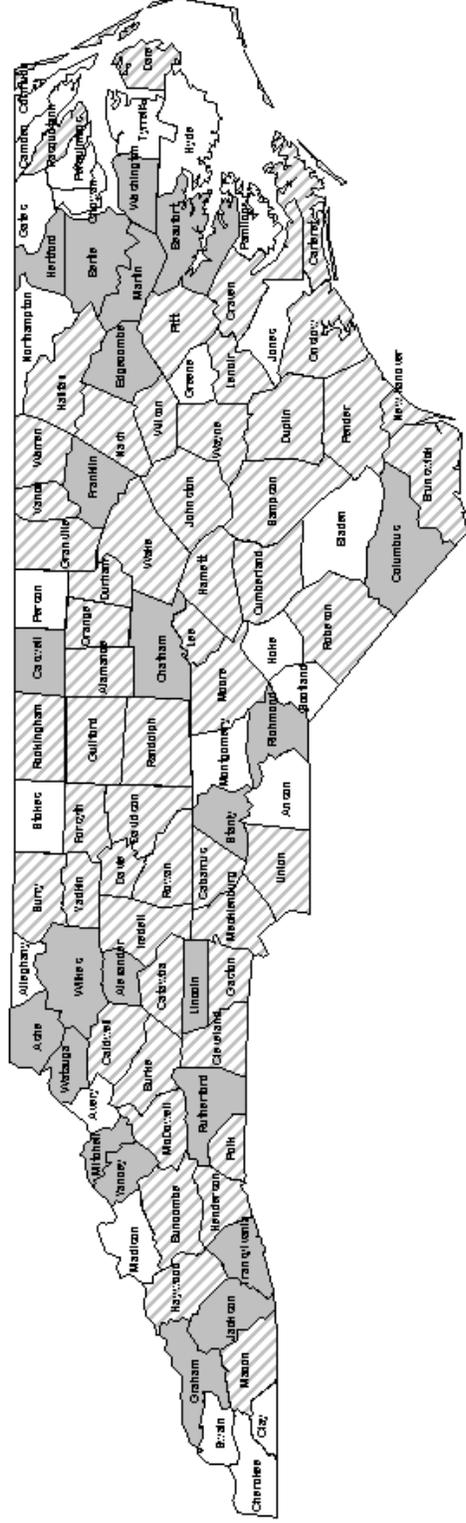
Phase two '97-'98

Covered in previous Phase

CJIN

Mobile Data Network

Proposed Phase Three
1998- 1999



Proposed Phase Three for '97-'99

Covered in previous Phase

CHART

Criminal Justice Information Network
Mobile Data Network
(broken down by phase -- did not convert)

CHART

Criminal Justice Information Network
Mobile Data Network
Summary
(did not convert)

Courtroom Automation

The CJIN Study Final Report identified several “milestone” projects towards the development of a statewide criminal justice information network. One of the four “milestone” projects was courtroom automation. The Administrative Office of the Courts is currently implementing statewide a new application called CourtFlow that will be the first step in automating courtrooms. CourtFlow allows courtroom clerks to use information previously entered into the AOC’s CIS Criminal System regarding a criminal case to produce in the courtroom, electronic copies of judgment forms. New information such as sentencing information, fines, restitution, etc., is captured by the CourtFlow and used to update the AOC’s CIS Criminal System.

CourtFlow improves the processing of criminal cases in superior court by allowing the courtroom clerk to update or complete any demographic information regarding a defendant while they’re physically present in the court, eliminates redundant data entry by the clerk’s office in preparing final judgment and sentencing forms, and expedites the preparation of the judgment, which, in turn, expedites the release of the defendant from the local jail to the Department of Correction.

The General Assembly appropriated funding during its 1997 session to the AOC for the purchase of equipment needed to implement this system statewide in all 127 courtrooms. The 1997 Judicial Department Reserve for Technology included \$531,340 for equipment for CourtFlow.

The target date for statewide implementation of this system is June 1, 1998. The CourtFlow system is now in test in Cumberland, Wake, and Orange Counties. Recurring costs are estimated at \$250,000.

Networking and CJIN Security

The integration of the CJIN requires that disparate systems are linked together so that data can be passed throughout the system as the various agencies perform their individual functions. It is the passing and sharing of this data that will enable the creation of information which is then made available to the criminal justice practitioner in a timely manner. When armed with this information, those involved in the administration of criminal justice will be able to make better decisions thus improving operations. It is the improved operations that will lead to reduced crime and increased safety of the public.

In order to safeguard the integrity of the various systems as they are integrated into the CJIN, the integrated system must utilize the appropriate security. This will include firewall protection, encryption, and authentication. When these tools are deployed in a well-planned approach, the integrated system will be protected by a comprehensive security plan.

