

# M E E T I N G   A G E N D A

## NEBRASKA INFORMATION TECHNOLOGY COMMISSION

Wednesday, June 27, 2007, 9:30 a.m.  
University of Nebraska-Kearney  
Nebraskan Student Union-Chancellor's Dining Room  
1013 West 27th Street  
Kearney, Nebraska

### AGENDA

Meeting Documents:  
Click the links in the agenda  
or [click here](#) for all documents (75 Pages, 1.33 MB)

9:30 a.m.	Call to Order, Roll Call, Notice of Meeting, & Open Meetings Act Information Approval of <a href="#">February 22, 2007 Minutes*</a> Public Comment
9:40 a.m.	Informational Updates <ul style="list-style-type: none"><li>• LB 1208 Implementation<ul style="list-style-type: none"><li>- Network Nebraska</li></ul></li><li>• Public Safety Wireless Update</li><li>• 2007 Annual Information Technology Services Report</li><li>• 2007 Statewide Technology Plan</li></ul>
10:00 a.m.	<a href="#">Update</a> : Recommendations on Technology Investments for the FY2007-2009 Biennium
	Reports from the Councils and Technical Panel A. Community Council Report <ul style="list-style-type: none"><li>• <a href="#">Membership*</a></li><li>• <a href="#">Update: Podcasting Across Nebraska</a></li></ul> B. eHealth Council Report <ul style="list-style-type: none"><li>• <a href="#">Charter*</a></li><li>• <a href="#">Membership*</a></li><li>• eHealth Clearinghouse</li></ul> C. Education Council Report <ul style="list-style-type: none"><li>• <a href="#">Membership*</a></li></ul>

10:10 a.m.	<p>D. State Government Council Report</p> <ul style="list-style-type: none"> <li>• <a href="#">Charter Amendment</a>*</li> <li>• 2007 Cyber Security Conference</li> <li>• Email</li> </ul> <p>E. Technical Panel Report</p> <ul style="list-style-type: none"> <li>• Standards &amp; Guidelines: <a href="#">Remote Administration of Internal Devices</a>*</li> <li>• Standards &amp; Guidelines: <a href="#">Minimum Server Configuration</a>*</li> <li>• Standards &amp; Guidelines: <a href="#">SMTP Routing Standard</a>*</li> <li>• Standards &amp; Guidelines: <a href="#">DNS Forwarding Standard</a>*</li> <li>• Government Technology Collaboration Fund Grant – <a href="#">Nebraska Geospatial Data Sharing and Web Services Network</a>*</li> </ul>
11:00 a.m.	Other Business
11:05 a.m.	<p>Legislative Performance Audit</p> <p>[Note: This agenda item may require the Commission to hold a closed session (Neb. Rev. Stat. § 84-1410).]</p>
11:30 a.m.	<p>Adjournment</p> <p>(Tour of UNK Technology Efforts and Accomplishments. Lunch will be provided for NITC Commissioners, staff and advisory groups representatives after the tour.)</p>

\* Indicates action items.

(The Nebraska Information Technology Commission will attempt to adhere to the sequence of the published agenda, but reserves the right to adjust the order of items if necessary and may elect to take action on any of the items listed.)

The meeting notice and agenda were posted to the NITC website and the [Public Meeting Calendar website](#) on June 21, 2007.

# M E E T I N G M I N U T E S

## NEBRASKA INFORMATION TECHNOLOGY COMMISSION

Thursday, February 22, 2007, 1:30 p.m.  
Nebraska Department of Education – Board Room  
301 Centennial Mall South-6th Floor, Lincoln, Nebraska

Videoconference Site [Neb Rev. Stat. § 84-1411(2)]  
Chadron State College - Burkhiser Technology Complex-Room 109, Chadron,  
Nebraska

### ***PROPOSED MINUTES***

#### **MEMBERS PRESENT:**

**Lieutenant Governor Rick Sheehy**, Chair

**Linda Aerni**, Chief Executive Officer, Community Internet Systems

**Pat Flanagan**, Information Services Manager, Mutual of Omaha

**Lance Hedquist**, City Administrator, South Sioux City

**Dr. Dan Hoelsing**, Superintendent, Laurel-Concord, Coleridge, & Newcastle Public Schools

**Mike Huggenberger**, Director-Netlink, Great Plains Communications

**Dr. Doug Kristensen**, Chancellor, University of Nebraska-Kearney

**Dr. Janie Park**, President, Chadron State College

**Trev Peterson**, Attorney, Knudsen, Berkheimer, Richardson, and Endacott, LLP

#### **CALL TO ORDER, ROLL CALL, NOTICE OF MEETING, & OPEN MEETINGS ACT INFORMATION**

The meeting notice and agenda was posted to the NITC website and the [Public Meeting Calendar website](#) on February 15, 2007.

#### **APPROVAL OF NOVEMBER 1, 2006 MINUTES**

Commissioner Peterson moved to approve the [NOVEMBER 1, 2006 MINUTES](#) as presented. Commissioner Park seconded. Roll call vote: Aerni-Yes, Flanagan-Yes, Hedquist-Yes, Hoelsing-Yes, Huggenberger-Yes, Kristensen-Yes, Park-Yes, Peterson-Yes, and Sheehy-Yes. Results: Yes-9, No-0. Motion carried.

#### **PUBLIC COMMENT**

There was no public comment.

#### **INFORMATIONAL UPDATES**

## *LB 1208 Implementation*

- *Statewide Scheduling System ([RFP 1683](#) - Background Information Only)*
- *Networking, Edge Devices, Internet Access, Transport ([RFP 1752](#) - Background Information Only)*
- *Codec Device RFP*

By statute, state agencies are required to go through an RFP and bidding process for any large scale purchases to determine the most cost effective options. This process was utilized to solicit bids for statewide pricing to replace existing distance education systems of approximately 97 of Nebraska's northeast area schools, ESUs, and higher education partners. The distance education network, as it exists now, is mainly JPEG or MPEG2 video with T1 Internet connections. Three bids were received for the Wide Area Networking portion of the RFP. The contract was awarded to Windstream and Qwest. Depending on their service area, schools will contract with either Windstream or Qwest. Phase II and III of the bidding will encompass the rest of the state and it will be at this time that we will look at lowering costs for Phase I schools. The Codec RFP will be released within the next couple of weeks. Implementation of Phase I is scheduled to be completed by August 10, 2007 for all 97 northeast Nebraska locations.

Commissioners expressed concern about an increase of costs to schools that didn't file E-rate or that haven't signed to be part of the LB 1208 project. Lieutenant Governor Sheehy stated that when the upgrade project was envisioned, it was understood that there may be a cost increase for some schools and 100% of the schools in the northeast are expected to participate.

*E-rate filing:* The Office of the CIO staff was cautious to abide by all E-rate requirements. The pricing wasn't the same for all schools due to the bids that the state received. The Office of the CIO will be working with schools to get costs down through E-rate or other avenues. It saved the K-12 entities about \$5,000 per month not to cost average, due to the reimbursement rate of some of the high need schools. The E-rate application deadline is February 7th.

*Legislative Performance Audit.* Ms. Decker informed the commission that the Legislative Audit Committee will be conducting a Performance Audit of the NITC. Performance Audit Reports are prepared by the Legislative Audit and Research Office. These reports include examinations of state agency performance and audits of the implementation of public policy initiatives as part of the Legislature's oversight role.

## **STATEWIDE TECHNOLOGY PLAN – [STRATEGIC INITIATIVES AND ACTION ITEMS UPDATE](#)**

### ***New Initiative: eHealth\****

eHealth technologies include telehealth, electronic health records, and health information exchange. President Bush has made the adoption of health information technology including electronic health records a national priority. Nebraska is nationally recognized for its efforts to establish a statewide telehealth

network. Establishing an eHealth Council will help the State of Nebraska to build upon the success of the Nebraska Statewide Telehealth Network as it begins to address issues related to the adoption of electronic health records and health information exchange.

The proposed Statewide Technology Plan states: "A state-sponsored eHealth initiative is needed in Nebraska to:

- Assess the current adoption of eHealth technologies;
- Make recommendations on how the state should promote the adoption of eHealth technologies;
- Provide coordination among eHealth initiatives in Nebraska; and
- Enable the State of Nebraska to more competitively seek funding for eHealth initiatives."

Commissioner Aerni asked about funding to support the eHealth Council. Lt. Governor Sheehy replied that the group will operate without additional funding. Establishing a group which focuses on eHealth may also better position the State of Nebraska to obtain grant funding for eHealth-related projects.

Commissioners Kristensen commented that security and privacy of health information are concerns that must be addressed.

**Commissioner Peterson moved to adopt the new eHealth initiative in the Statewide Technology Plan. Commissioner Kristensen seconded. Roll call vote: Sheehy-Yes, Peterson-Yes, Park-Yes, Kristensen-Yes, Huggenberger-Yes, Hoelsing-Yes, Flanagan-Yes, and Aerni-Yes. Results: Yes-9, No-0. Motion carried.**

**eHealth Council\***, Anne Byers. Ms. Byers asked the Commissioners to address issues relating to the eHealth Council. Staff have proposed structuring the membership of the eHealth Council to include representatives of:

- The State of Nebraska
- Health Care providers
- eHealth Initiatives
- Third Party Payers and Employers
- Consumers
- Resource Providers, Experts, and Others if Deemed Appropriate by the NITC

Information on the proposed eHealth Council has been shared with members of the Telehealth Subcommittee and the Health Information Security and Privacy Collaboration Steering Committee. Based on the input received, staff would like to clarify that our intention is to include the telehealth network as an eHealth initiative. Staff have also received feedback suggesting that public health be a separate category. Ms. Byers clarified that health care providers includes hospitals, physicians, pharmacists, and other providers. The eHealth Council may also involve additional stakeholders through work groups or stakeholder meetings.

**Commissioner Flanagan moved to authorize the creation of an eHealth Council and to give them the charge in the meeting materials and to include**

**public health in the membership. Commissioner Peterson seconded. Roll call vote: Aerni-Yes, Flanagan-Yes, Hedquist-Yes, Hoelsing-Yes, Huggenberger-Yes, Kristensen-Yes, Park-Yes, Peterson-Yes, and Sheehy-Yes. Results: Yes-9, No-0. Motion carried.**

During discussion, the number of members on the eHealth council was discussed. Commissioner Hedquist suggested amending the motion to set the membership of the eHealth Council to no more than 25 members.

**Commissioner Hedquist offered a friendly amendment to the motion that the eHealth Council should not to exceed 25 members. Amendment was accepted by Commissioners Flanagan and Peterson. Roll call vote on amendment to that the eHealth Council should not to exceed 25 members: Roll call vote: Flanagan-Yes, Aerni-Yes, Sheehy-Yes, Peterson-Yes, Park-Yes, Kristensen-Yes, Huggenberger-Yes, Hoelsing-Yes, and Hedquist-Yes. Results: Yes-9, No-0. Motion carried.**

The Commission charged the staff to develop a membership roster to be approved by the NITC at their next meeting.

#### ***New Initiative: Public Safety Communications System\****

Public Safety Communications Initiative, Brenda Decker. LB 343, directed the OCIO Network Services to work on interconnectivity and interoperability of public safety communications systems, and established an Interoperability Board. Governor Heineman has asked the legislature to fund these efforts. As stated in the document, the initiative's objectives are to:

- Develop the Nebraska Public Safety communication system, and conduct the procurement process for the system contract.
- Continue developing statewide communications interoperability for public safety.

**Commissioner Kristensen moved to adopt and include the new Public Safety Communications Initiative in the Statewide Technology Plan. Commissioner Hedquist seconded. Roll call vote: Hoelsing-Yes, Huggenberger-Yes, Hedquist-Yes, Kristensen-Yes, Flanagan-Yes, Park-Yes, Aerni-Yes, Sheehy-Yes, and Peterson-Yes. Results: Yes-9, No-0. Motion carried.**

***Completed Initiative: Statewide Synchronous Video Network\****. Mr. Rolfes provided a brief update regarding the Statewide Synchronous Video Network initiative and the work that has been completed to date. The video compression protocol standard was developed by the NITC and has been implemented statewide. With this initiative almost complete and the advent of the statewide scheduling software for education entities, Mr. Rolfes explained that this was an opportunity for the NITC to pause and reflect on the progress that has been made and to retire a strategic initiative. There will likely be a need to update the standard sometime in the future, as technologies continue to change.

**Commissioner Hoelsing moved to remove the Statewide Synchronous Video Network initiative from the Statewide Technology Plan. Commissioner**

**Huggenberger seconded. Roll call vote: Park-Yes, Kristensen-Yes, Huggenberger-Yes, Hoelsing-Yes, Flanagan-Yes, Aerni-Yes, Sheehy-Yes, and Peterson-Yes. Results: Yes-9, No-0. Motion carried.**

*Other Initiatives: Updates from the NITC Advisory Councils and Technical Panel*

The Advisory Councils and Technical Panel did not make any major changes to the strategic initiatives action items. Over the past two years, approximately 30 action items have been completed.

**Commissioner Hedquist moved to approve the Advisory Councils and the Technical Panel actions items for the Strategic Initiatives. Commissioner Flanagan seconded. Roll call vote: Sheehy-Yes, Peterson-Yes, Park-Yes, Kristensen-Yes, Huggenberger-Yes, Hoelsing-Yes, Flanagan-Yes, and Aerni-Yes. Results: Yes-9, No-0. Motion carried.**

## **REPORTS - COMMUNITY COUNCIL**

Anne Byers, Community Information Technology Manager

**TIGER Grants.** Anne Byers reported that three TIGER mini grants were completed last summer. The two remaining grants are nearing completion. The Aurora Technology Center has completed their grant. Their TIGER Mini Grants has resulted in the two other larger grants. Burt County Extension is working with local businesses to build a community business portal in Oakland, Nebraska. The project has experienced some problems with their first contractor, but has contracted with the University of Nebraska DEAL Laboratory to set up the portal. Progress being made and the project should be completed within a few months.

**Podcasting Across Nebraska.** Anne Byers reported that the four participants in the Podcasting Across Nebraska program – South Sioux City, Lincoln County/North Platte Convention and Visitors Bureaus, and the Panhandle Public Health Department and partners received their equipment from Lt. Governor Sheehy and are completing podcast training. South Sioux City has created their first podcast. Ms. Byers showed Commissioners South Sioux City's travel and tourism podcast. A video about the program produced by the UNL New Media Center is also available.

Links to the podcast and video are below:

- [South Sioux City Cardinal Cast](#)--If you experience problems viewing this, you may need to [download Quicktime](#).

- [UNL New Media Center video of South Sioux City training and presentation](#)--If you experience problems viewing this, you may need to download [Flash](#).

## **REPORTS - EDUCATION COUNCIL**

Tom Rolfes, Education I.T. Manager

The primary focus of discussion at the Education Council meetings has been the

implementation of LB1208 covered earlier in the meeting. In addition to LB 1208, the council reviewed the strategic plan action items. Mr. Rolfes notified the Commission that the Education Council would be presenting at least eight membership renewals or updates at their next meeting.

## **REPORTS – STATE GOVERNMENT COUNCIL**

Rick Becker, Government I.T. Technology Manager

The State Government Council reviewed the strategic plan action items and the standards appearing later in the agenda.

[Revised Charter](#). Membership increased from 24 to 25 members with the addition of the Department of Banking. Some of the changes to the charter were made to reflect current statutes. Other changes were technical in nature.

**Commissioner Peterson moved to approve the Revised State Government Charter as presented. Commissioner Kristensen seconded. Roll call vote: Kristensen-Yes, Huggenberger-Yes, Hoelsing-Yes, Hedquist-Yes, Flanagan-Yes, Aerni-Yes, Sheehy-Yes, Peterson-Yes, and Park-Yes. Results: Yes-9, No-0. Motion carried.**

## **REPORTS – TECHNICAL PANEL**

Walter Weir, Chair, Chief Information Officer, University of Nebraska

The Technical Panel has met monthly since the last NITC meeting. Project reviews were done for the HHSS Project Proposals for FY2007-2009 Biennium and the DL Event Clearinghouse & Scheduling Software Purchase. The Technical Panel is recommending approval of the Standards and Guidelines for Remote Access and an Emergency Information Page. Commissioners were given an opportunity to discuss the standards.

**Commissioner Hoelsing moved to approve the [Remote Access Standard](#). Commissioner Flanagan seconded. Roll call vote: Park-Yes, Hoelsing-Yes, Peterson-Yes, Hedquist-Yes, Sheehy-Yes, Flanagan-Yes, Kristensen-Yes, Aerni-Yes, and Huggenberger-Yes. Results: Yes-9, No-0. Motion carried.**

**Commissioner Hedquist move to approve the [Emergency Information Page Guidelines](#). Commissioner Aerni seconded. Roll call vote: Flanagan-Yes, Peterson-Yes, Aerni-Yes, Sheehy-Yes, Hedquist-Yes, Park-Yes, Hoelsing-Yes, Huggenberger-Yes, and Kristensen-Yes. Results: Yes-9, No-0. Motion carried.**

## **OTHER BUSINESS**

There was no other business.

## **ADJOURNMENT**

Staff will be in contact with Commissioners to determine a late May or June meeting date.

With no further business, Lieutenant Governor Sheehy adjourned the meeting.

Meeting minutes were taken by Lori Lopez Urdiales and reviewed by the staff of the Office of the CIO/NITC.

**UPDATE: Projects reviewed by the NITC for the FY2007-2009 Biennium.**

Category	Description
Mandate	Required by law, regulation, or other authority.
Tier 1	Highly Recommended. Mission critical project for the agency and/or the state.
Tier 2	Recommended. High strategic importance to the agency and/or the state.
Tier 3	Other. Significant strategic importance to the agency and/or the state; but, in general, has an overall lower priority than the Tier 1 and Tier 2 projects.
Tier 4	Insufficient information to proceed with a recommendation for funding.