The FY 1998 federal appropriation of \$3.5 million will allow for the development of the initial security components. Firewalls will be installed to protect the various disparate systems as a “first-line” approach to protection. These firewalls will be deployed in conjunction with encryption to protect the integrity of the data and information being passed throughout the network. This encryption will protect against unwanted access to the information while it travels throughout the network. At the same time, the funding will allow for the first phases of user authentication which will include a detailed assessment of options to identify the best approach. This will enable CJIN to ensure that access to the network is only by authorized personnel.

To assist with the deployment of the above mentioned tools, funding will also be used to obtain the security expertise necessary to bring industry “best practices” to the table for planning and implementation. Further the network infrastructure will be enhanced to the level required to deploy these security tools.

The development of these is planned for two phases over several years and should begin in the third quarter of 1998. Phase two begin in the first quarter of 2000 and should be completed in mid year of 2001.

CJIN-VTN

The CJIN-800 Voice System (CJIN-VTN) is planned with the same successful phased approach used to deploy the CJIN Mobile Data Network. Seven phases, running from 1998 through 2005, will complete the deployment of a seamless voice network in North Carolina. With the implementation of this system, the state will have interagency voice communication to better serve our citizens. The total costs for 800MHz voice is estimated at \$137,362,260.

The present system used by the State Highway Patrol and other agencies has reached its useful life span. Vendors are phasing out low band radios and discontinuing the manufacture of replacement parts. Local and State Government Agencies have been investigating alternatives for many years. Some local governments have already replaced existing radio systems. Prior to the CJIN plan, there was no comprehensive communication plan which resulted in an inability to communicate among agencies. Because North Carolina does not have a single statewide voice communication network, officers cannot talk to their counterparts across their own county much less to those across the state.

The CJIN Study Final Report and other studies have recommended a partnership approach to voice communications. We will take advantage of existing systems and fixed based equipment already purchased by local governments. This shared approach will result in savings to our citizens. The implementation of a statewide system can be a costly and risky task if careful planning and readiness activities are not accomplished. A similar approach taken by Michigan and Delaware in building a statewide voice infrastructures gives North Carolina some guidance in going forward.

The State Highway Patrol and other agencies will replace only critical components of existing systems and shift equipment around the state as necessary to accommodate an orderly and economical move to 800 MHZ. When possible, we will use existing state and local tower sites and equipment to save dollars. To implement this technology, all criminal justice agencies in the state will have to work together. The cost of this system demands a partnership. We will try to use limited resources as effectively as possible.

The plan as currently envisioned consists of seven phases. The State Highway Patrol will manage the 800 MHZ voice network under the direction of the Board.

Phase One will enhance existing local 800 MHZ voice systems and interconnect these systems. By using existing resources, we can save money and be more effective in our approach. The existing systems include, Charlotte, Raleigh, Greensboro, Salisbury, Rocky Mount, and several other areas, which includes fifteen counties. A zone switch located at the State Highway Patrol in Raleigh will enable all these officers to talk directly to each other.

With the six other phases, the entire state will be connected and agencies will have direct communication. Officers from any agency will be able to communicate all over the state.

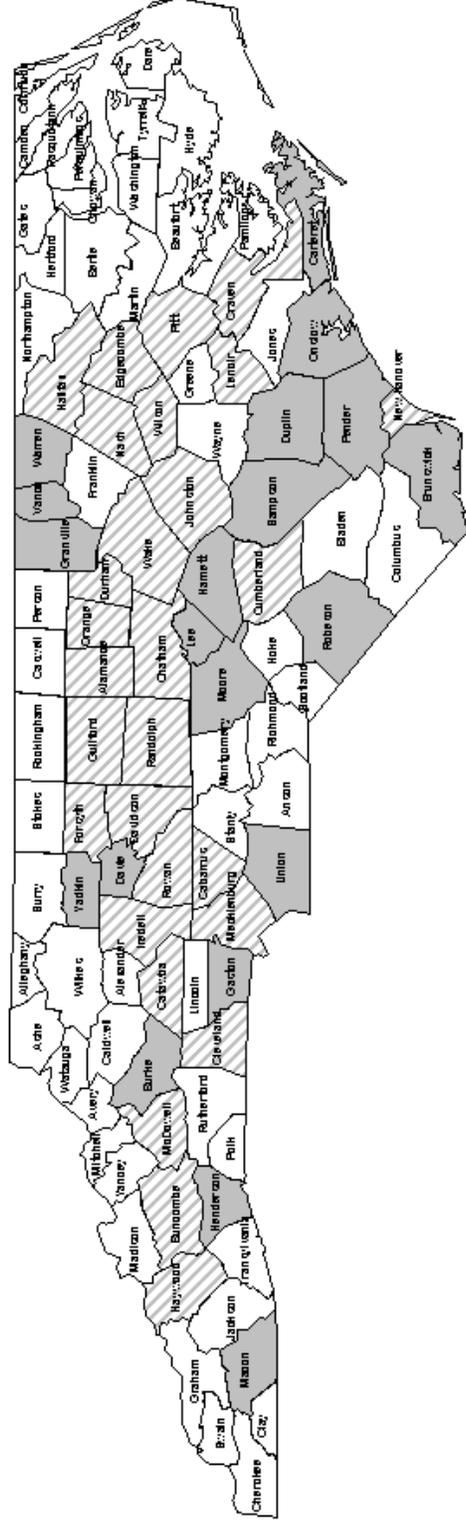
Criminal Justice Information Network
Voice Trunking Network
Phase One 1998-1999