Project #	Agency	Project Title	Total Project Costs	Status
<b>Mandate</b>				
25-01	HHSS	New Medicaid Management Information System (MMIS)	\$50,000,000	Moving Forward
47-04	NET	Final DTV Transmitter Conversion Project	\$ 2,641,450	Fully Funded
<b>Tier 1</b>				
50-01	State College System	Student Information Administrative System	\$10,000,000	Interim Studies to be conducted
51-01	University of Nebraska	Student Information System	\$32,649,418	Interim Studies to be conducted
85-01	Retirement	Migration of PIONEER to the jClarity Platform	\$ 6,523,000	Fully Funded
<b>Tier 2</b>				
05-01	Supreme Court	E-Filing in JUSTICE	\$ 605,000	At least partially funded in Agency budget
13-01	Department of Education	Nebraska Transcript Project	\$ 250,000	Fully Funded
37-02	Workers' Compensation Court	Court Re-engineering - Adjudication	\$ 970,520	Unknown
37-03	Workers' Compensation Court	Court Re-engineering - Vocational Rehabilitation	\$ 204,177	Unknown
<b>Tier 3</b>				
05-02	Supreme Court	Digital Audio Recorders	\$ 495,440	Fully Funded
25-02	HHSS	Laboratory Information Management System (LIMS)	\$ 393,000	Moving Forward
37-01	Workers' Compensation Court	WCC Internet Enhancement and Security	\$ 103,083	Partially Funded
47-01	NET	Satellite Reconfiguration Project	\$ 1,259,500	Not Funded
47-02	NET	Public Media Archive and Distribution Project	\$ 1,219,895	Not Funded
47-03	NET	Public Media at the Capitol	\$ 2,139,815	Not Funded
<b>Tier 4</b>				
27-01	Department of Roads	Expansion of Falcon DMS to Agencywide Use	\$ 1,509,182	Not Funded
27-03	Department of Roads	Highway Condition Reporting System (HCRS) Enhancement		Not Funded

# **Community Council Nominees**

## **June 2007**

**Mitch Arnold**

Move Back to Nebraska, Omaha

**Jason Barelman**

Wayne State College

**Dean Folkers**

Department of Education

**Darla Heggem**

Twin Cities Development, Scottsbluff-Gering

**Bethanne Kunz**

Valley County Economic Development

**Joan Modrell**

Department of Labor

**Caleb T. Pollard**

Nebraska Department of Economic Development

**Angie Ramaekers**

Columbus Area Chamber of Commerce

**Rivkah Sass**

Omaha Public Library

**Dan Shundoff**

Intellicom, Kearney

## **Mitch Arnold**

Mitch is the president of Preferred Partners, LLC. In this role, he is responsible for the overall development of the company, relationship management, and sales and marketing strategies.

A seasoned sales and marketing professional, Mitch brings a diverse background to his projects.

After graduating from the University of Nebraska-Kearney with two degrees in four years, Mitch was an English and journalism teacher, as well as a golf coach at Columbus Scotus High School for three years. He also spent a summer during that time working as a technical editor for the American Institute of Biological Sciences in downtown Washington, DC.

In 1995, Mitch moved to North Carolina to begin a career in public relations, working as one of two public relations specialists at North Carolina A&T State University. It was there that he began developing Web sites, which led him to establishing his first business, Mitch Arnold Technical Communication, in 1996.

During the next six years, Mitch completed the M.S. in Technical Communication at North Carolina State University, and established a successful NASCAR-themed retail operation in Greensboro, North Carolina.

In 2002, Mitch and his partner sold the NASCAR business, and he returned to his native Nebraska, where he became a founding partner in Preferred Partners, LLC.

Mitch's specialties include business development, sales solutions, electronic commerce and marketing, and public relations strategies. He is also the author of several widely distributed articles in the field of technical communication.

He is a member of the Omaha Young Republicans, and was recently appointed by the Governor to the Nebraska Workforce Investment Board.

Mitch and his wife Lynda have two children and are members of St. Patrick's Catholic Church in Gretna.

## **Dean Folkers**

Dean Folkers currently serves as the Assistant Director for Nebraska Career Education (NCE) at the Nebraska Department of Education (NDE). The appointment with NDE includes responsibilities for administrative functions of the federal Carl D. Perkins Career and Technical Education Act that supports secondary and postsecondary Career and Technical Education programs. Specific focus areas include fiscal and accountability oversight of the grant operations and support of technology support services. Additional responsibilities focus on the efforts of management and leadership with the Curriculum and Instruction team to achieve the mission of supporting learning, earning, and living opportunities for Nebraskans.

Dean, a native Nebraskan, has worked as an educator, with both high school and adult audiences, and for a national nonprofit student youth leadership development organization located in Washington, DC. The specific experiences with the national student organization focused on partnership and community development efforts along with engagement and training of teachers throughout the United States. Dean resides in Lincoln, Nebraska with his wife and two sons.

A commitment to pursuing options for the use of technology to provide services and identifying connections of these resources for ease and access to all citizens of Nebraska is a passion applied to Dean's daily work. Dean received his Bachelors and Masters from the University of Nebraska- Lincoln and is currently pursuing a Doctorate in Organizational Leadership.

## **Bethanne Kunz**

Bethanne grew up in Ord, Nebraska and returned home after attending college. Kunz has been in her current position since 2000. Her duties include business recruitment, existing business growth, marketing, housing, leadership development, public relations and other community development programs.

Bethanne serves as Secretary and Treasurer of the Central Nebraska Economic Development District. She serves as Vice President for the Nebraska Economic Developers Association and also serves on the board for the Nebraska Chamber of Commerce Executives.

Bethanne graduated summa cum laude with a Bachelor of Science from College of Saint Mary in 1999. She earned a Master of Business Administration in May 2004 from the University of Nebraska-Lincoln. She is also a graduate of the Heartland Basic Economic Development Course and a graduate of the Institute for Organization Management.

Bethanne and her husband, Adam, own and operate an underground sprinkler and landscaping company in Ord.

## **Caleb Pollard**

- Born and raised in Nehawka, NE.
- Moved to Kearney, then to Minnesota. After graduation from John Marshall High, Rochester MN, I moved back to Nebraska to attend UNL.
- There I focused my degree of studies on international sustainable development, a self designed major that incorporated rural revitalization, political science, community & regional planning, economic growth and development, environmental studies and Latin American studies.
- I was given the opportunity to work at three internships - 1 with Senator Cap Dierks at the NE State Legislature, another as Nebraska Community Improvement Program Intern at DED and finally as Research Specialist for the Urban Community Improvement Program, NCIP's sister program at UNL. My internships were instrumental in the decision to pursue my career professionally.
- Professionally, I worked in a dot-com that dot-bombed, then in healthcare research at National Research here in Lincoln before making my transition to DED as Workforce Development Consultant.
- Happily, I'm married and raising 1 beautiful son with another child on the way in 7 short weeks.
- I also like long walks on the beach and gardening.

## **Angie Ramaekers**

I have been in my current role as Drive for Five Coordinator with the Columbus Area Chamber of Commerce since May 1, 2007. As the Drive for Five Coordinator, I am coordinating the effort to recruit and/or retain 500 workers to the Columbus area by 2010. This is being done through a variety of efforts including recruitment events, marketing to area alumni, presentations to students, educators, businesses, civic clubs, etc. Prior to my current position, I was employed with Nebraska Workforce Development-Department of Labor since July, 2000. During my employment with Nebraska Workforce Development, I assisted employers and job seekers in their respective employment needs as well case managed clients who were receiving training through the WIA training program. In addition to my paid work activities, I also volunteer in a variety of capacities. I am the Columbus Area Director for Dream It Do It, which is a volunteer position. I serve on the Board of Directors for Columbus Collaborative Team (since 2002), have been the Chair and Co-chair of the Diversity Standing Committees of the Columbus Collaborative Team (2001-2006), as well Chair of a scholarship program for the Columbus Noon Optimist Club (2002-2004), and countless other volunteer activities on as needed basis.

Nebraska Information Technology Commission  
**eHealth Council Charter**

## **1. Introduction**

The eHealth Council (hereafter referred to as “Council”) of the Nebraska Information Technology Commission (hereafter referred to as “Commission”) is an advisory committee of the Commission composed of representatives from the State of Nebraska and federal government; health care providers; eHealth initiatives; public health; payers and employers; consumers; and resource providers. The Council was originally formed by the Nebraska Information Technology Commission on Feb. 22, 2007 to foster the collaborative and innovative use of eHealth technologies through partnerships between public and private sectors, and to encourage communication and coordination among eHealth initiatives in Nebraska.

## **2. Purpose**

The purpose of this Charter is to clarify the role of the Council and its relationship with the Commission.

## **3. Authority**

The Nebraska Information Technology Commission shall: "Establish ad hoc technical advisory groups to study and make recommendations on specific topics, including work groups to establish, coordinate, and prioritize needs for education, local communities, and state agencies[.]" Neb. Rev. Stat. § 86-516(7).

## **4. Commission Responsibilities and Mission**

### **4.1 Commission Mission**

The mission of the Nebraska Information Technology Commission is to make the State of Nebraska's investment in information technology infrastructure more accessible and responsive to the needs of its citizens regardless of location while making government, education, health care and other services more efficient and cost effective.

### **4.2 Commission Responsibilities (Neb. Rev. Stat. § 86-516)**

4.2.1 Annually by July 1, adopt policies and procedures used to develop, review, and annually update a statewide technology plan;

4.2.2 Create an information technology clearinghouse to identify and share best practices and new developments, as well as identify existing problems and deficiencies;

4.2.3 Review and adopt policies to provide incentives for investments in information technology infrastructure services;

4.2.4 Determine a broad strategy and objectives for developing and sustaining information technology development in Nebraska, including long-range funding strategies, research and development investment, support and maintenance requirements, and system usage and assessment guidelines;

4.2.5 Adopt guidelines regarding project planning and management, information sharing, and administrative and technical review procedures involving state-owned or state-supported technology and infrastructure. Governmental entities, state agencies, and political subdivisions shall submit projects which directly utilize state-appropriated funds for information technology purposes to the process established by sections 86-512 to 86-524. Governmental entities and political subdivisions may submit other projects involving information technology to the commission for comment, review, and recommendations;

4.2.6 Adopt minimum technical standards, guidelines, and architectures upon recommendation by the technical panel;

4.2.7 Establish ad hoc technical advisory groups to study and make recommendations on specific topics, including workgroups to establish, coordinate, and prioritize needs for education, local communities, and state agencies;

4.2.8 By November 15 of each even-numbered year, make recommendations on technology investments to the Governor and the Legislature, including a prioritized list of projects, reviewed by the technical panel, for which new or additional funding is requested;

4.2.9 Approve grants from the Community Technology Fund and Government Technology Collaboration Fund;

4.2.10 Adopt schedules and procedures for reporting needs, priorities, and recommended projects ; and

4.2.11 Assist the Chief Information Officer in developing and maintaining Network Nebraska pursuant to section 86-5,100.

## **5. eHealth Council Mission and Responsibilities**

### **5.1 Council Mission**

The mission of the Council is to foster the collaborative and innovative use of eHealth technologies through partnerships between public and private sectors, and to encourage communication and coordination among eHealth initiatives in Nebraska.

## **5.2 Council Responsibilities**

5.2.1 Assist the Commission in developing, reviewing and updating the statewide technology plan.

5.2.2 Review the current status of healthcare information technology adoption by the healthcare delivery system in Nebraska;

5.2.3 Address potential security, privacy and other issues related to the adoption of interoperable healthcare information technology in Nebraska;

5.2.4 Evaluate the cost of using interoperable healthcare information technology by the healthcare delivery system in Nebraska;

5.2.5 Identify private resources and public/private partnerships to fund efforts to adopt interoperable healthcare information technology;

5.2.6 Support and promote the use of telehealth as a vehicle to improve healthcare access to Nebraskans;

5.2.7 Recommend best practices or policies for state government and private entities to promote the adoption of interoperable healthcare information technology by the healthcare delivery system in Nebraska.

## **6. Membership**

### **6.1 Selection of Members**

The Commission may solicit nominations from organizations or individuals with an active interest or involvement in eHealth in forming the initial set of members.

The Commission may also seek out additional qualified candidates. Nominations shall describe the qualifications of the person relative to the goals of the eHealth Council. In choosing members, the eHealth Council and the NITC shall strive for a balance of perspectives on eHealth issues.

### **6.2 Representation**

**The following focus areas will be represented within the eHealth Council:**

6.2.1 The State of Nebraska

6.2.2 Health care providers

6.2.3 eHealth initiatives

6.2.4 Public health

6.2.4 Third party payers and employers

6.2.5 Consumers

6.2.6 Resource providers, experts, and others if deemed appropriate by the NITC

### **6.3 Number of Members**

The number of members shall be no more than 25. .

### **6.4 Vacancies**

The eHealth Council may solicit nominations to fill vacant positions and may recommend new members to the NITC for approval. The Commission may also seek out additional qualified candidates.

### **6.5 Length of Service**

One-third of the members shall initially serve 3-year terms. One-third of members will initially serve two-year terms. One-third of members will initially serve one-year terms. Subsequent terms will be three-years.

### **6.6 Member Responsibilities**

Each member is responsible for maintaining two-way communication with their sector constituents concerning issues brought before the Council.

### **6.7 Designated Alternates and Non-voting Alternates**

6.7.1 Each member of the Council may designate one (1) official voting alternate. This official voting alternate shall be registered with the Office of the Chief Information Officer and NITC and, in the absence of the official member, have all the privileges as the official member on items of discussion and voting.

6.7.2 If the official member and his/her official alternate are unable to attend a Council meeting either in person or electronically, then the sub-sector affected may send a non-voting alternate to gather or share information.

## **7. Meeting Procedures**

### **7.1 Chair(s)**

The elected Chair or Co-Chairs will conduct the meetings of the Council, oversee the establishment, operation and dissolution of committees, propose meeting agendas, and maintain the general operations of the Council. The Chair or Co-Chairs of the Council will serve two year staggered terms, expiring on January 1. If co-chairs are selected initially, one co-chair will serve two years, and one will serve three years. Subsequent co-chairs shall serve 2-year terms.

## **7.2 Quorum**

An official quorum consists of 50% of the official members or their voting alternates. No official voting business may be conducted without an official quorum.

## **7.3 Voting**

Issues shall be decided by a majority vote of the voting members present.

## **7.4 Meeting Frequency**

The Council shall meet on an as needed basis. The eHealth Council will meet no more than 8 and no fewer than 2 times per year.

## **7.5 Notice of Meetings**

7.5.1 Notice of the time and place of each meeting of the Council shall be made at least seven (7) calendar days prior to the meeting. Notice shall be published on the Council's Web site at <http://www.nitc.state.ne.us/>.

7.5.2 The notice shall contain an agenda of subjects known at the time of the publicized notice or a statement that the agenda shall be readily available for public inspection at the Office of the Chief Information Officer, 501 S. 14<sup>th</sup> Street, 4<sup>th</sup> Floor, Lincoln, NE, during normal business hours by appointment.

## **7.6 Subcommittees**

7.6.1 Subcommittees will be designated by vote of the Council to address specific topics.

7.6.2 Pursuant to provisions of Neb. Rev. Stat. § 84-1409(1), subcommittees of the Council shall not be required to provide notice of meetings.

## **7.7 Expense Reimbursement**

Section 81-1182.01 states: "Any department, agency, commission, council, committee, or board of the state may pay for the reasonable and necessary expenses for the recruitment, training, utilization, and recognition of volunteers providing services to the state and certain providers of services as established by the Director of Administrative Services."

7.7.1 According to NAS Policy CONC-005, "Volunteers shall mean those persons providing services to the State who are not being compensated for their time."

7.7.2 Council members needing reimbursement must submit a signed request to the Office of the CIO-NITC using the official state accounting forms.

# eHealth Council Nominees

## June 2007

- **The State of Nebraska/Federal Government**
  - **Steve Henderson**, Office of the CIO
  - **Senator Mick Mines**, Nebraska Legislature
  - **Dennis Berens**, HHSS, Office of Rural Health
  - **Congressman Jeff Fortenberry**, represented by Marie Woodhead
  
- **Health Care Providers**
  - **Daniel Griess**, Box Butte General Hospital, Alliance
  - **Dr. Delane Wycoff**, Pathology Services, PC
    - **Dr. Harris A. Frankel** (alternate)
  - **Joni Cover**, Nebraska Pharmacists Association
  - **September Stone**, Nebraska Health Care Association
    - **Bill Bivin**, Nebraska Health Care Association (alternate)
  - **John Roberts**, Nebraska Rural Health Association
  
- **eHealth Initiatives**
  - **Donna Hammack**, Nebraska Statewide Telehealth Network and St. Elizabeth Foundation
  - **Ken Lawonn**, NeHII and Alegent Health
  - **Harold Krueger**, Western Nebraska Health Information Exchange and Chadron Community Hospital
  - **C.J. Johnson**, Southeast Nebraska Behavioral Health Information Network and Region V Systems
  
- **Public Health**
  - **David Lawton**, HHSS, Public Health Assurance
  - **Jeff Kuhr**, Three Rivers Public Health Department, Fremont
    - **Rita Parris**, Public Health Association of Nebraska, alternate
  - **Kay Oestmann**, Southeast District Health Department
    - **Shirleen Smith**, West Central District Health Department, North Platte, alternate
  - **Dr. Keith Mueller**, UNMC College of Public Health
  
- **Payers and Employers**
  - **Steve Grandfield or Susan Courtney**, Blue Cross Blue Shield
  - **Ron Hoffman, Jr.**, Mutual of Omaha
  - **Mary Steiner**, HHSS Finance and Support, Medicaid
  
- **Consumers**
  - **Nancy Shank**, Public Policy Center
  - **Alice Henneman**, University of Nebraska-Lincoln Extension in Lancaster County
  - **Jim Krieger**, Gallup
  
- **Resource Providers, Experts, and Others**
  - **Henry Zach**, HDC 4Point Dynamics
    - **Marsha Morien**, Center for Biosecurity (alternate for Henry Zach)
  - **Kimberly Galt**, Creighton University School of Pharmacy and Health Professions

## **Steven L. Henderson**

Mr. Henderson serves as a member of the leadership team for Nebraska's Office of the CIO (Chief Information Officer). He has a wide range of varied responsibilities, including strategic planning, business continuity and disaster recovery, security, Geographic Information Systems (GIS), and coordinating support for the Nebraska Information Technology Commission (NITC). Steve is a long-time state employee, with over 30 years' experience in information technology assignments. He maintains a particular interest in organizational group process and facilitation.

Steve received his Bachelor's of Science (with honors) in Computer Science from the University of Nebraska at Lincoln, and a Masters of Business Administration from the University of Nebraska at Omaha. He is married to Alicia and they have two daughters, Rebecca and Meghan.

## **Sen. Mick Mines (District 18, Blair)**

**Elected to Nebraska Legislature:** 2002, 2006

**Committees:** Government, Military and Veterans Affairs (vice chairperson); Transportation and Telecommunications

**Biography:** Born June 21, 1950, in Fremont.

*Education:* Graduate of North Bend High School and Elkins Institute, Dallas.

*Family:* Married Katie Fate; two children: Laini and Billy.

*Military service:* U.S. Naval Reserve.

*Occupation:* Vice president, HunTel Systems Inc.

*Member:* Nebraska Diplomats (past president); Nebraska Independent Telephone Association (past president); Nebraska Industrial Competitive Alliance; Nebraska Economic Developers Association; Country Bible Church; Blair Rotary Club; Rebuilding Together - Washington County; Blair Family YMCA; American Legion Post 154; Jeffrey K. Mines AMVETS Post 20; chairman, Veterans Tribute Plaza Committee.

*Former:* Mayor, council president, council member, city of Blair; president, League of Nebraska Municipalities; president, Blair Area Chamber of Commerce; president, Gateway Development Corp., AKSARBEN diplomat; National League of Cities (Small Cities Council and Public Safety/Crime Prevention Committee).

*Honors and awards:* Nebraska Diplomat of the Year; Friend of Business Award, Cargill Dow; Metropolitan Area Planning Agency Regional Citizenship Award; Volunteer of the Year Award, Blair Family YMCA; Servant-Leadership Award, League of Nebraska Municipalities; CFI Visionary Award, Nebraska State Bar Association.

## Dennis M. Berens

### Education:

- Charter Oak-Ute High School, Charter Oak, Iowa; graduated 1963
- Concordia College, Seward, Nebraska, graduated 1967, B.S.Ed.
- Morningside College, Sioux City, Iowa, 18 hours graduate work
- Concordia College, Seward, Nebraska, 1971, M.A., emphasis on sociology/psychology
- University of Nebraska-Lincoln, completed half the requirements toward an advanced degree in counseling

### Employment:

- 1969-1976, teacher/athletic director, St. John Lutheran School, Seward, Nebraska.
- 1976-1990, co-publisher, Seward County Independent Newspaper, Seward, Nebraska.
- 1991-present, Coordinator and Director, Nebraska Office of Rural Health, Nebraska Health & Human Services System, Lincoln, Nebraska.

### Experiences:

- Worked to establish a teacher training laboratory program.
- Chaired and served on various committees for the Nebraska Press Association.
- Chaired and served on many Chamber of Commerce committees in Seward, Nebraska.
- Developed a community industrial recruitment package.
- Worked to develop three partnerships in rural Nebraska:
  - Nebraska Economic Development Corporation
  - Nebraska Partnership for Rural Development
  - Nebraska Development Network
- Facilitated the creation of the Nebraska Rural Health Association.
- Facilitated the Nebraska Information Technology Commission's Telehealth Committee.
- Worked to develop rural health networks/cooperatives for rural Nebraska.
- Robert Wood Johnson Foundation Primary Care Associate (Practice Sights Grant) (recipient).
- Coordinated the Rural Response Partnership for rural mental health.
- 1996 – Recipient of the Robert Wood Johnson Foundation – Community Health Leadership Award (1 of 10 National winners)
- 1999-Present – Facilitator for the Nebraska Sowing the Seeds of Hope Committee and Mental Health Voucher Programs.
- 2002-2004 – President of the National Organizations of State Offices of Rural Health.

### Experiences (cont.):

- 2002-2004 – Facilitated the process/committee to write the National Rural – Frontier EMS Agenda for the Future.
- 2002-2004 – National EMS/Trauma Advisory Board member.

- 2003-Present – Facilitated the planning and creation of the Nebraska Telehealth Network.
- 2005-2006 – Facilitated the Nebraska Registry Partnership, a model to address diabetes/ cardiovascular conditions through an electronic registry model.
- 2006-2007 – Facilitated the Nebraska Health Information Security and Privacy Coalition. Created a state report with recommendations.
- 2007 – Serving on the Nebraska eHealth Council.

### **Congressman Jeff Fortenberry**

Jeff Fortenberry was elected to the United States House of Representatives in November 2004 to represent Nebraska's First Congressional District. He is an experienced public servant prepared to meet the challenges before the United States Congress, and is committed to representing the interests of the people of eastern Nebraska.

In Congress, Rep. Fortenberry has numerous committee and subcommittee assignments. His service on the Agriculture Committee includes sitting on the Subcommittee on Conservation, Credit, Energy and Research and the Subcommittee on Specialty Crops, Rural Development and Foreign Agriculture.

As a member of the Foreign Affairs Committee, Rep. Fortenberry serves on the Subcommittee on the Middle East and South Asia and the Subcommittee on Africa and Global Health.

In his role with the Small Business Committee, he serves as the ranking Republican member of the Subcommittee on Rural and Urban Entrepreneurship where he focuses his efforts on making small business entrepreneurship an important part of community development.

Jeff served from 1997-2001 as an at-large member on the Lincoln City Council. As a council member he worked on many economic development and community revitalization projects, including the transition of a major public hospital to the private sector, and the building of a new baseball stadium.

Jeff took particular interest in local and neighborhood concerns while serving on the city council. He focused on public safety, adding twenty-four new police officers; and on community development and planning. During his service, Jeff never once raised the tax burden on families or businesses while balancing the city's budget.

While completing a Masters degree in public policy at Georgetown University, Jeff worked for the United States Senate with the Subcommittee on Intergovernmental Relations. Jeff's service with the Subcommittee coincided with the farm crisis of the mid 1990s. During his time with the Subcommittee he examined the way falling agricultural land values were affecting local municipalities, and offered practical solutions. Jeff has also participated in a number of vital cost-benefit analysis assessments on public works projects across the country.

Jeff is a successful businessman with an extensive career in the publishing industry and many years experience in various small business investments.

Jeff has a strong vision for representing the First Congressional District in Congress. He believes the strength of our nation depends on the strength of our communities and families. He is working to create economic strength and opportunities for our families, communities, and small businesses. He supports strengthening our national security as well as efforts for international stability and order. And Jeff represents the best traditions of Nebraska communities.

### **Marie C. Woodhead**

In 1994, I received a Bachelor of Arts degree from the University of Nebraska-Lincoln majoring in Sociology. In 1997, I received a Master of Community and Regional Planning degree with an emphasis on Social Planning.

In January 2000, I began serving Congressman Doug Bereuter as his district aide specializing in the areas of health, labor, and retirement issues. I advised Congressman Bereuter in these areas and assisted constituents experiencing difficulties with related federal agencies or programs. In January 2005, I began working for Congressman Jeff Fortenberry as his Constituent Services Director. I continue to advise Congressman Fortenberry in the areas of health and retirement issues as well as oversee the office constituent services activities. I work closely with the Congressman's health aide in our Washington DC office on related legislative issues.

### **Daniel Griess**

Daniel Griess, a Western Nebraska native, came to Alliance in 1992 with his young family to manage Box Butte General Hospital's laboratory services. A self-described scientist, Griess worked as a medical technologist before taking on his new leadership role. In 1996, he was promoted to Vice President of Clinical/Support Services and in January 2004, accepted the position of Chief Executive Officer for the organization. With a strong Nebraska heritage and commitment to community, he has enjoyed raising his two sons, Brandon and Nathan, in an environment molded by family values as well as working for a Critical Access Hospital serving Box Butte County and the surrounding area.

### **Delane A. Wycoff, MD**

Delane A. Wycoff, MD is a Clinical Pathologist and is one of a group of pathologists in North Platte Nebraska practicing as Pathology Services, PC. The group provides pathology consultation and reference laboratory services to more than twenty communities in west-central Nebraska, northwest Kansas and northeast Colorado. A native of rural Dawson County in Nebraska, Dr. Wycoff received his medical education and residency training at the University of Iowa and was the primary pathologist involved in the implementation of the the first Laboratory Information System (LIS) at the University of Iowa Hospitals and Clinics in the 1970's. Dr. Wycoff has practiced in North Platte since 1979 and has been a leader in implementation of information technology in the clinical laboratory. He is a past Medical Director of the laboratories of Great Plains Regional Medical center and of the Medical Laboratory Technician training program at Mid-Plains Community College. He is is a member of the Medical Advisory Committee of the Omaha Regional Red Cross blood services. Dr. Wycoff applauds the benefits of technology to communities and health education through distance learning programs in Nebraska. He currently participates on both the technical subcommittee and the clinical subcommittee of the Nebraska Medical Association task force for electronic medical records.

### **Joni Cover**

Joni Cover is the Executive Vice President of the Nebraska Pharmacists Association, a position she has held since January 2003. As the EVP, Joni spends her time lobbying on behalf of Nebraska pharmacists at both a state and federal level; answering questions and problem solving for pharmacists; and overseeing the operations of the NPA. In addition, Joni works with the national pharmacy organizations to represent Nebraska on a national level. Joni is currently a member of the Governor's Pandemic Influenza Task Force, a member of the Rural Health Stakeholders group, the Medical Assistance Advisory Committee and the Nebraska Bioterrorism Preparedness Task Force, and represents the NPA on various boards and committees.

Prior to the NPA, Joni was the Director of Policy and a lobbyist at the Nebraska Hospital Association; where she was involved in rural and public health policy issues and workforce shortage initiatives.

Joni graduated from the University of Nebraska with a bachelor's degree in Communications; received a bachelor's degree in Business Administration with an emphasis in Marketing from Chadron State College; and received her juris doctor from the University of Wyoming in 2000. Joni is a member of St. Matthew's Episcopal Church in Lincoln, the University of Nebraska Alumni Association, University of Wyoming Foundation, the Nebraska Bar Association, the American Society of Pharmacy Law, and is an honorary member of Phi Lamda Sigma.

**September Stone RN, MSN**  
**Director LTCWIN at Nebraska Health Care Association**  
3900 NW 12 Suite 100  
Lincoln NE 68521  
E-mail: [Septembers@nehca.org](mailto:Septembers@nehca.org)

**Professional qualifications related to the eHealth council**

I am a Master's prepared RN with an emphasis in nursing education. I have worked in nursing and healthcare education since 1987. As an administrator and director in education I have experience with a variety of regulatory and legislative fields in Nebraska and at the federal level. As an educator, I develop educational materials using a variety of multimedia and have proven success in teaching theory and clinical nursing to students.

Organization, collaboration, attention to detail and teamwork are critical components to my philosophical beliefs. Coordination of multiple projects and an expansion of a more global perspective, particularly in the business and corporate sectors has been an area of personal growth over the last 3-4 years. Producing quality end results, whether students or products in an efficient manner using appropriate resources is a strong asset. I enjoy working with a variety of people at all levels of the education process from students to leadership personnel.

**PROFESSIONAL PROFILE...**

*Nebraska Health Care Association*, Administrator of Nebraska Health Care Learning Center and Director of Long Term Care Workforce Institute of Nebraska (LTCWIN); Lincoln Nebraska; 2003 – present

- ❖ I have full administrator responsibilities for Nebraska Health Care Learning Center. The Nebraska Health Care Learning Center is a private postsecondary career school designed to meet the needs of people within the long term care setting and was initially licensed in 2004.
- ❖ As Director of Long Term Care Workforce Institute of Nebraska I am responsible for financial revenue budget of products and the learning center. I am also responsible for market analysis and financial accountability related to the LTCWIN and the Nebraska Health Care Learning Center.
- ❖ I have served on multiple regulatory committees such as assisted living administrator, nursing home administrator preceptor, feeding assistant, and medication aide. I also serve on the Nebraska Private Postsecondary Career Schools Advisory Council.
- ❖ I am responsible for maintaining information flow to customers regarding information technology in healthcare and for seeking out resources to encourage advances in information technology in long term care

## **John L. Roberts**

A native Nebraskan, John graduated from the University of Nebraska Medical Center in Health Services Administration in 1980. John has over twenty- four years of extensive association and health care management experience including: two years in materials management at Bergan Mercy Hospital (450 beds), Omaha, Nebraska; six years as assistant administrator of a rural hospital in Ogallala, Nebraska; four years with the State of Nebraska Department of Administrative Services and the Nebraska State Health Department and eleven years as vice president of the Nebraska Association of Hospitals and Health Systems. He currently serves as President of Midwest Health Consultants, Inc.

He is currently responsible for the overall management and technical expertise of the consulting firm including business development & strategy, marketing, customer service and over-all project management. The firm has considerable expertise in the areas of rural health care strategic planning, association management, community health improvement and bioterrorism preparedness. The firm currently contracts to provide technical assistance to the Nebraska Hospital Association/Office of Rural Health on the Nebraska Critical Access Hospital Program, to the State of Nebraska on the HRSA Hospital Bioterrorism Preparedness Program and serves as the Executive Director of the Nebraska Rural Health Association.

Over the past five years, John has been extremely active in establishing and implementing the Nebraska Critical Access Hospital Program. Nebraska is recognized around the country as having an innovative Critical Access Hospital program. The fact that Nebraska has 60 facilities CAH certified is a reflection of the quality of that program. John co-authored the original state plan to implement the Medicare Rural Hospital Flexibility Program in Nebraska as well as five successful Flex Program grants for Nebraska totaling \$4.2 million.

Since March 2002, the Nebraska Hospital Bioterrorism Preparedness Program has been coordinated by Mr. Roberts who is responsible for implementing the operational plans for hospital and collaborating entities' bioterrorism preparedness in the State of Nebraska. He handles all the day-to-day operational aspects of the preparedness planning effort as well as closely working with the Nebraska Hospital Association (NHA), Nebraska hospitals, MMRS sites in Omaha and Lincoln and pre-hospital emergency services providers to implement work plans adopted by the Nebraska Health and Human Services System. Mr. Roberts's experience includes disaster response planning, including knowledge of clinical issues, administrative procedures, linkages to appropriate agencies and organizations, and training issues appropriate to terrorism preparedness.

John Roberts was appointed executive director of the Nebraska Rural Health Association on February 1, 2004. He has been involved in the association since its inception, and served on its board of directors for six years.

## **Kenneth E. Lawonn**

Ken Lawonn is the Senior Vice President and CIO for Alegent Health. In this position, he is responsible for the information management, telecommunications, construction, property management, security and biomedical functions throughout the enterprise. He joined Alegent Health in February of 2001 as the Vice President of Information Technology and was named to his current position in October of 2004.

Prior to joining Alegent Health, Ken served as the Vice President and Chief Information Officer for Banner Health System in Fargo, ND for eight years. Ken began his career in healthcare with Lutheran Health Systems in Fargo and served in a variety of technical and management roles prior to being named the CIO in 1992.

Mr. Lawonn received his BS degree in Computer Information Services from Moorhead State University. He is a member of the College of Healthcare Information Management Executives (CHIME) and the Healthcare Information and Management Systems Society (HIMSS).