Site No.	County	Proposed Sites this Phase	Population	Square Miles	No. of Criminal Justice Agencies	Cost Per County
1	Buncombe	1	190,987	659.33	15	190,000
2	Cabarrus	1	111,313	364.08	66	190,000
3	Cleveland	1	88,939	468.19	13	190,000
4	Craven	1	86,053	701.47	8	190,000
5	Cumberland	1	300,893	657.26	10	190,000
6	Davidson	1	138,700	548.28	6	190,000
7	Durham	1	196,709	297.74	8	190,000
8	Edgecombe	1	56,651	505.69	6	190,000
9	Guilford	2	373,561	650.77	12	380,000
10	Lenior	1	59,068	402.32	7	190,000
11	Mecklenburg	1	584,856	527.77	15	190,000
12	Nash	1	84,986	539.60	11	190,000
13	New Hanover	1	140,785	184.54	10	190,000
14	Rowan	1	119,108	519.02	11	190,000
15	Wake	1	528,405	854.36	27	190,000
	SUBTOTALS	16	3,061,014	7,880.42	225	3,040,000
Troop C Console update						250,000
Master Smart Zone Switch						2,500,000
Microwave System Interconnect, 16 sites @ 175,000						2,800,000
Microwave System Upgrade, 6 sites @ 175,000						1,050,000
Recurring Line Cost						60,000
Subtotal Mainframe and Transport Cost						6,660,000
Total Projected Cost, Phase One						9,700,000

Criminal Justice Information Network
Voice Trunking Network
Phase Two 1999-2000

Site No.	County	Proposed Sites this Phase	Population	Square Miles	No. of Criminal Justice Agencies	Cost Per County
1	Alamance	1	115,567	433.14	8	190,000
2	Chatham	1	43,267	707.91	10	190,000
3	Catawba	2	126,653	395.66	12	190,000
4	Forsyth	1	280,951	412.48	10	225,000
5	Halifax	1	57,902	723.69	10	205,000
6	Haywood	3	49,296	554.85	7	595,000
7	Iredell	1	104,104	574.12	8	190,000
8	Johnston	1	95,571	795.41	13	205,000
9	McDowell	1	37,082	437.39	6	190,000
10	Orange	1	108,386	400.27	8	190,000
11	Pitt	1	119,661	656.52	11	190,000
12	Randolph	1	115,913	788.83	9	190,000
13	Wilson	1	67,907	374.27	10	215,000
	SUBTOTALS	16	1,322,260	7,254.54	122	2,965,000
		Onmi Link Switch to Connect 2 Zones with Software				5,000,000
		Smart Zone Switch with Software				2,500,000
		Troop D, G & B Console Update				750,000
		Microwave System Interconnect, 7 sites @ 205,000				1,435,000
		Microwave System Upgrade, 25 @ 175,000				4,375,000
		New Equipment Buildings 10 @ 35,000				350,000
		Recurring Line Cost				75,000
		Technical Support, Training and Test Equipment				650,000
		Alarm System Interface				95,000
		Installation and Integration				500,000
		Subtotal Mainframe and Transport Cost				15,730,000
		250 Mobile/Portable Radios @ 3850.00 ea				962,500
		250 Mobile Chargers @ 550 ea				137,500
		Subtotal for Mobile Radios				1,100,000
		Total Projected Cost, Phase Two				19,795,000