**BIOGRAPHICAL SKETCH**

Provide the following information for the key personnel and other significant contributors in the order listed on Form Page 2.  
Follow this format for each person. **DO NOT EXCEED FOUR PAGES.**

NAME Johnson, Richard C.J.		POSITION TITLE Region Program Administrator	
eRA COMMONS USER NAME			
EDUCATION/TRAINING <i>(Begin with baccalaureate or other initial professional education, such as nursing, and include postdoctoral training.)</i>			
INSTITUTION AND LOCATION	DEGREE <i>(if applicable)</i>	YEAR(s)	FIELD OF STUDY
University of Nebraska - Lincoln	B.A.	1983	Psychology
University of Nebraska - Omaha	M.S.W.	2000	Social Work

**A. Positions and Honors.**

**Positions and Employment**

- 1978-1979 Youth Care Staff, Cedars Home for Children, Lincoln, NE
- 1979-1990 Youth Care Worker, Nebraska Center for Children and Youth, Lincoln, NE  
Group Home Supervisor  
Cottage Supervisor/Case Coordinator  
Psychiatric Social Worker
- 1984-1986 Teen Couples Coordinator, YWCA, Lincoln, NE
- 1990-1990 Residential Program Manager, Child Guidance Center, Lincoln, NE
- 1990-1993 Family Therapist, Rivendell Psychiatric Center, Seward, NE  
Program Director, Adolescent Services
- 1990-Present Systems Consultant
- 1993-Present Therapist, Samaritan Counseling Center, Lincoln, NE  
Therapist, Private Practice
- 1998-Present Director of Network Services/Director of Family & Youth Investment, Lincoln, NE  
Regional Program Administrator
- 2004-Present Board of the National Association of Case Management

**Other Experience and Professional Memberships**

- 1990-1993 Part-time faculty member at the University of Nebraska-Omaha, Social Work Department
- 1990-Present National Association of Social Workers, Associate Standing
- 1991-Present Certified Masters Social Worker, State of Nebraska
- 1991-Present Advanced Practicum Supervisor, University of Nebraska-Omaha, Social Work Department
- 1994-Present Licensed Mental Health Practitioner, State of Nebraska
- 1994-Present Certified Marriage and Family Therapist
- 1994-Present Supervisor for Provisionally Licensed Mental Health Practitioners, State of Nebraska

**Richard C.J. Johnson Biographical Sketch Continued**

**Honors**

2004	Letter of Acknowledgment For Commitment to Mental Health, Governor Mike Johanns
2003	Provider of the Year, The Mental Health Association of Nebraska
2001,02,03	Institute Speaker for the National Association of Case Managers
2001	Admiral-The Great Navy of the State of Nebraska
1994-2000	National Presenter for the Stepfamily Association of America

**B. Selected peer-reviewed publications (in chronological order).**

None to Date

**C. Research Support.**

2002-2003 Community Consensus Building Visa Model – A project of the Mental Health Association of Nebraska

**David P. Lawton**

**Position:**

Nebraska Health and Human Services System, Department of Public Health Assurance

Health Surveillance Section Administrator

- Areas of responsibility include EMS, Trauma, Codes (Crash Data), Epidemiology, Entomology, Communicable Disease (STD, TB, and HIV), NEDSS, Grants and Database repositories and Information exchange with local public health departments and CDC.
- Past coordinator for Nebraska Pandemic Influenza Planning
- Bioterrorism response team for HHSS and Public Health Assurance

**Additional Activities**

- Board Member on Public Health Data Standards Consortium, a national standards organization integrating public health data into electronic health records (EHR).
- Voting member for the HITSP standards panel

**Education:**

PhD	University of Nebraska, Lincoln	Higher Education Leadership
MSN	Medical College of Georgia	Nursing Administration
BSN	Medical College of Georgia	Nursing
BA	Covenant College, Lookout Mt. GA	Psychology
AS	Florida Junior College	Nursing

**Major Projects and Accomplishments:**

- Nebraska Health Alert Network
  - smallpox vaccinations
  - influenza vaccinations and shortage
  - pandemic influenza plan, NeHHSS Continuity of Operations Plan (COOP)
  - public health situation room and expanded response capacity
  - National Leader – Health Alert Network Coordinators – HONCHOS
  - Cross Border support of Wyoming Health Alert Network and Mid-America Alliance
- Nebraska Tele-Health Network, grant support and internal development
- Tac-Pac Purchase, training and deployment of redundant communication system.
- GIS Integration with LDAP database, contract and integration of entire HAN database to allow GIS mapping and exercise integration.
- Support for EMS E-Narsis system, an electronic ambulance run record integrated with hospital information systems.
- Regional Health Information Network- Involved with the Nebraska Rural Health and the Nebraska Biomedical Informatics Project to develop Regional Health Informatics Organizations (RHIO).
- Expansion and integration of NEDSS and other electronic laboratory reporting systems

## **Employment History**

- Nebraska HHSS October 2002 until present. Bioterrorism and Health Surveillance Sections
- Clarkson College 1994 until January 2003- Assistant Professor, Dean
- Saint Elizabeth Community Health Center – 1990-1994, Director of In-patient Nursing
- Merle West Medical Center, Oregon, Administrative Nurse Manager
- VA Medical Centers, Georgia and California, critical care nurse, nurse manager.
- Medical College of Georgia, ETMH, Trauma Nurse Staff and Manager, NICU Staff and management.
- University Hospital, Jacksonville, Florida, Staff nurse in pediatric ICU and Open Heart recovery

## **Jeff Kuhr**

Jeff Kuhr has been affiliated with various public health efforts in Nebraska for about 17 years. The past four years he's served as the Health Director for the Three Rivers Public Health District, which covers three of the four counties surrounding the Omaha metropolitan area. In 2003 Jeff served as president of the Nebraska Association of Local Health Directors, and then from 2004-2006 as president of the Public Health Association of Nebraska. In 2006 Jeff participated in the National Public Health Leadership Institute where he and his fellow Nebraska-team members, received the Martha Katz Award for Outstanding Leadership Project. Jeff graduated from the University of Nebraska at Omaha in 1995 with a Master of Science degree in Community Health Education, and is currently finishing his PhD in Psychological and Cultural Studies at the University of Nebraska – Lincoln.

## **Rita Parris**

Ms Rita Parris is the Executive Director of the Public Health Association of Nebraska (PHAN). She is also the Director of State Association of County and City Health Officials (SACCHO), which is a Section of PHAN, and oversees the other Association Sections which include the, the State Association of Local Boards of Health (SALBOH), the Public Health Nursing Section, the Emergency Response Section and the Prevention Providers Section. Ms Parris is the liaison between the state and local health departments for the CDC Bioterrorism Cooperative Agreement and serves on the Statewide Bioterrorism Committee and the Bioterrorism Budget Planning Committee. She oversees training and collaboration efforts for Nebraska's health departments and boards of health.

Ms. Parris is a 2004-2005 scholar in the National Public Health Leadership Institute. She has a bachelor's degree in community health education and through various Association programs; has managed a three-year social marketing project; written and edited training manuals for Boards of Health, and served on committees for the National Association of County and City Health Officials and the National Association of Local Boards of Health. Ms Parris is the former Executive Director the Nebraska Rural Health Association; placing her in a unique position to foster collaboration between public health and primary care providers.

## **Keith Mueller**

Dr. Mueller is Associate Dean, Department Chair, and Professor in the College of Public Health, Department of Health Services Research and Administration, UNMC. He is also the Director of the [Rural Policy Research Institute \(RUPRI\) Center for Rural Health Policy Analysis](#) and Director of the [Nebraska Center for Rural Health Research](#).

Dr. Mueller's doctoral training is in Political Science, with additional post-doctorate training in health services research. He was the 1996-97 President of the [National Rural Health Association](#), and is a member of the [RUPRI](#) Rural Health Panel. His research interests include policy analysis, access to care among the uninsured, and managed care.

## **Mary Steiner**

Mary Steiner was appointed the Nebraska Medicaid Director on March 16, 2005. Prior to a short period as the Acting Medicaid Director, she was the Program Analysis and Research Administrator in the Financial Services Division. In that capacity Ms. Steiner managed the unit responsible for research, statistics, budget projections, reporting, information provision and support for aid programs of the Nebraska Health and Human Services System, Medicaid being the largest of those programs. Prior to being the unit manager, she held Financial Services positions that related to Medicaid statistics and budget. She worked in the Financial Services Division for a total of 25 years. Mary continues to work in Medicaid but is no longer the Director of the program, which has been merged with other program areas to form the Medicaid and Long Term Care Division of the Nebraska Department of Health and Human Services.

## **Nancy Shank**

Nancy Shank is the Associate Director of the University of Nebraska Public Policy Center. The Center contributes to public policy by developing and making available objective analysis of public issues for the public, elected officials, executive agencies, and others who represent the diverse interests of Nebraskans. Nancy's work has focused on information technology and health and human services delivery systems. Ms. Shank was the principal investigator for a 3-year U.S. Department of Commerce Technologies Opportunities Program (TOP) grant that brought partners together across the U.S. to develop the technological link between propriety software and xml standards to enable interoperable information and referral resource sharing. The standards developed through that project are now being used to pilot the ne211.org coordinated data website. She is currently the principal investigator for a three-year (2005-08) Transforming Healthcare Quality Through Information Technology-Implementation Grant through the Agency for Healthcare Research and Quality and had previously served as the Planning Grant (2004-05) principal investigator. The Regional Health Records for Nebraska's Panhandle Project is a collaborative hospitals, public health, behavioral health, and others to create a sustainable electronic method for sharing health information within the remote, 14,000 square-mile, Nebraska Panhandle region. Nancy serves on the board of the National Human Services Data Consortium and is an active member of the Alliance of Information and Referral Services XML Technology Subcommittee and the Human Services XML Workgroup. She has also be active with

the Nebraska Health Information Initiative and the Nebraska Health Information Security and Privacy Committee. She currently serves on the Nebraska Information Technology Commission eHealth Council. She has consulted with numerous organizations throughout Nebraska and the U.S. on organizational development, program evaluation, and information sharing.

### **Alice Henneman**

Alice Henneman, MS, RD obtained her undergraduate and graduate degrees from the University of Nebraska and completed an internship at Indiana University to become a registered dietitian. She is currently an extension educator with University of Nebraska-Lincoln Extension. She is responsible for developing and delivering food, nutrition and food safety information to consumer and professional groups. In addition to presenting programs, she also uses the Internet extensively to communicate via a Website and Email newsletters.

### **Jim Krieger**

Jim Krieger is Vice Chairman and Chief Financial Officer of The Gallup Organization. He joined Gallup in 1978. He is responsible for corporate financial governance and allocating financial resources to enhance Gallup's value and ensure its future.

Krieger's mission is to safeguard and invest Gallup's financial assets to achieve long-term, sustainable growth in stockholder value superior to the market. He also facilitates productive local and worldwide relationships that achieve key management and client outcomes. Under his leadership, the Accounting Department works to develop financial scorekeeping systems that support internal and external business partnerships and Gallup's crucial management cornerstones, including per-person productivity and pay for performance measures.

Krieger has extensive experience in international business and has served as Gallup's President of International Operations. From 1992 through 2001, Gallup expanded its operations in the United States and throughout the world, and Krieger led Gallup's efforts to acquire or start offices in business strategic locations. Gallup currently operates more than 40 offices in 20 countries.

Krieger serves on the board of directors, as a member of the executive committee, and as co-chair of the Education and Workforce Development Council of the Omaha Chamber of Commerce. As a member of the University of Nebraska-Lincoln College of Business Administration Advisory Board and co-chair of the Accounting Department Advisory Group, he supports the college and its Accountancy Department on an ongoing basis.

Krieger received his bachelor's degree in business administration from the University of Nebraska-Lincoln. He is a Certified Public Accountant and a member of the Nebraska and American Institutes of Certified Public Accountants.

**Marsha Morien**

Marsha Morien is the Administrative Director of the Center for Biosecurity and the Administrator of Computer Assisted Medicine and Surgery at the University of Nebraska Medical Center. She provides leadership in Program planning and development to enhance clinical, educational, and research oriented Biosecurity preparedness for Nebraska and the nation. She is also responsible for program development in the areas of minimally invasive and robotic surgery and software applications for public health and Medical specialties. She led the implementation of Personal Health Records for students at UNMC.

**Henry Zach**

I am president of HDC 4Point Dynamics a Nebraska company specializing in Personal Health Records (PHRs). PHRs have gained much notoriety lately and are beginning to grow in popularity as part of the "Consumerism" in healthcare. I have taken part in many early meetings concerning the "Nebraska Initiative" and am confident I can add many insights into how a PHR would tie into a network of information sharing that would be beneficial to providers and patients alike.

## Biographical Sketch

### Kimberly A. Galt, Pharm.D., FASHP

---

Kimberly Galt is Professor of Pharmacy Practice and Associate Dean for Research, School of Pharmacy and Health Professions, and Director of the Creighton University Health Services Research Program (CHRP) in Omaha, Nebraska (<http://chrp.creighton.edu>). Dr. Galt received her pharmacy degrees from the University of Michigan. Her post-graduate training has emphasized outcomes research, continuous quality improvement and management, and the integration of computing technologies into research, teaching and clinical healthcare practice uses within the health professions. She has developed and managed pharmacist's primary care consultative ambulatory practice sites in the private and Veterans Affairs systems, supervised specialized drug information and clinical pharmacy services, and practiced general hospital, community and long-term care pharmacy. She is actively conducting research in patient with an emphasis on the impact of health information technology. Her research includes a three year study funded by the Agency for Healthcare Research and Quality on e-prescribing and clinical informatics with hand held technology and medication safety in primary care. She is also principal investigator on a two year Agency for Healthcare Research and Quality study to build research infrastructure capacity. In this project she leads an interprofessional team who is studying the adaptation and adoption of electronic health information technologies and the electronic health record. She is also studying the impact of culture and teamwork in the operating room arena with colleagues at the Creighton University Medical Center, and reporting error systems for allied health professionals. She holds appointments as a member of the **Health Information Technology National Resource Center Steering Committee** for the Agency for Healthcare Research and Quality (2005-2008) and as a permanent member of the **Health Care Technology and Decision Sciences Study Section**, Agency for Healthcare Research and Quality (2005 – 09). She has served as an expert panel member on AHRQ Panels for Health Center IT, Medication Gap Research, and AHRQ Practice Based Research Network Resource Center. She has also served as a Special Emphasis Panel reviewer for AHRQ's Health IT Demonstration Grant and Planning Grant portfolio. She is presently a member of the Health Information Security and Privacy Committee (HISPC) for the state of Nebraska and serves to provide research support for the group. Dr. Galt is Chair of the Inter-professional Taskforce to Develop a Patient Safety Curriculum for Creighton University involving 18 individuals from a variety of health and professional disciplines.

**Nebraska Information Technology Commission  
EDUCATION COUNCIL**

**2007-09 Membership Renewals/Replacements EXPIRING June 30, 2007**

<u>Name</u>	<u>Representing</u>	<u>Status</u>
<b><u>HIGHER EDUCATION</u></b>		
<b>Yvette Holly</b>	UN System	<b>President Milliken Confirmed (5/9/07)</b>
<b>Chuck Lenosky</b>	Independent Colleges & Universities	<b>Tip O'Neill Confirmed (5/23/07)</b>
<b><u>Mike Chipps</u></b>	Community College System	<b>Dennis Baack Confirmed (5/4/07)</b>
<b>Stan Carpenter</b>	State College System	<b>Stan Carpenter Confirmed (5/2/07)</b>
<b><u>K-12 EDUCATION</u></b>		
<b>Bob Uhing</b>	Educational Service Units	<b>DEC Confirmed (5/9/07)</b>
<b><u>Craig Pease</u></b>	Administrators	<b>Jerry Sellentin Confirmed (5/22/07)</b>
<b><u>Art Tanderup</u></b>	Public Teachers	<b>Jess Wolfe Confirmed (5/14/07)</b>
<b>Joe LeDuc</b>	Nonpublic Teachers	<b>Fr John Perkinton Confirmed (5/16/07)</b>

**\*\*Note\*\***

- **Underlined Candidates** are new voting members to the NITC Education Council and have a brief biographical statement attached to this document

**RECOGNITION**

**The Nebraska Information Technology Commission wishes to recognize Dr. Jack Huck, Mr. Rich Molettiere, and Mr. Ed Rastovski for their many years of distinguished service to the Education Council, in the interest of advising the Commission on matters of education technology initiatives, funding, and policy.**

## **Voting Members**

### **Craig Pease**

Mr. Craig Pease has been superintendent of Ashland-Greenwood Public Schools since 1988 and succeeds Ed Rastovski on the Education Council as a representative of the Nebraska Council of School Administrators. Mr. Pease holds an Education Specialist degree from the University of Nebraska-Lincoln and a Masters degree from the University of Nebraska-Omaha. Craig earned his Bachelor's Degree at Chadron State College. Mr. Pease has been active in the Nebraska Council on Teacher Education and the Nebraska Council of School Administrators. Craig also has found time to be a youth baseball coach and is a member of the Ashland Rotary Club.

### **Art Tanderup**

Art Tanderup is Media Specialist of Tekamah-Herman Public Schools and previously served on the Education Council from 1998-2001. Art succeeds Rich Molettiere as a representative of Nebraska State Education Association public school teachers. Art has been active in NSEA and NEA in the area of distance learning and legislative advocacy.

### **Mike Chipps**

Dr. Mike Chipps is President of Mid-Plains Community College and previously served on the Education Council from 2005-06. Dr. Chipps succeeds Jack Huck as a representative of the Nebraska Community College System.

Nebraska Information Technology Commission

June 27, 2007

**State Government Council  
Charter Amendment**

6. Membership

...

6.2.2 Other Members

...

6.2.2.10 Two (2) representatives from the general public with extensive IT experience ~~major private sector information technology users~~, to be appointed by the Commission

Current Charter: <http://nitc.ne.gov/sgc/documents/charter.pdf>



# Nebraska Information Technology Commission

## STANDARDS AND GUIDELINES

### Remote Administration of Internal Devices Standard

Category	<b>Security Architecture</b>
Title	<b>Remote Administration of Internal Devices Standard</b>
Number	

Applicability	<input checked="" type="checkbox"/> State Government Agencies <input type="checkbox"/> All.....Not Applicable <input checked="" type="checkbox"/> <b>Excluding higher education institutions</b> ..... <b>Standard</b> <input type="checkbox"/> State Funded Entities - All entities receiving state funding for matters covered by this document.....Not Applicable <input type="checkbox"/> Other: All Public Entities.....Not Applicable  <b>Definitions:</b> <b>Standard</b> - Adherence is required. Certain exceptions and conditions may appear in this document, all other deviations from the standard require prior approval as outlined in section 3.2 <b>Guideline</b> - Adherence is voluntary.
---------------	--

Status	<input type="checkbox"/> Adopted <input checked="" type="checkbox"/> Draft <input type="checkbox"/> Other: _____
Dates	<b>Date: April 3, 2007</b> <b>Date Adopted by NITC:</b> <b>Other:</b>

Prepared by: Technical Panel of the Nebraska Information Technology Commission  
 Authority: Neb. Rev. Stat. § 86-516(6)  
<http://www.nitc.state.ne.us/standards/>

## 1.0 Standard

It is the responsibility of all State of Nebraska agencies to strictly control remote access from any device that connects from inside the State of Nebraska network to a desktop, server or network device elsewhere within the State of Nebraska network (e.g. from a 10.x.x.x device to a 10.x.x.x device) and ensure that employees, contractors, vendors and any other agent granted remote access privileges adhere to common methods of secure remote administration which shall include but are not limited to:

- Use of strong authentication mechanisms (e.g., strong passwords, public/private key pair, two factor authentication, etc.)
- Utilize device host access (by IP address) lists to restrict remote access
- Use of secure protocols that provide encryption of both passwords and data (e.g., SSL, HTTPS) when reasonable and appropriate, rather than insecure protocols (e.g., Telnet, FTP).
- Grant permissions to only those with a job related need.
- Implement the 'Principle of Least Privilege' to those who are granted permissions.
- Reset factory default device passwords and regularly change any default accounts or passwords for the remote administration utility or application.
- Disable remote capabilities of devices or device accounts if remote access is not employed by the agency.