Criminal Justice Information Network Voice Trunking Network

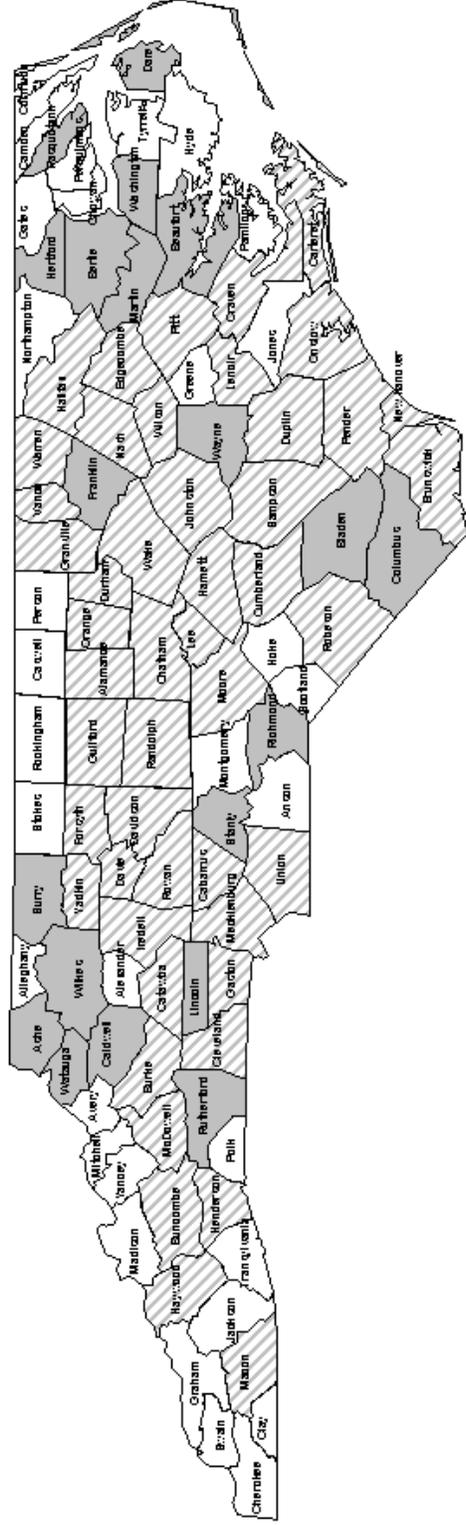


- Proposed Phase 3 2000-2001
- Covered in Previous Phase

NC STATE HIGHWAY PATROL
C & L DIVISION

Criminal Justice Information Network Voice Trunking Network Phase Three 2000-2001						
Site No.	County	Proposed Sites this Phase	Population	Square Miles	No. of Criminal Justice Agencies	Cost Per County
1	Brunswic	3	61,836	860.49	16	590,000
2	Burke	2	81,694	504.45	10	380,000
3	Carteret	2	58,799	525.57	15	380,000
4	Davie	1	30,000	266.59	5	190,000
5	Duplin	1	42,490	819.22	11	190,000
6	Gaston	2	179,945	357.29	15	380,000
7	Granville	2	41,530	533.50	8	380,000
8	Harnett	2	77,759	601.11	9	380,000
9	Henderson	3	77,990	374.39	5	570,000
10	Lee	1	46,150	259.28	6	190,000
11	Macon	3	26,424	516.58	5	570,000
12	Moore	1	67,293	701.25	15	190,000
13	Onslow	2	149,569	762.61	10	380,000
14	Pender	1	35,476	874.82	7	190,000
15	Robeson	2	112,238	949.19	13	380,000
16	Sampson	2	50,525	946.85	9	380,000
17	Union	2	98,575	639.28	7	380,000
18	Vance	1	40,277	248.79	5	190,000
19	Warren	1	18,115	427.10	5	190,000
20	Yadkin	1	33,409	335.74	8	190,000
	SUBTOTALS	35	1,330,094	11,504.1	184	6,670,000
		Zone Switch with Software				2,500,000
		Antennas and Coaxial Cables				375,000
		Troop E, F & H Console Update				750,000
		Microwave System Interconnect, 25 sites @ 195,000				4,875,000
		Microwave System Upgrade, 9 @ 175,000				1,575,000
		New Equipment Buildings 22 @ 35,000				770,000
		Emergency Generators 16 @ 15,000				240,000
		Communications Towers 4@ 140,000 ea				560,000
		Technical Support, Training and Test Equipment				650,000
		Alarm System Interface				125,000
		Installation and Integration				1,150,000
		Subtotal Mainframe and Transport Cost				13,570,000
		250 Mobile/Portable Radios @ 3850.00 ea				962,500
		250 Mobile Chargers @ 550 ea				137,500
		Subtotal for Mobile Radios				1,100,000
		Total Projected Cost, Phase Three				21,340,000

Criminal Justice Information Network Voice Trunking Network



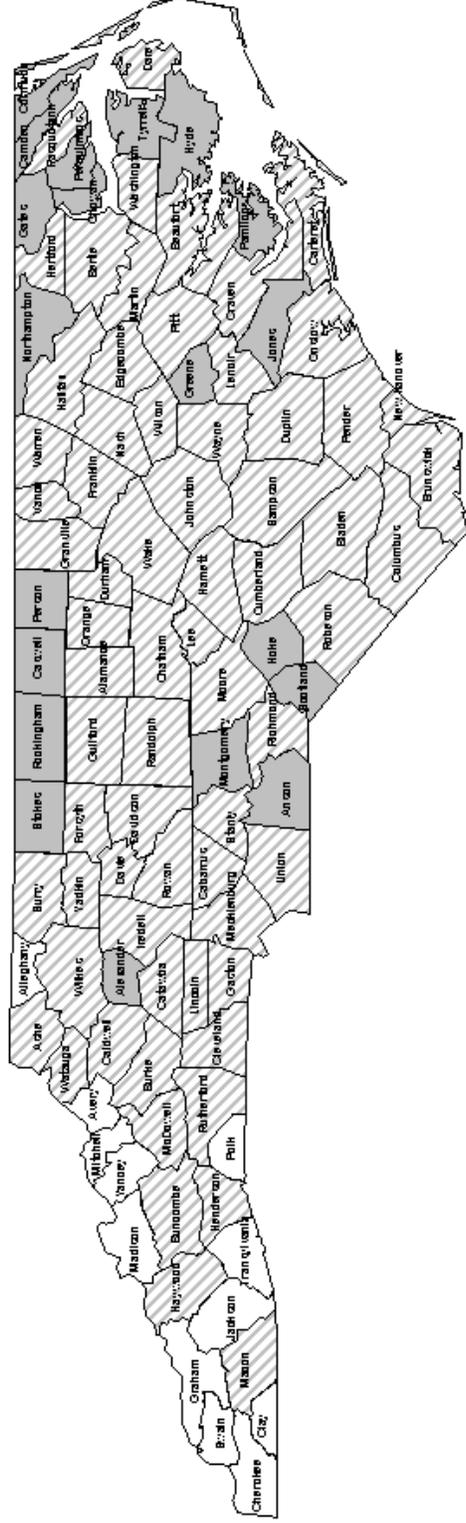
- Proposed Phase 4 2001-2002
- ▨ Covered in Previous Phase

NC STATE HIGHWAY PATROL
C & L DIVISION

Criminal Justice Information Network
Voice Trunking Network
Phase Four 2001-2002

Site No.	County	Proposed Sites this Phase	Population	Square Miles	No. of Criminal Justice Agencies	Cost Per County
1	Ashe	2	23,109	426.16	6	380,000
2	Beaufort	2	44,044	826.10	10	380,000
3	Bertie	2	20,622	700.93	7	380,000
4	Bladen	2	29,686	878.92	8	380,000
5	Caldwell	1	73,934	471.17	7	190,000
6	Columbus	2	51,336	938.44	9	380,000
7	Dare	4	26,061	390.79	10	690,000
8	Franklin	2	42,036	494.38	7	380,000
9	Hertford	1	22,454	356.09	7	190,000
10	Lincoln	1	56,415	298.26	4	190,000
11	Martin	1	27,059	460.76	6	190,000
12	Richmond	2	45,044	477.19	6	380,000
13	Surry	2	65,178	539.34	7	380,000
14	Wayne	2	110,889	553.70	11	380,000
15	Pasquotank	1	34,158	228.00	5	190,000
16	Rutherford	2	59,139	567.62	8	380,000
17	Stanley	2	54,553	395.78	10	380,000
18	Washington	2	13,863	331.63	5	380,000
19	Watauga	2	40,366	314.05	7	380,000
20	Wilkes	2	61,790	752.21	6	380,000
SUBTOTALS		37	901,736	10,401.52	146	6,580,380
Zone Switch with Software						2,500,000
Troop A Console Update						250,000
Microwave System Interconnect, 25 sites @ 195,000						4,875,000
Microwave System Upgrade, 7 @ 175,000						1,225,000
New Equipment Buildings 26 @ 35,000						910,000
Emergency Generators 25 @ 15,000						375,000
Communications Tower 1 @ 175,000						175,000
Communications Towers 4 @ 140,000 ea						560,000
Technical Support, Training and Test Equipment						650,000
Alarm System Interface						65,000
Annual Reoccurring cost for system maintenance						2,000,000
Installation and Integration						1,150,000
Subtotal Mainframe and Transport Cost						14,735,000
300 Mobile/Portable Radios @ 3850.00 ea						1,155,000
300 Mobile Chargers @ 550 ea						165,000
Subtotal for Mobile Radios						1,320,000
Total Projected Cost, Phase Four						22,635,380