## 2.0 Purpose and Objectives

As employees utilize remote access connectivity to conduct business within and amongst the State of Nebraska networks, security becomes increasingly at risk. These standards are designed to minimize the potential exposure from damages which may result from unauthorized use of resources; which include loss of sensitive or confidential data, intellectual property, damage to public image or damage to critical internal systems, etc. The purpose of this document is to define standards for agencies that connect from any State of Nebraska network or device to any State of Nebraska network or device.

Objectives include:

- Provide guidance to State of Nebraska agencies employees, contractors, vendors and any other agent that access any State of Nebraska network or device.
- Provide a high level of security through industry standards and best practices.
- Ensure a solution that is scalable to meet the current and future needs of state agencies, their employees, clients and customers, and business partners.
- Meet federal security requirements for remote access control.

## 3.0 Applicability

### 3.1 State Government Agencies

All State agencies, boards, and commissions are required to comply with the standard listed in Section 1.0. All existing Agencies utilizing non-standard remote access applications must convert to the standard listed in Section 1.0 as soon as fiscally prudent, unless the application is exempt.

### 3.2 Exemption

Exemptions may be granted by the NITC Technical Panel upon request by an agency.

#### 3.2.1 Exemption Process

Any agency may request an exemption from this standard by submitting a "Request for Exemption" to the NITC Technical Panel. Requests should state the reason for the exemption. Reasons for an exemption include, but are not limited to: statutory exclusion; federal government requirements; or financial hardship. Requests may be submitted to

the Office of the NITC via e-mail. The NITC Technical Panel will consider the request and grant or deny the exemption. A denial of an exemption by the NITC Technical Panel may be appealed to the NITC.

## **4.0 Responsibility**

### **4.1 NITC**

The NITC shall be responsible for adopting minimum technical standards, guidelines, and architectures upon recommendation by the technical panel. (Neb. Rev. Stat. § 86-516(6))

### **4.2 State Agencies**

Each state agency will be responsible for developing a process that ensures that secure remote access to internal State resources is maintained, and/or implemented, including but not limited to following appropriate best practices in a manner consistent with this standard and other state agency security policies.

## **5.0 Definitions**

### **5.1 Principle of Least Privilege**

The principle of least privilege requires that a user be given no more privilege (authority) than necessary to perform a job.

## **6.0 Related Documents**

### **6.1 NITC Security Officer Handbook**

([http://www.nitc.state.ne.us/standards/security/so\\_guide.doc](http://www.nitc.state.ne.us/standards/security/so_guide.doc))

### **6.2 NITC Network Security Policy** (<http://www.nitc.state.ne.us/standards/index.html>)

### **6.3 NITC Remote Access Standard**

(<http://www.nitc.state.ne.us/standards/index.html>)

### **6.4 NITC Acceptable Use Policy**

([http://www.nitc.state.ne.us/standards/network/aup\\_20040309.pdf](http://www.nitc.state.ne.us/standards/network/aup_20040309.pdf)) and applicable Agency acceptable Use Policies

## **7.0 References**

### **7.1 National Institute Standards and Technology (NIST) Special Publication, 800-46, "Security for Telecommuting and Broadband Communications".**

(<http://csrc.nist.gov/publications/nistpubs/index.html>).

### **7.2 National Institute Standards and Technology (NIST) "Role Based Access Control"**

([http://csrc.nist.gov/rbac/Role\\_Based\\_Access\\_Control-1992.html](http://csrc.nist.gov/rbac/Role_Based_Access_Control-1992.html))



# Nebraska Information Technology Commission

## STANDARDS AND GUIDELINES

### Minimum Server Configuration Standard

Category	Security Architecture
Title	<b>Minimum Server Configuration Standard</b>
Number	

Applicability	<input checked="" type="checkbox"/> State Government Agencies <input type="checkbox"/> All ..... Not Applicable <input checked="" type="checkbox"/> <b>Excluding <u>higher education institutions</u></b> ..... Standard <input type="checkbox"/> State Funded Entities - <b>All entities receiving state funding for matters covered by this document</b> ..... Not Applicable <input checked="" type="checkbox"/> Other: <b>All Public Entities</b> ..... Guideline <b>Definitions:</b> <b>Standard</b> - Adherence is required. Certain exceptions and conditions may appear in this document, all other deviations from the standard require prior approval (see Section 3.2). <b>Guideline</b> - Adherence is voluntary.
---------------	--

Status	<input type="checkbox"/> Adopted <input checked="" type="checkbox"/> Draft <input type="checkbox"/> Other: _____
Dates	<b>Date: Draft February 7, 2007</b> Date Adopted by NITC: Other:

Prepared by: Technical Panel of the Nebraska Information Technology Commission  
Authority: Neb. Rev. Stat. § 86-516(6)  
<http://www.nitc.state.ne.us/standards/>

## **1.0 Standard**

The State of Nebraska recognizes the National Institute of Standards and Technology (NIST) as the adopted author of deployment configurations that provide minimum baselines of security for servers on the State of Nebraska network. As such, all state agencies, boards and commissions will comply with NIST standards, guidelines, and checklists as identified in Appendix A.

NIST provides instructions, recommendations, and considerations to assist readers in deploying servers in a secure method. All State of Nebraska System Administrators should examine NIST documents when installing and or configuring servers. The documents are not all inclusive, but rather meant as a means of prompting and guiding Administrators through the installation process.

## **2.0 Purpose and Objectives**

Information technology (IT) is a vital resource to the State of Nebraska; therefore it is critical that services provided by these systems are able to operate effectively.

The purpose of this standard is to establish base configurations and minimum server standards on internal server equipment that is owned and/or operated by the State of Nebraska. Effective implementation of this policy will minimize unauthorized access and other IT security related events to the State of Nebraska's information and technology systems.

## **3.0 Applicability**

### **3.1 State Government Agencies**

All State agencies, boards, and commissions, excluding higher education institutions, which deploy servers on the State of Nebraska network.

### **3.2 Exemption**

Exemptions may be granted by the NITC Technical Panel upon request by an agency.

#### **3.2.1 Exemption Process**

Any agency may request an exemption from this standard by submitting a "Request for Exemption" to the NITC Technical Panel. Requests should state the reason for the exemption. Reasons for an exemption include, but are not limited to: statutory exclusion, federal government requirement, or financial hardship. Requests may be submitted to the Office of the NITC via e-mail or letter (Office of the NITC, 501 S 14th Street, Lincoln, NE 68509). The NITC Technical Panel will consider the request and grant or deny the exemption. A denial of an exemption by the Technical Panel may be appealed to the NITC.

## **4.0 Responsibility**

### **4.1 NITC**

The NITC shall adopt minimum technical standards, guidelines, and architectures upon recommendation by the technical panel. (Neb. Rev. Stat. § 86-516(6))

### **4.2 Agency and Institutional Heads**

The highest authority within an agency or institution is responsible for the protection of information resources, including developing and implementing information security programs, consistent with this standard. The authority may delegate this responsibility but delegation does not remove the accountability.

### **4.3 Agency Information Officer**

In most cases, the highest authority within an agency or institution delegates the general responsibility for security of the agency's information technology resources to the agency's highest-ranking information technology professional. This responsibility includes

development and promulgation of agency-specific information security policies, including installation, and configurations of all servers present on the state's network.

#### **4.4 Agency System or Network Administrator**

In most cases, the authority within an agency or institution responsibility for the day-to-day system, network and/or security administration of the agency's information technology resources. This responsibility includes ensuring due diligence to security best practices is performed when any server is made available on the state's network

### **5.0 Related Standards and Guidelines**

5.1 NITC Security Policies

[http://www.nitc.state.ne.us/tp/workgroups/security/security\\_policies.html](http://www.nitc.state.ne.us/tp/workgroups/security/security_policies.html)

5.2 NITC Security Officer Handbook

[http://www.nitc.state.ne.us/standards/security/so\\_guide.doc](http://www.nitc.state.ne.us/standards/security/so_guide.doc)

## ***Appendix A***

NIST Security Configuration Checklists Repository  
<http://csrc.nist.gov/checklists/repository/index.html>

NIST SP 800-70, The NIST Security Configuration Checklists Program,  
[http://csrc.nist.gov/checklists/download\\_sp800-70.html](http://csrc.nist.gov/checklists/download_sp800-70.html)

NIST SP 800-68, Guidance for Securing Microsoft Windows XP Systems for IT Professionals:  
A NIST Security Configuration Checklist, [http://csrc.nist.gov/itsec/download\\_WinXP.html](http://csrc.nist.gov/itsec/download_WinXP.html)

NIST SP 800-44, Guidelines on Securing Public Web Servers,  
<http://csrc.nist.gov/publications/nistpubs/800-44/sp800-44.pdf>



# Nebraska Information Technology Commission

## STANDARDS AND GUIDELINES

### SMTP Routing Standard

Category	<b>Security Architecture</b>
Title	<b>SMTP Routing Standard</b>
Number	

Applicability	<input checked="" type="checkbox"/> State Government Agencies <input type="checkbox"/> All.....Not Applicable <input checked="" type="checkbox"/> <b>Excluding higher education institutions</b> .....Standard <input type="checkbox"/> State Funded Entities - <b>All entities receiving state funding for matters covered by this document</b> .....Not Applicable <input type="checkbox"/> Other: <b>All Public Entities</b> .....Not Applicable  <b>Definitions:</b> <b>Standard</b> - Adherence is required. Certain exceptions and conditions may appear in this document, all other deviations from the standard require prior approval (see Section 3.2). <b>Guideline</b> - Adherence is voluntary.
---------------	--

Status	<input type="checkbox"/> Adopted <input checked="" type="checkbox"/> Draft <input type="checkbox"/> Other: _____
Dates	<b>Date: Draft February 7, 2007</b> <b>Date Adopted by NITC:</b> <b>Other:</b>

Prepared by: Technical Panel of the Nebraska Information Technology Commission  
 Authority: Neb. Rev. Stat. § 86-516(6)  
<http://www.nitc.state.ne.us/standards/>

## **1.0 Standard**

All inbound and outbound SMTP traffic will be routed through the State of Nebraska's SPAM / Anti-Virus appliance that is managed by the Office of the CIO

## **2.0 Purpose and Objectives**

All inbound and outbound SMTP traffic must be routed through the State of Nebraska's SPAM / Anti-Virus appliance to ensure that email and attachments within emails are properly scanned for viruses, SPAM, and that all content complies with State of Nebraska policies including privacy concerns.

## **3.0 Applicability**

### **3.1 State Government Agencies**

All State agencies, boards, and commissions, excluding higher education institutions, are required to comply with the standard listed in Section 1.0.

### **3.2 Exemption**

Exemptions may be granted by the NITC Technical Panel upon request by an agency.

#### **3.2.1 Exemption Process**

Any agency may request an exemption from this standard by submitting a "Request for Exemption" to the NITC Technical Panel. Requests should state the reason for the exemption. Reasons for an exemption include, but are not limited to: statutory exclusion, federal government requirement, or financial hardship. Requests may be submitted to the Office of the NITC via e-mail or letter (Office of the NITC, 501 S 14th Street, Lincoln, NE 68509). The NITC Technical Panel will consider the request and grant or deny the exemption. A denial of an exemption by the Technical Panel may be appealed to the NITC.

## **4.0 Responsibility**

### **4.1 NITC**

The NITC shall be responsible for adopting minimum technical standards, guidelines, and architectures upon recommendation by the technical panel. (Neb. Rev. Stat. § 86-516(6))

### **4.2 State Agencies**

Each state agency will be responsible for ensuring that all SMTP traffic, both inbound and outbound pass through the State of Nebraska's SPAM / Anti-Virus appliance.

## **5.0 Related Documents**

**5.1** NITC Network Security Policy (<http://www.nitc.state.ne.us/standards/index.html>)

## **6.0 References**

**6.1** National Institute Standards and Technology (NIST) Special Publication, 800-45, "Guidelines on Electronic Mail Security". (<http://csrc.nist.gov/publications/nistpubs/800-45/sp800-45.pdf>).



# Nebraska Information Technology Commission

## STANDARDS AND GUIDELINES

### DNS Forwarding Standard

Category	<b>Security Architecture</b>
Title	<b>DNS Forwarding Standard</b>
Number	

Applicability	<input checked="" type="checkbox"/> State Government Agencies <input type="checkbox"/> All.....Not Applicable <input checked="" type="checkbox"/> <b>Excluding higher education institutions</b> .....Standard <input type="checkbox"/> State Funded Entities - <b>All entities receiving state funding for matters covered by this document</b> .....Not Applicable <input type="checkbox"/> Other: <b>All Public Entities</b> .....Not Applicable  <b>Definitions:</b> <b>Standard</b> - Adherence is required. Certain exceptions and conditions may appear in this document, all other deviations from the standard require prior approval (see Section 3.2). <b>Guideline</b> - Adherence is voluntary.
---------------	--

Status	<input type="checkbox"/> <b>Adopted</b> <input type="checkbox"/> <b>Draft</b> <input type="checkbox"/> <b>Other:</b> _____
Dates	<b>Date: Draft February 7, 2007</b> <b>Date Adopted by NITC:</b> <b>Other:</b>

Prepared by: Technical Panel of the Nebraska Information Technology Commission  
 Authority: Neb. Rev. Stat. § 86-516(6)  
<http://www.nitc.state.ne.us/standards/>

## **1.0 Standard**

All outbound (Internet) DNS traffic must be forwarded through the State of Nebraska's internal DNS servers.

## **2.0 Purpose and Objectives**

All outbound (Internet) DNS traffic must be forwarded through the State of Nebraska's internal DNS servers that are managed by the Office of the CIO.

## **3.0 Applicability**

### **3.1 State Government Agencies**

All State agencies, boards, and commissions are required to comply with the standard listed in Section 1.0.

### **3.2 Exemption**

Exemptions may be granted by the NITC Technical Panel upon request by an agency.

#### **3.2.1 Exemption Process**

Any agency may request an exemption from this standard by submitting a "Request for Exemption" to the NITC Technical Panel. Requests should state the reason for the exemption. Reasons for an exemption include, but are not limited to: statutory exclusion, federal government requirement, or financial hardship. Requests may be submitted to the Office of the NITC via e-mail or letter (Office of the NITC, 501 S 14th Street, Lincoln, NE 68509). The NITC Technical Panel will consider the request and grant or deny the exemption. A denial of an exemption by the Technical Panel may be appealed to the NITC.

## **4.0 Responsibility**

### **4.1 NITC**

The NITC shall be responsible for adopting minimum technical standards, guidelines, and architectures upon recommendation by the technical panel. (Neb. Rev. Stat. § 86-516(6))

### **4.2 Office of the CIO**

The Office of the CIO will be responsible for installing, maintaining and managing the External DNS servers for the State of Nebraska. All other DNS inquiries will be dropped at the State's firewall.

### **4.3 State Agencies**

Each state agency will be responsible for ensuring that all outbound (Internet) DNS traffic is routed through the State of Nebraska's internal DNS servers. Agency servers will not be allowed to perform 'Internet' lookup's for an address. This will prevent a user from performing a direct DNS lookup and being returned a 164.119.x.x address instead of the authorized 10.x.x.x address.

## **5.0 Related Documents**

**5.1** NITC Network Security Policy (<http://www.nitc.state.ne.us/standards/index.html>)

**Nebraska Information Technology Commission**

**Government Technology Collaboration Fund  
Grant Request**

<b>Project Title</b>	<b>Nebraska Geospatial Data Sharing and Web Services Network</b>
<b>Agency/Entity</b>	<b>Office of the CIO</b>

## A Proposal

# Establishing a Nebraska Geospatial Data Sharing and Web Services Network

The screenshot shows the Nebraska.gov website header with the text "Nebraska.gov The Official Website of Nebraska" and "GEOSPATIAL DATA SHARING WEB SERVICES NETWORK". Below the header is a blue banner with a world map on the left and a list of services on the right: "FEDERAL GEOSPATIAL DATA", "EROS DATA CENTER", "ESRI GEOGRAPHY NETWORK", "GOOGLE MAPS", and "VIRTUAL EARTH".

MAPS	DATA	HELP
AJKDFLAF ADJFLJALDD AFALFDJLAJ ADFK	AJKDFLAF ADJFLJALDD AFALFDJLAJ ADFK	AJKDFLAF ADJFLJALDD AFALFDJLAJ ADFK
AJDFAJFDJLKAJ JDAK ADFLAJFDLJLDA	AJDFAJFDJLKAJ JDAK ADFLAJFDLJLDA	AJDFAJFDJLKAJ JDAK ADFLAJFDLJLDA
ADKFLJALDFJL AJLDFJ AFDULAIFLKDUL	ADKFLJALDFJL AJLDFJ AFDULAIFLKDUL	ADKFLJALDFJL AJLDFJ AFDULAIFLKDUL

Below the table are three sections: "ADDRESS PHONE NUMBER" (with a telephone icon), and "GEOSPATIAL BLOG". On the left side of the lower section is a map of Omaha, Nebraska, with a callout box for "Quest Center Omaha" and the date "April 3-5, 2007".

Graphic: courtesy of Jeff Arnold, Geoage

**Section 1: General Information**

Project Title	Nebraska Geospatial Data Sharing and Web Services Network
Agency (or entity)	Office of the CIO

Contact Information for this Project:

Name	Larry Zink
Address	502 S. 14 <sup>th</sup>
City, State, Zip	Lincoln, NE 68508
Telephone	402-471-3206
E-mail Address	Larry.Zink@cio.ne.gov

**Section 2: Executive Summary**

This proposal is a request for partial startup funding of a two-year project to establish the Nebraska Geospatial Data Sharing and Web Services Network and to lay the foundation for its long-term sustainability. This project is a collaborative interagency, intergovernmental project to develop an enterprise-level GIS/Geospatial Data Sharing Network and Web Services portal for Nebraska. Geospatial data is data that contains information about the physical location (street address, latitude/longitude, etc.) of data elements and can be mapped and/or integrated with other data based on common or proximate locations. This geospatial data portal will facilitate interactive data access and exchange between state, local, federal agencies, the private sector and the general public. The project will provide for both private/secured and open data access protocols for specific datasets. The project will utilize the latest online GIS (Geographic Information System) mapping technologies to provide a foundation upon which public agencies can build their own agency-specific online geospatial analysis/mapping applications. Agency applications could be for either external data/map sharing and/or internal-only use and they could be built to rely on agency-only data or use the data-sharing network to integrate data from multiple sources.

Some agencies currently provide online data access and/or online GIS/mapping services, and the project will not duplicate those efforts, but will instead provide interactive links to those existing services through the geospatial portal. Where agencies do not currently provide online data access or online mapping services, the project will provide agencies with the opportunity to store their geospatial data in a data repository. This data could then be made available through the data-sharing network and web mapping services to other entities — in either an open or secure environment. The project will also provide limited technical assistance to help agencies establish online linkages to the data-sharing network and develop online applications based on the project’s infrastructure and access to a wide range of geospatial data.

**Section 3: Goals, Objectives, and Projected Outcomes (15 Points)**

1. Describe the project, including:
  - Specific goals and objectives;
  - Expected beneficiaries of the project; and
  - Expected outcomes.

**Goal.** Develop a Nebraska enterprise-level geospatial web portal, with Internet mapping and data services, to serve the users of Nebraska related GIS/geospatial data and enable those users to efficiently and reliably find, access, display, and build public information applications utilizing the geospatial data maintained by a wide variety of state, local and federal agencies.

**Objectives of this two year project**

- 1. Create Data-sharing Network.** Create an online geospatial data-sharing network, which will allow public agencies to share their geospatial data with other public agencies and/or the public and the private sector via live interactive links to their most up-to-date data.
- 2. Develop Data-sharing Security Protocols.** Develop data access security protocols and mechanisms for the geospatial data-sharing network, which will enable data-sharing agencies to allow either full open public access and/or password-controlled access to specific datasets and/or functionalities.
- 3. Provide Enterprise Internet Mapping Services.** Implement an enterprise-level online GIS Internet mapping service to enable public agencies to share/publish/display their geospatial data and to enable users to combine, map, analyze, display and download geospatial datasets from multiple agencies.
- 4. Establish Enterprise Geospatial Data Repository.** Develop an enterprise-level geospatial data repository, which will allow public agencies to maintain up-to-date copies of selected agency geospatial datasets on enterprise data servers and provide online access to those datasets through the data-sharing network and/or the GIS Internet mapping service.
- 5. Empower Public Agencies.** Strengthen the capability of public agencies to fulfill their missions by providing them with new tools to develop customized, agency-specific online GIS applications through the utilization of the enterprise-level infrastructure, technical support, and access to data from multiple agencies that will be provided by this project.
- 6. Improve Public Services.** Improve public services by enabling the general public and other agencies to access and display an agency's information via a more user-friendly, intuitive graphical map interface rather than tabular data formats. Make public policy implementation more consistent and coordinated across state and local agencies by making commonly needed, up-to-date data more readily accessible to all.
- 7. Save Public Resources.** Save public resources by making these public investments for hardware, software, and technical support resources at the enterprise level and thereby minimize the need to duplicate these investments at every public agency. Save resources by reducing the likelihood of duplicate data investments, by making it easier to reliably find and access similar geospatial data that is available at other agencies. Save resources by developing data-sharing protocols at the enterprise level instead of the individual agency-to-agency level, which would then need to be revised or synchronized when other agencies' data-sharing protocols conflict.
- 8. Facilitate Data-sharing.** Facilitate data-sharing between public agencies at the state, local and federal level by making it easier to find and access data of the specific type of data needed that may be available at another agency. Facilitate data-sharing by requiring data listed on the data-sharing network to be documented with formal metadata (data about the data). Facilitate data-sharing by arranging, in advance, specific data-sharing agreements, which outline the understandings related to sharing of a specific dataset.

**Expected Beneficiaries:**

**Public agencies** will gain reliable access to current geospatial data that is maintained by others and to an online enterprise-level geospatial applications development platform.

**Public agencies** that currently do not have the technical expertise, hardware, software, and/or collaboration agreements with other agencies will gain an enhanced ability to display and analyze geospatial data at a minimal startup cost for the agency,

**Private Sector** will gain enhanced access to public information in a more intuitive and graphically enabled format more suited for making their business decisions.

**General Public** will gain enhanced access to public information presented in a more intuitive graphical mapping format.

#### **Expected Outcomes:**

An Enterprise-level GIS/Geospatial Data Sharing Network and the Web Services portal which will address the expanding needs of public/private Nebraska GIS users and applications are the primary expected result of this project. Increased efficiency, reduced duplication, expanded services, and increased access to existing state, local and federal Nebraska-related geospatial data is also expected. This Data Sharing Network portal will facilitate intergovernmental access and integration of geospatial data from a wide variety of state/local and federal agencies and serve a wide range of public applications requiring current geospatial data.

2. Describe the measurement and assessment methods that will verify that the project outcomes have been achieved.

The Nebraska GIS Steering Committee, with the support of the Office of the CIO, will provide oversight and will establish policy and standards for implementation and operation of the **Nebraska Geospatial Data Sharing and Web Services Network**. Day-to-day management will be guided by an intergovernmental advisory committee identified by the Steering Committee.

A preliminary two-year timeline of project milestones and deliverables has been developed by the Project Team. These will be reviewed and refined when the project technical lead and support staff become available. A summary of these proposed deliverables is provided below. While these milestones and deliverables very well may need to be adjusted as the project progress, they will provide a visible means of verifying project outcomes that have been achieved. A more detailed breakout of this preliminary two-year project timeline and milestones is available in Section 6, question 10.

#### Year 1 Deliverables

- Staff the project and develop administrative model
- Develop initial proposal for overall Project Architecture
- Initial development of standards (e.g., data exchange, network, documentation)
- Initial assessment of security needs
- Identify and acquire hardware and software for Year 1
- Initiate data-sharing agreements process
- Establish network for data exchange
- Build and populate repository storage as necessary
- Build and populate Phase 1 web site for data exchange
- Hold workshops for users – training and system assessment
- Prepare a report detailing lessons learned, standards adopted, and needs to be addressed during the next project phases

#### Year 2 Deliverables

- Conduct user's assessment of Year 1 accomplishments/prototype portal
- Enhance automated data access with additional non-sensitive data (e.g., aerial and satellite imagery, dynamic data such as climate and drought data)
- Refine requirements for operations and maintenance and acquisition of initial dedicated technical staff resources

- Finalize processes for moving data between participating agencies
- Finalize standards development
- Finalize security processes and protocols
- Finalize administrative model and needs (long term funding plan)
- Finalize data-sharing agreement protocols
- Finalize requirements for operations and maintenance
- Initiate sharing of web-mapping services and base geospatial information from the open public access/view component of the project with GOS and The National Map.
- Hold workshops for users – training and system assessment
- Prepare a report detailing needs to be addressed during the next project phases

3. Describe the project's relationship to your agency comprehensive information technology plan.

This Nebraska Geospatial Data Sharing and Web Services Network project proposal has been developed by the Office of the CIO, in conjunction with, and in response to, an NITC GIS Shared Services initiative jointly sponsored by the NITC State Government Council and the Nebraska GIS Steering Committee. The Office of the CIO worked with these two IT coordinating entities to convene a GIS Shared Services Working Group to develop a proposal for implementing an enterprise-level Internet mapping service and geospatial data-sharing network, which was defined as a desired Shared Service in the 2006 NITC Statewide Technology Plan. Most recently, this GIS Shared Services initiative was outlined on page 52 of the NITC's Statewide Technology Plan, *Digital Nebraska: Envisioning Our Future 2007 Update*.

**Implement Geographic Information System (GIS) as a shared service.**

**Action:** *Develop a plan for the coordinated delivery of Internet mapping services by state agencies, with the objectives of making GIS services and existing GIS/geospatial data readily available to a broader array of agencies, improving data access and services to the public, minimizing unnecessary duplication of effort, providing data and system backup, and where appropriate, provide for a coordinated security system, including the possibility for limited data access and password protection.*

**Participating Entities:** *State Government Council; GIS Steering Committee*

**Timeframe:** *Follow-up implementation planning in 2007.*

**Funding:** *Initial planning should be possible with existing resources available for agencies currently providing or developing Internet mapping services. More detailed planning and implement may require additional resources, which would become clear as a result of the initial planning.*

**Status:** *Continuation. Interagency working group has developed a consensus Project Charter and an initial pilot demo of a geospatial data exchange and web services network. A \$43,000 grant has been secured.*

**Section 4: Project Justification / Business Case (25 Points)**

4. Provide the project justification in terms of tangible benefits (i.e. economic return on investment) and/or intangible benefits (e.g. additional services for customers).

A high percentage of the decisions made in government and industry, and many day-to-day decisions made by individuals, are substantially based on analyses of geospatial data. These include decisions related to property valuation and taxation, redistricting, drought management, grazing management, school bus routing, economic development, water pollution mitigation, water rights management, soil

conservation, wildfire risk assessment, dispatching emergency vehicles, homeland security, law enforcement, public health and literally hundreds of others. GIS technology cuts across virtually all of the social and natural sciences, business, agronomy, medicine, planning, law, emergency services, engineering and computer science – in short, every area of endeavor in which maps have traditionally been employed. Today, GIS is one of the fastest growing information technologies.

Much of the power of GIS lies in its ability to facilitate integration and analysis of data from multiple sources. As the use of GIS has expanded across Nebraska (Table 1), the need for users to quickly and reliably identify, access and share data across institutional and jurisdictional boundaries has become acute.

Table 1. Some Nebraska Agencies Using GIS

Conservation and Survey Division, University of Nebraska-Lincoln	Lincoln Electric System
Nebraska Department of Environmental Quality	Hastings/Adams County
Nebraska Department of Health and Human Services	Lincoln/Lancaster County
Nebraska Department of Natural Resources	Omaha/Douglas County
Nebraska Department of Roads	Grand Island/Hall County
Nebraska Emergency Management Agency	Scottsbluff/Scotts Bluff County
Nebraska Game & Parks Commission	Kearney/Buffalo County
Nebraska National Guard	Sarpy County
Nebraska Natural Resources Districts	Merrick County
Nebraska Department of Property Assessment and Taxation	U.S. Army Corps of Engineers, Omaha District
Nebraska Public Service Commission	U.S. Geological Survey Nebraska Science Center
Nebraska Public Power District	U.S. Environmental Protection Agency
Nebraska State Data Center, University of Nebraska-Omaha (census data)	U.S. Department of Agriculture Farm Services Agency (Nebraska Office)
Nebraska State Surveyor's Office	U.S. Department of Agriculture Natural Resources Conservation Service (Nebraska Office)
U.S. Fish and Wildlife Service (Nebraska Office)	Resources Conservation Service (Nebraska Office)
Omaha Public Power District	U.S. Department of Agriculture Farm Services Agency (Nebraska Office)

The challenge of facilitating broad and easy access to the growing array of geospatial data is not limited to Nebraska. Most states and federal agencies, and many local governments are struggling with how best to address this need. The federal government has taken the lead in attempting to resolve such issues among federal agencies. The most noteworthy efforts include **Geodata.gov (Geospatial One-Stop)** (<http://gos2.geodata.gov/wps/portal/gos>) operated under the auspices of the Federal Geographic Data Committee and **The National Map** (<http://nationalmap.gov/>) developed by the U.S. Geological Survey. In addition, the Environmental Systems Research Institute (ESRI), a private GIS software firm, provides the **Geography Network** (<http://www.geographynetwork.com/>). These portals generally provide a variety of tools to facilitate searches for data and often allow users to view and download data. Datasets developed by federal agencies are often readily accessed with these sites, but data from state and local governments is only sporadically available.

Many states have, in recent years, developed geospatial data portals that emulate, and often improve on, services offered by the national portals. Such sites are tailored to meet specialized needs of each state's agencies and other clients.

Table 2. Some Existing State Geospatial Data Portals

California Spatial Information Library – <http://gis.ca.gov/index.epi>  
North Carolina One Map - <http://www.nconemap.com/>  
Delaware Geospatial Information Clearinghouse - <http://maps.rdms.udel.edu/Portal/>  
Arkansas GeoData Clearinghouse - <http://www.geostor.arkansas.gov/Portal/index.jsp>  
Missouri Spatial Data Information Service - <http://www.msdis.missouri.edu/>  
Kansas Geospatial Community Commons - <http://www.kansasgis.org/>  
Wisconsin Land Information Clearinghouse - <http://www.sco.wisc.edu/wisclinc/index.php>  
Arizona GeoData Portal - <http://agic.az.gov/portal/main.do>  
Kentucky GeoPortal - <http://kgsweb.uky.edu/arcimsSearch.asp>

A few agencies in Nebraska have made significant efforts to assist GIS users in identifying and accessing selected data. On a statewide basis, the most noteworthy is the work of the Nebraska Department of Natural Resources (NDNR) which has continually enhanced its Data Bank over the past 20 years (<http://www.dnr.ne.gov/databank/geospatial.html>). The Conservation and Survey Division (CSD) of UNL has also provided a web site that assists users in finding and acquiring geospatial data (<http://csd.unl.edu/general/gis-datasets.asp>). The Center for Advanced Land Management Information Technologies (CALMIT) at the University of Nebraska-Lincoln uses IMS (Internet Map Server) technology to provide access to selected satellite imagery and to datasets on land use (<http://www.calmit.unl.edu/cohyst/>). The Nebraska Game & Parks Commission (NGPC) has recently begun to implement an IMS (Internet Map Server) site to access some of that agency's data.

Locally, the City of Lincoln and Lancaster County have been leaders in developing user access to local government GIS data (<http://ims.lincoln.ne.gov/gisweb/home.htm>). The City of Omaha/Douglas County, Sarpy County, Scottsbluff County, and others are also developing online access portals to local GIS data. And regional agencies such as the Lower Platte North Natural Resources District have implemented extraordinarily useful IMS-based tools such as NRD MapMaker (<http://www.lpnrd.org/projects/gis/mapmaker.html>).

Although several Nebraska agencies have made much progress in GIS and some provide online access to geospatial data, no site currently provides anything close to comprehensive access to the Nebraska-related geospatial data maintained by local, regional, state and federal agencies. At the present time, no Nebraska agency is charged with the responsibility for operating such a site or funded to provide such services.

Because of the lack of such a comprehensive Nebraska geospatial portal, it is often difficult for agencies to find and arrange for access to needed existing data. It is also difficult to assure that one agency has a copy of the most recent version of a dataset that is maintained by another agency. Consequently, many agencies expend considerable technical resources in finding, accessing and maintaining up-to-date versions of existing geospatial datasets, or in some cases duplicating existing datasets. While it will undoubtedly take a period of time to develop the interagency relationship that will allow anything near a comprehensive geospatial portal to be developed, this intergovernmental project is designed to put in place the technical foundation and the initial intergovernmental coordination and agreements necessary to build and sustain such a portal.

In many ways, this proposed project reflects the goals outlined in the NITC mission statement:  
*"The mission of the Nebraska Information Technology Commission is to make the State of Nebraska's information technology infrastructure more accessible and responsive to the needs of its citizens, regardless of location, while making investments in government, education, health care and other services more efficient and cost effective."*

5. Describe other solutions that were evaluated, including their strengths and weaknesses, and why they were rejected. Explain the implications of doing nothing and why this option is not acceptable.

Several nuances/options were considered in developing a proposal which was consistent with the charge of the NITC GIS Shared Services action item to "Develop a plan for the coordinated delivery of Internet mapping services by state agencies, with the objectives of making GIS services and existing GIS/geospatial data readily available to a broader array of agencies, improving data access and services to the public, minimizing unnecessary duplication of effort, providing data and system backup, and where appropriate, provide for a coordinated security system, including the possibility for limited data access and password protection".