Criminal Justice Information Network Voice Trunking Network



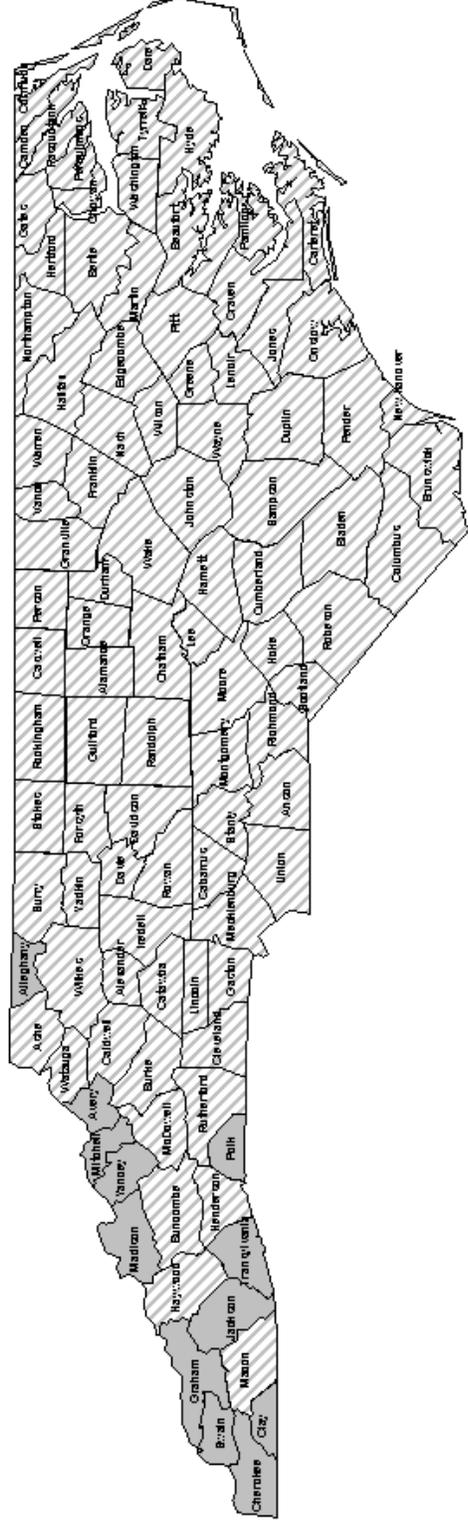
- Proposed Phase 5 2002-2003
- ▨ Covered in Previous Phase

NC STATE HIGHWAY PATROL
C & L DIVISION

Criminal Justice Information Network
Voice Trunking Network
Phase Five 2002-2003

Site No.	County	Proposed Sites this Phase	Population	Square Miles	No. of Criminal Justice Agencies	Cost Per County	
1	Alexander	1	30,494	258.64	4	190,000	
2	Anson	2	24,236	533.14	7	380,000	
3	Caswell	1	21,502	427.51	4	190,000	
4	Camden	2	6,273	240.49	3	380,000	
5	Chowan	1	14,068	181.55	4	190,000	
6	Currituck	2	16,012	255.59	3	380,000	
7	Gates	2	9,856	338.25	4	380,000	
8	Greene	1	16,725	266.37	3	190,000	
9	Hoke	1	27,890	391.16	4	190,000	
10	Hyde	3	5,288	624.22	3	570,000	
11	Jones	1	9,595	470.01	5	190,000	
12	Montgomery	2	23,582	489.55	8	380,000	
13	Northampton	2	20,453	538.32	12	380,000	
14	Pamlico	2	11,896	340.73	4	380,000	
15	Perquimans	1	10,736	246.40	5	190,000	
16	Person	2	32,020	398.02	4	380,000	
17	Rockingham	2	88,379	568.64	8	380,000	
18	Scotland	2	35,013	319.33	6	380,000	
19	Stokes	2	41,162	452.04	7	380,000	
20	Tyrrell	1	3,917	406.82	3	190,000	
	SUBTOTALS	33	449,097	7,746.78	101	6,270,000	
						Zone Switch with Software	2,500,000
						Antennas and Coaxial Cable	277,000
						Microwave System Interconnect, 33 sites @ 195,000	6,435,000
						New Equipment Buildings 19 @ 35,000	665,000
						Emergency Generators 21 @ 15,000	315,000
						Communications Tower 3 @ 175,000	525,000
						Communications Towers 4@ 140,000 ea	560,000
						Technical Support, Training and Test Equipment	950,000
						Alarm System Interface	60,000
						Annual Reoccurring cost for system maintenance	2,500,000
						Installation and Integration	1,150,000
						Subtotal Mainframe and Transport Cost	15,937,000
						300 Mobile/Portable Radios @ 3850.00 ea	1,155,000
						300 Mobile Chargers @ 550 ea	165,000
						Subtotal for Mobile Radios	1,320,000
						Total Projected Cost, Phase Five	23,527,000