Centralized versus Decentralized Data Repository. Among the options evaluated was a design consideration as to whether the system would be designed around a requirement that all served geospatial data would be hosted by and served from an enterprise-level geospatial data repository server(s). This option was ultimately rejected in favor of allowing agencies the option of either copying data to and serving data from an enterprise-level data repository or allow agencies to arrange for online linkages, through the geospatial portal, to their data via existing online data and/or mapping services. Providing linkages to existing agency online data and/or mapping services make it more likely that the most current version of the data will be accessible to users. Requiring all data to be stored on an enterprise data repository would have significantly increased the storage and management requirements related to maintaining a data repository. Some agencies have also expressed reluctance to relinquish control of their sensitive data by copying it to a data repository server. On the other hand, by building an enterprise-level data repository in the proposed system design, the project will enable agencies that do not currently provide online data and mapping services to partner in this effort by making their data available through the data repository. Some agencies that currently have online data services have also indicated that they may choose to use the data repository, as a means to minimize the impact of system users upon their internal data servers. Other agencies have expressed an interest in potentially using an automated update of their data in the data repository serving as another means of data backup for them.

Hardware and Software. Another nuance/option considered was the software and hardware upon which to base the development of the system. While the final decision on these items will be deferred until the technical staff for the project can have input, preliminary decisions have been made, which have provided some of the foundation for this proposal. The Working Group has preliminarily decided to base the GIS component on the relative new ESRI product, ArcGIS Server 9.2 and the system's database management functionality around SQL Server software. Additional discussion of the rationale behind these preliminary decisions can be found in Section 5, question 7.

Interagency versus Public Access. Another nuance/option considered was the degree to which this system would be designed around primarily serving the geospatial data exchange needs of state and local agencies as contrasted with a focus on providing open public access to this data. Other perspectives on this contrast might be arranging for secure data access versus arranging for providing open data access; or yet another perspective is the need to design for differing levels of GIS sophistication for the expected users of the system. The Working Group has proposed the development of a system, which will over time seek to address a wide range of expected user needs including secure and non-secure data access; user-friendly front-ends with limited geo-analytic tool availability and also providing access to and support for a wide-range of geo-analytic tools upon which agencies can develop customized applications. The Working Group also recognizes that this will involve a development process, with some of these capabilities developed prior to others.

Institutional Base for Project. Another nuance/option considered was the most appropriate institutional home for this collaborative intergovernmental project. Because no state agency currently has a clearly defined mandate to develop and maintain such an enterprise geospatial data-sharing

network, there was not an obvious choice. Several cooperating agencies had some aspects of the needed technical expertise and experience, technical infrastructure, agency mandates, and institutional management capabilities and flexibilities, but no one agency had all of these perceived requirements. For these reasons, it is proposed that this Geospatial Data Sharing and Web Services Network will be initially developed as a collaborative effort based primarily in the Office of the CIO and the University of Nebraska Center for Advanced Land Management and Information Technology (CALMIT), with active partnerships and collaboration from several state and local agencies. The Office of the CIO will provide the formal institutional home and oversight for the project and will enter into an interagency agreement with UNL-CALMIT to provide technical support services for the project. The Office of the CIO will bring to this project its supportive relationships with the Nebraska GIS Steering Committee and the State Government Council, its project management capabilities, its SQL Server capabilities, its flexible organizational capabilities for IT project management, and its experience in implementing interagency IT project. UNL-CALMIT will bring to this project its in-house GIS expertise, its organizational flexibility in hiring needed GIS technical support and management, and its access to a professional and student community exposed to the latest innovations in GIS technology. Other state and local agencies will be invited to be actively involved in the development and management of this enterprise service. It is proposed that an intergovernmental advisory committee will be convened by the Nebraska GIS Steering Committee to provide on-going technical and policy guidance for the development and maintenance of this enterprise-level service.

“Do Nothing” Option. Currently numerous state, local and federal agencies have purchased and/or invest in maintaining geospatial data to assist in carrying out their assigned agency mission. Some of these state or local agencies also provide limited agency-specific online access and/or Internet mapping services related to the geospatial data that they maintain. There are also many public geospatial datasets that are not currently available via online access. Most agencies also acquire copies of other geospatial datasets that have been purchased and/or are maintained by other state, local or federal agencies for use as a part of their geospatial data analyses. In most cases this transfer of geospatial data from one agency to another is accomplished via unique agency-to-agency, one-point-in-time file transfer agreements and arrangements, using either Internet download or portable hard drives. There is currently no functioning enterprise-level Nebraska geospatial portal where an agency can go to find, access and download the broad cross-section of available geospatial data related to Nebraska. The “doing nothing” option would likely result in a continuation of the slow proliferation of agency-specific online portals for their particular agency’s geospatial data and the further development of a complex web of overlapping agency-to-agency specific agreements for one-point-in-time data transfer arrangements. A considerable amount of agency technical personnel time and resources are involved in finding and arranging for these data transfers. Because these arrangements are agency specific, when another agency is interested in the same data, the processes (and therefore the technical resource requirements) start all over again.

6. If the project is the result of a state or federal mandate, please specify the mandate being addressed.

This project is not the result of a specific state or federal mandate. However, it is the direct result of a Shared Services initiative endorsed by the NITC State Government Council and the Nebraska GIS Steering Committee and included in the NITC Statewide Technology Plan. Numerous national studies and white papers have addressed the importance of GIS/geospatial coordination and have pointed to the pivotal role of strong state GIS coordinating councils in facilitating data-sharing across all levels of government. As the technology and coordinating structures have evolved, state geospatial portals, such as the one proposed in this project, are becoming a key tool for facilitating geospatial data-sharing.

Federal Geographic Data Committee’s Fifty States Initiative

[http://www.nsgic.org/hottopics/fiftystates\\_initiative.pdf](http://www.nsgic.org/hottopics/fiftystates_initiative.pdf)

National States Geographic Information Council - A State Model for Coordination of Geographic Information Technology [http://www.nsgic.org/states/statemodel\\_git.pdf](http://www.nsgic.org/states/statemodel_git.pdf)

## Section 5: Technical Impact (20 Points)

7. Describe how the project enhances, changes or replaces present technology systems, or implements a new technology system. Describe the technical elements of the project, including hardware, software, and communications requirements. Describe the strengths and weaknesses of the proposed solution.

There are currently over 100 statewide, regional and local geospatial datasets, and thousands of aerial and satellite images, now available for Nebraska. Collectively, these datasets probably currently total at least 50 Terabytes (Tb) of disk storage (note that 10 Tb = printed collection of the Library of Congress). These data constitute an invaluable resource for the State. There is currently no central access point to find and access this wealth of Nebraska-related data.

This project will lay a solid foundation for the development of a centralized geospatial portal, which will enable users of Nebraska-related geospatial data to find, display and download available data. The project will also provide the online geospatial tools and interagency data access that will enable public agencies to develop customized online GIS applications (internal or external) to further the accomplishment of their agency missions. The project will not replace, but will build on and provide a central access point for existing, distributed online geospatial data and mapping services currently provided by state, local and federal agencies. The project will also provide a geospatial data repository which will enable agencies which maintain geospatial data, but do not currently provide online data access or mapping services related to their data to provide other agencies and the public with access to their data.

**Hardware and Software.** While the final decision on hardware and software will be deferred until the lead technical staff for the project can have input, preliminary decisions have been made, which have provided some of the foundation for this proposal. The two primary software components are the online GIS data/mapping server and the database management system. The Working Group has preliminarily decided to base the GIS component on the relatively new version of ESRI ArcGIS Server 9.2, which was designed specifically for this type of application. ESRI is the GIS software vendor used by the vast majority of the state and local partners in this project. The use of this software will make it very likely that the software used by these project partners will be compatible with this online GIS server engine and that the project partners will be familiar with the software tools. The one significant exception to this pattern is the Nebraska Department of Roads that primarily uses Intergraph and GeoMedia GIS software. However, NDOR also uses ESRI products and feels comfortable that data-sharing protocols can be arranged. It is expected that a relatively high-end server will be required for the hosting the ArcGIS Server software, but a decision on the specifics of this hardware will be deferred until lead GIS technical support staff can have input. The Working Group has also made a preliminary decision to build the system's database management functionality around SQL Server software. Drivers for this decision include: costs; the availability of SQL Server software, related hardware, and technical assistance within the Office of the CIO; the fact that the existing OCIO SQL Server-related hardware/software capabilities would allow for considerable flexibility in starting small, but expanding the system as it grows; and the fact that ESRI ArcGIS Server software is designed to integrate easily with SQL Server software.

**Communications.** The data communications network for the project will be based on Internet protocols and rely on the existing broadband network to provide connectivity between state and local agencies and existing private Internet connectivity to provide service to the general public and private sector.

8. Address the following issues with respect to the proposed technology:
- Describe the reliability, security and scalability (future needs for growth or adaptation) of the technology.
  - Address conformity with applicable NITC technical standards and guidelines (available at <http://www.nitc.state.ne.us/standards/>) and generally accepted industry standards.
  - Address the compatibility with existing institutional and/or statewide infrastructure.

It is important to note that the number of datasets and data volume will increase annually as new data are digitized, more agencies adopt GIS, and existing datasets are updated. As more agencies use GIS, the demand for data access will increase as well. This growth trend is particularly noteworthy as more local governments adopt GIS technology and state agencies desire ready access to these highly accurate local datasets for state-level applications. This trend towards an increasing demand for online GIS capability and data access will also be heightened as more agencies become comfortable with the concept and the reliability of the proposed Nebraska Geospatial Data Sharing Network. This will result in more data being made available thru the Data Sharing Network and more agency applications being built based on the availability of that Network. The project Working Group is aware of these trends and proposes to build a system with the flexibility to adapt.

**Reliability and Scalability.** The adoption of ESRI ArcGIS Server and SQL Server software to should provide this proposed system with a considerable level of reliability, security, and scalability as these are leading OTS software designed with these considerations in mind. The adoption of the new version ArcGIS Server 9.2 raises some concerns of bugs to be worked through. However, since ESRI is the number one GIS software vendor and this software is a key ESRI initiative, it is likely that there will be considerable support available through ESRI to solve those problems. The Working Group decided that even given these likely problems with a significantly new software product, it did not make sense to design a new system around yesterday's technology. The proposed project is designed around the Office of the CIO SQL Server capability in part because the Working Group felt that the OCIO would take on much of the burden of providing the reliability, security, and scalability on the DMS side.

**Security.** One of the early project implementation foci will be developing the data/network security protocols that will allow participating partners to feel comfortable in selectively sharing geospatial data and services over the Data Sharing Network. Tools to provide that data security are available in both the ArcGIS Server and the SQL Server software and efforts will be made to build upon existing security protocols built into the state's network.

**Standards.** One of the major NITC technical standards that this project will impact is the requirement that state-funded geospatial data be documented with formal metadata describing the data. Data will not be made available on the Data Sharing Network unless it is documented consistent with the NITC Metadata Standard. The adoption of ESRI ArcGIS Server as a foundation software means from a practical point of view the system will be consistent with generally accepted industry standards, since ESRI is the number one GIS software vendor. However, it is also the intention of the project Working Group to develop the system such that data and mapping services will also be available according to Open GIS standards and therefore be vendor neutral.

**Compatibility with Existing Infrastructure.** This project will be designed to build upon and be compatible with existing infrastructure wherever practical. Existing online data and mapping services provided by public agencies will be linked through the portal. The adoption of ArcGIS Server and SQL Server software will enhance system compatibility as they are widely used. The data communication network will be based on existing services and protocols. The portal will be designed to work and communicate with national geospatial portals such as *The National Map*, Geospatial One-Stop, and the ESRI Geography Network. Efforts to comply with Open GIS standards will also increase the level of compatibility with systems that maybe somewhat less in the mainstream.

## Section 6: Preliminary Plan for Implementation (10 Points)

9. Describe the preliminary plans for implementing the project. Identify project sponsor(s) and examine stakeholder acceptance. Describe the project team, including their roles, responsibilities, and experience.

### Project Sponsors

Office of the CIO, on behalf of the  
Nebraska GIS Steering Committee and the NITC State Government Council

### Background and Proposed Implementation Approach

Following the adoption of the Shared Services — Internet Mapping Action Item by the NITC State Government Council and the Nebraska GIS Steering Committee, the Office of the CIO took the lead in convening a broad-based, intergovernmental Project Team to further develop the concept and define an conceptual approach for implementation. In 2006, this Project Team developed a Project Charter, which outlined a broad interagency vision for a Nebraska Geospatial Data Sharing and Web Services Network. This shared vision included a multi-year implementation process and recognized the need for dedicated technical staff to sustain the effort. A listing of the key members of that Project Team is provided below.

**Project Team:** NE CIO: Steve Henderson, Information Technology Manager, Office of the CIO  
NE GIS Steering Committee/CIO: Larry Zink, GIS Coordinator  
NE Dept. of Natural Resources: Steve Rathje, Senior Analyst  
NE Dept. of Environmental Quality: Dennis Burling, Info. Technology Manager  
and Paul Yamamoto, Infrastructure Support Analyst Senior  
NE Dept. of Roads: Jon Ogden, Business Technology Support Manager and  
Steve Brown, GIS Manager  
NE Health and Human Services System: Chris Chalmers, GIS Coordinator  
NE Emergency Management Agency: Sue Krogman, Information Tech. Admin.  
NE Game and Parks Commission: Sudhir Ponnapan, GIS Specialist  
NE Dept. of Agriculture: Tom Jensen, Div. Administrator, Ag. Laboratories and  
Craig Romary, Environmental Programs Specialist  
UNL-Center for Advanced Land Mgmt. Info Tech.: Chad Boshart, Project Mgr.  
Lincoln/Lancaster County: Jim Langtry, GIS Manager, County Engineer's Office  
Omaha/Douglas County: Mike Schonlau, GIS Coordinator  
Sarpy County: Eric Herbert, GIS Coordinator

Although, as previously noted, some federal agencies and other states have implemented geospatial data portals, the work is technically and administratively complex. The Project Team believed that establishing a fully-functional **Nebraska Geospatial Data Sharing and Web Services Network** would take two/three years of effort and dedicated full-time staff. The Team proposed that the project be implemented in phases, each phase designed to achieve concrete deliverables and provide specific advances in interagency data exchange capabilities. Each project phase will build on the previous phase(s). For example, sensitive data will not be available through the data exchange network until the later phases of the project, after security and permission protocols have been developed and tested. As part of this learning and building process, it is expected that the design of the project phases will evolve over time.

**Need for Dedicated Technical Staff.** In the latter half of 2006 and early 2007, a Working Group (a subset of the Project Team) continued efforts to further define and pursue early project implementation steps. While the adopted Project Charter spoke directly to the need for dedicated technical staff to support and lead the project, it also envisioned the possibility of initial steps being

taken based on existing in-house technical staff from project partner agencies. The technical complexity of the project, together with the reality of limited free time of the existing agency technical staff, lead this Working Group to prioritize the pursuit of the dedicated technical resources necessary to lead and support this project. It became clear to the Working Group that while it was reasonable to expect existing agency technical staff to support their particular agency's linkage and participation in the project, it was not realistic to expect those agency technical staff to develop and support the central enterprise-level components of the project. This funding proposal is a response to that perceived need to secure the services of the dedicated technical resources to lead and support this project. See Appendix 1 for the responsibilities and qualifications identified by the above committee as necessary for the Project Manager hired for this project.

In the meantime, the Working Group has continued to flesh out the concepts and the implementation steps related to achieving the vision outlined in the initial Project Charter. The Working Group is proposing the development of a data-sharing and web services system with the following characteristics.

**Distributed System.** A distributed system which will allow public agencies the option of either copying data to and serving data from an enterprise-level data repository or allow agencies to arrange for online linkages, through the geospatial portal, to their existing online data and/or mapping services.

**System Designed for Range of User Needs.** The development of a system, which will over time seek to address a wide range of expected user needs including both secure and non-secure data access. A system designed to provide both user-friendly front-ends with limited geo-analytic tool availability for non-sophisticated GIS users and also provide agencies with access to and support for a wide-range of geo-analytic tools upon which the more GIS sophisticated agencies can develop customized applications. The Working Group also recognizes that this will involve a development process, with some of these capabilities developed prior to others.

**Online or Desktop Use.** The proposed system will allow users to find, access, and download available geospatial data onto their desktop. The system will allow users to display and conduct geospatial analysis online using data from multiple sources and/or the system will allow users to perform geospatial analysis on their desktop while accessing desired datasets via the data-sharing network.

**Compatibility with Existing Infrastructure.** The GIS component of the proposed system will be based on the ESRI product, ArcGIS Server 9.2 and the system's database management functionality around SQL Server software available thru the Office of the CIO. These two popular OTS software packages will insure a high degree of compatibility with existing infrastructure, database formats, and the knowledge base of agency technical staff. To further enhance compatibility, efforts will be made to also comply with Open GIS standards where practical.

**Collaborative Development Model.** Initial development will be a collaborative effort based primarily in the Office of the CIO and the University of Nebraska Center for Advanced Land Management and Information Technology (CALMIT), with active partnerships and collaboration from several state and local agencies. The Office of the CIO will provide the formal institutional home and oversight for the project and will enter into an interagency agreement with UNL-CALMIT to provide technical support services for the project. The Office of the CIO will bring to this project its supportive relationships with the Nebraska GIS Steering Committee and the NITC State Government Council, its project management capabilities, its SQL Server capabilities, its flexible organizational capabilities for IT project management, and its experience in implementing interagency IT project. UNL-CALMIT will bring to this project its in-house GIS expertise, its organizational flexibility in hiring needed GIS technical support and management, and its access to a professional and student community exposed to the latest innovations in GIS technology. Other state and local agencies will be invited to be actively involved in the development and management of this enterprise service. It is proposed that

an intergovernmental advisory committee will be convened by the Nebraska GIS Steering Committee to provide on-going technical and policy guidance for the development and maintenance of this enterprise-level service.