Criminal Justice Information Network Voice Trunking Network



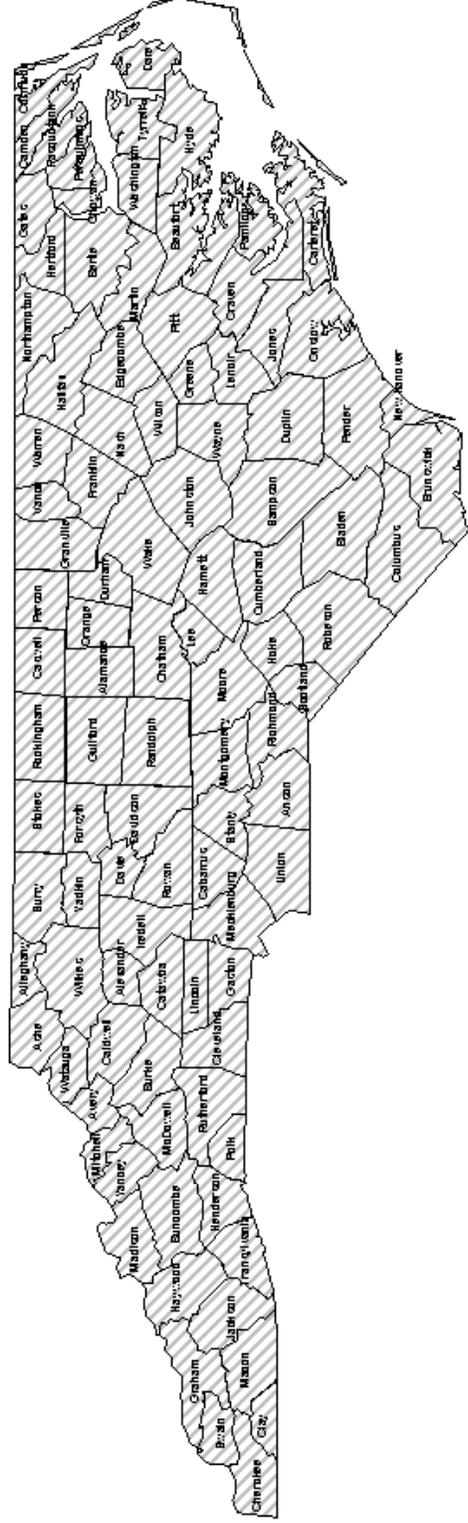
- Proposed Phase 6 2003-2004
- Covered in Previous Phase

NC STATE HIGHWAY PATROL
C & L DIVISION

Criminal Justice Information Network
Voice Trunking Network
Phase Six 2003-2004

Site No.	County	Proposed Sites this Phase	Population	Square Miles	No. of Criminal Justice Agencies	Cost Per County
1	Allegany	2	9,564	234.52	5	380,000
2	Avery	2	15,269	247.07	8	380,000
3	Cherokee	3	22,787	451.83	5	570,000
4	Clay	2	7,727	312.91	3	380,000
5	Graham	2	7,469	288.69	3	380,000
6	Jackson	3	28,890	490.52	5	570,000
7	Madison	3	17,699	451.31	7	570,000
8	Mitchell	2	14,518	222.00	5	380,000
9	Polk	1	15,824	238.30	6	190,000
10	Swain	3	11,575	525.98	5	570,000
11	Transylvania	3	27,489	378.28	4	570,000
12	Yancey	2	16,231	313.60	5	380,000
	SUBTOTALS	28	195,042	4,155.01	61	4,940,380
		Zone Switch with Software				2,500,000
		Antennas and Coaxial Cable				255,000
		Microwave System Interconnect, 32 sites @ 155,000				4,960,000
		New Equipment Buildings 21 @ 35,000				735,000
		Emergency Generators 24 @ 15,000				360,000
		Communications Tower 4 @ 105,000				420,000
		Communications Towers 10 @ 55,000 ea				550,000
		4 Additional 5 channel repeaters for fill-in @ 190,000 ea				760,000
		Technical Support, Training and Test Equipment				950,000
		Alarm System Interface				45,000
		Annual Reoccurring cost for system maintenance				2,500,000
		Installation and Integration				1,350,000
		Subtotal Mainframe and Transport Cost				15,385,000
		350 Mobile/Portable Radios @ 3850.00 ea				1,347,000
		350 Mobile Chargers @ 550 ea				192,000
		Subtotal for Mobile Radios				1,539,000
		Total Projected Cost, Phase Six				21,864,380

Criminal Justice Information Network Voice Trunking Network



 Proposed Phase 7 2004-2005

Adding additional sites where needed and changing loaded 5 channel sites to 100 channel sites

NC STATE HIGHWAY PATROL
C & L DIVISION

Criminal Justice Information Network
Voice Trunking Network
Phase Seven 2004-2005

Zone Switch with Software	2,500,000
Antennas and Coaxial Cable	425,000
Microwave System Interconnect, 18 sites @ 155,000	2,790,000
New Equipment Buildings 15 @ 35,000	525,000
Emergency Generators 15 @ 15,000	225,000
Communications Towers where needed	1,120,000
12 Sites converted from 5 to 10 channel sites	2,280,000
20 Additional 5 channel repeaters for fill-in @ 190,000 ea	3,800,000
Technical Support, Training and Test Equipment	925,000
Annual Reoccurring cost for system maintenance	2,500,000
Installation and Integration	550,000
Maintenance and Administrative Personnel	200,000
Subtotal Mainframe and Transport Cost	17,840,000
150 Mobile/Portable Radios @ 3850.00 ea	577,500
150 Mobile Chargers @ 550 ea	82,500
Subtotal for Mobile Radios	660,000
Total Projected Cost, Phase Seven	18,500,000

Juvenile Justice Information Systems

The topic of juvenile justice has become an extremely important issue for the state particularly as it relates to juvenile delinquency. The Governor's Commission on Juvenile Crime and Justice has developed recommendations for addressing the issues associated with this problem. The Commission's Final Report, dated March 10, 1998, includes numerous recommendations regarding the information system needs of the various programs intended to address juvenile crime. It is anticipated that the Governor will recommend funding to begin development of the information systems needed to support the state programs.

Prior to the establishment of the Governor's Commission on Juvenile Crime and Justice, the Governor's Crime Commission funded a project entitled the Juvenile Justice Information Planning Project, now referred to as the Juvenile Information Network Planning Project. It has been the mission of that project to "develop a plan for a statewide information system that will 1) provide timely accurate information regarding juveniles to the courts, law enforcement officers, and those providing treatment and other services for youth in the juvenile justice system; and 2) relate effectively to the criminal justice (adult) system." The project's report, Juvenile Information Network Interim Report, dated February 26, 1998, projected that costs for an automated information network that would include delinquent and undisciplined juveniles and juveniles in conditions of abuse neglect, and dependency are approximately \$20,000,000. Estimates for maintaining the information network range from \$1,000,000 to \$2,000,000 annually. The Juvenile Information Network Planning Project is recommending that initial application development support Court Counselors, Clerks of Superior Court, and Division of Youth Services Programs. Completion of these applications is projected for July 2000. Cost estimates for first year projects are \$5,000,000. The detail of this estimate is being developed in support of the Governor's Budget.

End-User Technology

Another important component towards building a statewide CJIN is upgrading end-users technology. This involves the replacement of mainframe terminals, older personal computers with newer technology, or providing computers to first time users to support CJIN applications. As criminal justice agencies continue to deploy applications that push processing to the desktops, users will need state of the art technology to take full advantage of these applications. As well, newer technology will help in implementing the envisioned security measures needed for providing essential data integrity.

Future Projects

As noted earlier in the report, there are several projects which will be addressed at a future date. Two of these are the Statewide Integrated Criminal History Repository and the State Identification Index. The criminal history repository is a critical piece but dependant on the same agencies currently engaged in the other projects. Further, these same agencies are engaged in remediation required to make existing systems Year 2000 compliant. Given the current CJIN projects and Year 2000 compliant projects, it would not be responsible on the part of the Board to attempt to move this project forward. It appears that it would be at least two to three years before significant planning and project development could begin. Given the earliest possible starting time and the ever changing costs associated with such development, it is more accurate to report that the Board will be advancing this project around the year 2002.

The State Identification Index is closely related to a similar project currently under development by the Information Management Resource Commission (IRMC). Because of the similarities in the two efforts and the need for the same individuals to work with both projects, the Board has chosen to support the IRMC project. As their project develops, CJIN agencies will be working with the IRMC to ensure an ability to incorporate the needs of CJIN. It appears this is another opportunity to leverage existing efforts

and resources through partnership with those agencies involved. It is this partnership that remains a mainstay of the CJIN effort.

Total Cost Estimates To Date

The costs known to CJIN are identified below. They reflect the estimates that can be accurately provided at this time.

Project	Implementation Cost	Recurring Cost
Governing Board	\$ 200,000	\$ 200,000
Data Sharing	\$ 859,860	\$ 300,000
Mobile Data	\$ 12,500,000	\$ 250,000
Voice Trunking Network	\$ 137,362,260	\$ 2,500,000
CJIN Security and Networking	\$ 3,500,000	\$ 100,000
Courtroom Automation	\$ 531,340	\$ 250,000
Magistrate System	\$ 8,750,000	\$ 2,250,000
Statewide AFIS	\$ 6,750,000	\$ 1,310,400
Juvenile Justice Network	<u>\$ 20,000,000</u>	<u>\$ 1,500,000</u>
TOTALS	\$ 190,453,460	\$ 8,660,400

Summary

From the information provided, it is apparent considerable progress is being made in following the CJIN plan. The support and leadership from the North Carolina General Assembly has enable the Board to be extremely successful in finding additional funding so that the cost of this effort can be spread across the various revenue sources. With this support, several key pieces of the project are either nearing completion or well underway. More and more, state and local criminal justice and public safety users are recognizing the benefits of CJIN and add their support to the effort.

This success has not gone without notice at the state and national levels. The Federal Bureau of Investigation (FBI) has identified the CJIN Mobile Data Network as one of only three participants in their testing for the development of image transfer to vehicles. This is part of a major new system for the FBI's National Crime Information Center (NCIC) known as NCIC 2000.

Recently the Federation of Government Information Processing Councils (FGIPC) selected CJIN as an award recipient. The award, the 1998 FGIPC Intergovernmental Open Systems Solutions Award, recognizes those efforts which have demonstrated success in accomplishing intergovernmental service delivery to citizens.

Finally, the United States Department of Justice, Office of Chief Council, had a representative visit North Carolina to discuss the CJIN project. Having reviewed the CJIN Study Final Report, this individual reported that with the exception to costs, the report was as current as the day it was completed. Based on the CJIN plan and the state's progress, North Carolina was invited to participate in a two-day conference addressing issues associated with integrating criminal justice information.

The course has been charted and steady progress is being made. The CJIN Governing Board eagerly awaits an opportunity to present this report.