**Startup Funding Development.** The Working Group for this project is dedicated to developing a quality product and service that will garner the institutional support necessary to sustain the project over the long haul. The broad-based support shown in the development of the initial Project Charter for this project demonstrated both the perceived need and a willingness of agencies to support this type of service. The Project Team and its Working Group knows that to develop a IT quality product and service, dedicated skilled technical support and leadership are necessary. The challenge is how one funds the start up of an interagency, intergovernmental collaborative project, such that one can demonstrate the product, determine the costs for on-going support, and then develop the interagency buy-in to a funding model that will sustain the service. This funding proposal is based on the belief that the NITC Government Technology Collaboration Fund and the State Records Board Grant to Improve Access to Public Information are two funding sources with missions ideally suited to help fund this type of project. What is proposed is to two-year funding from both of these funds, that when coupled with other grants, state agency direct contributions and additional in-kind services will allow for the initial development of this service. During this development period, additional information will be gathered and analyzed that will allow for a sustainable funding model to be developed and implemented.

Proposed two-year startup funding package

US Geological Survey Grant	\$43,000	one-time hardware/software funds <u>already obtained</u>
NITC Collaborative Fund	\$150,000	\$75,000 for each of the first two years of the project
State Records Board	\$50,000	\$25,000 for each of the first two years of the project
State Agency Partners *	<u>\$60,000</u>	\$30,000 for each of the first two years of the project
<b>Total two year budget</b>	<b>\$303,000</b>	

\* Does not include the extensive in-kind contributions that are expected from state and local agency in the form of technical support

10. List the major milestones and/or deliverables and provide a timeline for completing each.

**Preliminary Project Plan**

Year 1

- Identify/hire a Project Manager (Appendix1) and technical support staff
- Identify other project staff and obtain commitments of time/resources via MOAs with collaborating agencies (e.g., CIO, NDNR, DOR, UNL)
- Conduct systematic review of existing state and federal prototypes (services, navigation, administration, institutional structure, funding)
- Conduct detailed user needs assessment
- Identify datasets currently available from local, state, regional and federal agencies and establish custodians for each
- Initial development of standards (e.g., data exchange, network, documentation)
- Initial assessment of security needs
- Identify requirements for hardware and software
- Develop initial proposal for overall Project Architecture
- Identify minimum subset of datasets and services to be incorporated into initial phase
- Insure targeted datasets are documented with FGDC-compliant metadata

- Initial specification of administrative model and staffing needs
- Initiate data-sharing agreements process
- Acquire hardware and software needed for Phase I
- Establish network for data exchange
- Initiate agreements with USGS (The National Map) and FGDC
- Build and populate repository storage as necessary
- Build and populate Phase 1 web site for data exchange
- Conduct initial requirements analysis for operations and maintenance
- Hold workshops for users – training and system assessment
- Prepare a report detailing lessons learned, standards adopted, and needs to be addressed during the next project phases

#### Year 2

- Conduct performance analysis of Phase 1 accomplishments/prototype portal (user's assessment)
- Enhance automated data access with additional non-sensitive data (e.g., aerial and satellite imagery, dynamic data such as climate and drought data)
- Refine requirements for operations and maintenance and acquisition of initial dedicated technical staff resources
- Finalize processes for moving data between participating agencies
- Finalize standards development
- Finalize security processes and protocols
- Finalize administrative model and needs (long term funding plan)
- Finalize data-sharing agreement protocols
- Finalize requirements for operations and maintenance
- Initiate sharing of web-mapping services and base geospatial information from the open public access/view component of the project with GOS and *The National Map*.
- Hold workshops for users – training and system assessment
- Prepare a report detailing needs to be addressed during the next project phases

#### Year 3 (beyond current project proposal timeline)

- Implement recommendations, standards, and protocols
- Implement secure sharing of sensitive data within the network
- Implement and expand public view component (map services)
- Implement procedures for long-term maintenance and enhancement of the **Nebraska Geospatial Data Sharing and Web Services Network**. (including funding)

#### 11. Describe the training and staff development requirements.

Existing agency staff will need at least a limited amount of training and staff development to enhance their familiarity with ArcGIS Server 9.2. As the system is developed, training is built into the annual project timeline to familiarize agency personnel on how to use the system. It is envisioned that the technical lead/support personnel hired for this project will take the lead in this training.

#### 12. Describe the ongoing support requirements.

The project proposal is designed around a two-year project implementation process. As part of that implementation process, an assessment will be completed to define the requirement for on-going system support.

**Section 7: Risk Assessment (10 Points)**

13. Describe possible barriers and risks related to the project and the relative importance of each.

Risk Assessment and Mitigation (Questions 13 & 14)

14. Identify strategies which have been developed to minimize risks.

All IT projects have risks. In the previous sections a business case has been made that the best way for Nebraska to proceed in development is to build an enterprise-level geospatial data exchange network and related services. Although the recommendation was based on multiple factors of evaluation this project still has risks. What differentiates successful projects from unsuccessful is proactive assessment and mitigation of risks rather than waiting until the risks become problems. Early detection and mitigation of potential issues is much less time consuming and expensive than is waiting.

This section of the presents the first step in the process to manage risks. The following “Risk Factors Matrix” identifies risks considered in the following categories. Risk assessment for an IT project is about more than technology. Often the most risky items relate to change or leadership.

- Strategic
- Leadership
- Management
- Financial
- User Participation/Considerations
- Project Participants
- Technology

The risk factors were assessed and ranked according to whether the risk of failure associated with each particular factor is High, Medium, or Low. Mitigation strategies were determined for all risk factors determined to be High or Medium.

Risk Factors	High Risk	Medium Risk	Low Risk	Rating H,M,L	Risk Mitigation Strategies
<b>Risk Factors - Strategic</b>					
State Mission and Goals	Project does not support or relate to any state missions or goals.	Project will indirectly impact state goals or mission.	Project directly supports state goals or mission.	L	
Key Agency Mission and Goals	Project does not support or relate to any agency missions or goals.	Project will indirectly impact agency goals or mission.	Project directly supports agency goals or mission.	L	
Process Impact	Project will directly alter the business process.	Project will alter parts or have a slight effect on the business processes	Project will have little or no effect on the business process	M	Each agency will have the flexibility to determine the level of involvement relative to their business processes
Cultural Impact	Reluctance to change Multiple, varying expectations	Slow but steady acceptance	Readily accepted	L	

Nebraska Information Technology Commission

Government Technology Collaboration Fund Grant Request

Risk Factors	High Risk	Medium Risk	Low Risk	Rating H,M,L	Risk Mitigation Strategies
<b>Risk Factors - Leadership</b>					
Budget Office Executive Management Support	No support for project or major unresolved issues.	Budget Office somewhat supportive of the project.	Strong support of the project in expressed by a commitment of resources.	M	Project Team will work to demonstrate and build support for project of 2-yr period
Performance Objectives	No established performance requirements or requirements that are ill-defined and not measurable.	Some performance questions or uncertainty of performance measures.	Verifiable performance, reasonable requirements, and measures clearly defined.	L	
Commitment to Project	Project has little or no support from state leadership	Some support for project expressed but it may be temporary	State leadership strongly committed to success of project.	L	

Risk Factor	High Risk	Medium Risk	Low Risk	Rating H,M,L	Risk Mitigation Strategies
<b>Risk Factors - Management</b>					
Detailed Project Plan	Project plan is non-existent.	Project plan is partially completed	Project plan is in place	M	Prelim.project plan will be updated as dedicated technical leadership resources become available
Project Schedule	Arbitrary and dictated	Planned using external factors	Planned based on scope and resources	M	Plan schedule subject to securing resources for tech. lead. Will be adjusted relative to success in that area
Experience with Similar Projects	No experience with projects of this type.	Moderate experience or experience with different type projects.	Very experienced with similar projects.	M	OCIO experience with interagency IT project implementation, UNL has GIS experience, Experience will be a key factor in hiring decisions for tech. lead
Project Estimation	No real basis for estimates. Little or no verification.	Estimates based on established techniques. Little or no verification.	Estimates based on established techniques and verifiable.	M	Estimates based on established techniques but will be reviewed when technical lead becomes available
Monitoring/ QA Process	No process established or process is ignored.	Process established, not well followed, or is ineffective.	Process well-established, procedures followed, and highly effective.	L	
Change Management Process	No defined process.	Defined, but loosely followed.	Defined and followed.	M	Will be defined when technical lead personnel available
Project Size and Scope	Rapidly changing size or scope, requirements not defined.	Requirements defined and agreed to but changes to scope expected.	Requirements well established and expected to remain stable.	M	Minimum project objectives will be achieved, additional scope to be adjusted relative to resource availability

Nebraska Information Technology Commission  
Government Technology Collaboration Fund Grant Request

Risk Factors – Management (cont)					
Deliverable Requirements Defined	No requirements defined for deliverables or unreasonable requirements.	Some deliverable requirements remain to be defined or are vague and immeasurable.	All deliverable requirements defined, reasonable, and measurable.	L	
Time Allocated for Development	Significant time constraints on project	Moderate time constraints on project	Adequate time is allocated to development.	L	

Risk Factor	High Risk	Medium Risk	Low Risk	Rating H,M,L	Risk Mitigation Strategies
Risk Factors - Financial					
Funding Sources and Constraints	Budget allocation in doubt or subject to change without notice.	Some questionable allocations or doubts about availability.	Funds allocated without constraints.	M	Grants funds still being sought, project will not proceed until secured
Cost Controls	Cost control system lacking or nonexistent.	Cost control system in place but weak in some areas.	Cost controls established, in place, and effective.	M	Preliminary budget items, personnel and hardware, may need to be adjusted relative to market
Economic Justification/Cost Effectiveness	Not justified or cost-effective.	Justification questionable or cost-effectiveness not completely established.	Completely justified and cost-effectiveness proven.	L	
Budget Size	Insufficient budget available to complete project as defined.	Questions remain concerning budget.	Sufficient funds available to complete project as currently defined.	M	Grants funds still being sought, project will not proceed until secured

Risk Factor	High Risk	Medium Risk	Low Risk	Rating H,M,L	Risk Mitigation Strategies
Risk Factors – User Participation/Considerations					
User Training Requirements	Training requirements have not been defined or have not been addressed.	User training needs have been considered but training or training plan is in development.	User training needs considered, training plan in place and in process.	L	

Nebraska Information Technology Commission

Government Technology Collaboration Fund Grant Request

Risk Factor	High Risk	Medium Risk	Low Risk	Rating H,M,L	Risk Mitigation Strategies
<b>Risk Factors – User Participation/Considerations</b>					
User Acceptance	State/court participants have not accepted any of the concepts or design details of the system.	State/court participants have accepted most of the concepts and details of the system and process is in place for user feedback.	State/court participants have accepted all concepts and details of the system and process in place for user feedback.	M	High degree of acceptance of key partners and plans in place for training and orientation
Involvement of Users	Minimal or no user involvement expected on development team.	Users on project team play minor roles or expected to have only moderate impact on system.	User staff highly involved with project team, provide significant input and have significant ownership of system.	L	
Risk Factors	High Risk	Medium Risk	Low Risk	Rating H,M,L	Risk Mitigation Strategies
<b>Risk Factors – Project Participants</b>					
Experience of Staff	Staff has little or no experience with projects of this type and lacks experience with hardware or software.	Project staff has some experience with projects of this type, but lacks experience with hardware or software.	Project staff is highly experienced with projects of this type, and has experience with hardware and/or software.	M	Key agency personnel very familiar with GIS, needed online GIS server skills will be contracted for with grant funds
Availability of and Experience with Productivity Tools	Productivity tools not being used or considered.	Productivity tools available but not being used to full potential, or in process of being implemented and training needed.	Productivity tools being used and staff are trained in use of tools.	M	Training will be needed for agency personnel on use of online GIS server software, technical lead being hired with this skill set
Commitment of Staff	Project staff has little or no commitment to the success of this project.	Project staff states commitments to project, but indications are that commitment is not genuine.	Project staff is highly committed to success of project.	L	
Expertise with Hardware	New hardware, little experience, different technology.	Technology similar to existing systems, and some in-house experience.	Mature technology, current in-house experience, and high experience ratio.	L	
Expertise with Software	New software and no experience with software or similar products.	Some experience with software or similar product.	High experience ratio with software or similar systems.	M	Technical lead being hired with grant funds to lead online GIS server implementation

Nebraska Information Technology Commission

Government Technology Collaboration Fund Grant Request

Risk Factor	High Risk	Medium Risk	Low Risk	Rating H,M,L	Risk Mitigation Strategies
<b>Risk Factors – Project Participants (cont)</b>					
Availability of Users	Users not available for requested functions, e.g., testing, meetings.	Limited availability of users	Full user involvement in requested functions.	L	
Project Manager	Little or no PM experience.	Managing multiple projects.	Experienced and dedicated to project.	M	Technical lead/Project Mgr being hired with grant funds to lead online GIS server implementation
Resource Allocation	No resources assigned. Not recognized as a priority project.	Resources assigned to multiple projects. Multiple priorities.	Dedicated resources	M	Dedicated resources be sought with grant requests and state agency contributions
Staff Turnover	Little or no notice. Little or no documentation.	Some notice. Some documentation.	No loss of staff.	M	Will be a consideration when tech. lead hired, major reason for seeking two-year funding

Risk Factors	High Risk	Medium Risk	Low Risk	Rating H,M,L	Risk Mitigation Strategies
<b>Risk Factors - Technology</b>					
Analysis of Alternatives	Analysis of alternatives not completed, not all alternatives considered, and/or assumptions faulty.	Analysis of alternatives completed, some assumptions questionable, and alternatives not fully considered.	Analysis of alternatives completed, alternatives and options considered, and assumptions verifiable.	L	
Complexity of Requirements	Project is very complex with multiple requirements from many different users; requirements are complex and hard to define.	Project is fairly complex with some requirements more easily defined; several user groups will be aiding in the design.	Requirements are few and easily defined.	M	Need for flexibility built into project design, project partners to be actively involved in implementation, project's 2-yr timeline includes consideration of these factors
System Integration/ Interfaces	Extensive integration of systems or exchange of information or interfaces is a major part of project.	Some integration or interfaces required and/or of some importance to project.	Little or no integration or interfaces required.	H	Need for flexibility and adjustments built into project design and 2-yr timeline, project partners to be actively involved in implementation, software designed to facilitate integration

Nebraska Information Technology Commission

Government Technology Collaboration Fund Grant Request

Risk Factors	High Risk	Medium Risk	Low Risk	Rating H,M,L	Risk Mitigation Strategies
<b>Risk Factors – Technology (cont)</b>					
Fit with Existing Environment	Introduces new technologies to the environment.	Limited use of new technologies.	Uses proven technology that integrates well.	M	ArcGIS Server technology new to OCIO environment, Tech. lead will assist with integration
Maturity of Solution	Leading edge (in operation less than one year) or aged technology (over 5 years old).	State-of-the-art (in operation from 1-3 years).	Mature technology established and proven (in operation 3-5 years).	M	New version of ArcGIS Server, but ESRI tech support will assist
Security	Security requirements not defined.	Some security requirements defined, but complex to implement.	All security requirements defined, and simple to implement.	M	Use of data requiring security will only be introduced into the system after it matures
Platform	Completely foreign platform	Some platform unique code	Familiar platform	M	Familiarity with SQL Server, but ArcGIS Server 9.2 will be new and skills of GIS tech lead will be needed
Accessibility	Previously undefined accessibility requirements.		Accessibility requirements known and within current guidelines.	M	These issues are not yet defined and will need further study

**Section 8: Financial Analysis and Budget (20 Points)**

15. Financial Information

**EXPENSES**

The bulk of the proposed project costs are associated with an interagency agreement between the Office of the CIO and UNL-CALMIT to provide GIS Project Management and Technical Support for this project.

<b>Interagency Agreement with UNL-CALMIT for Project Technical Support</b>		
Project Mgr/Programmer/GIS Support (100% FTE)	\$75,000	\$150,000
Principal Investigator (.05 FTE)	\$6,000	\$12,000
<b>Subtotal - direct personnel costs</b>	<b>\$81,000</b>	<b>\$162,000</b>
Fringe Benefits (28%)	\$22,680	\$45,360
Supplies	\$1,000	\$2,000
Computer Support and Services	\$3,150	\$6,300
Travel	\$4,000	\$8,000
Communications	\$1,000	\$2,000
<b>Subtotal - personnel and other direct costs</b>	<b>\$112,830</b>	<b>\$225,660</b>
Indirect Costs (10%)	\$11,283	\$22,566
<b>Subtotal UNL-CALMIT Interagency Agreement Costs</b>	<b>\$124,113</b>	<b>\$248,226</b>
<b>Other Costs Beyond Univ. Interagency Technical Support Agreement</b>		
Estimated Hardware & Software Purchase Costs		\$43,000
OCIO SQL Server and Technical Support Costs	\$6,000	\$12,000
<b>Two-Year Project Budget Total</b>		<b>\$303,226</b>

---

**INCOME**

**Proposed two-year startup funding package**

US Geological Survey Grant	\$43,000	one-time hardware/software funds <i>already obtained</i>
NITC Collaborative Fund	\$150,000	\$75,000 for each of the first two years of the project
State Records Board	\$50,000	\$25,000 for each of the first two years of the project
State Agency Partners *	<u>\$60,000</u>	\$30,000 for each of the first two years of the project
<b>Total two year budget</b>	<b>\$303,000</b>	

\* Does not include the extensive in-kind contributions that are expected from state and local agency in the form of technical support to integrate their data and systems into Data Sharing Network

16. Provide a detailed description of the budget items listed above. Include:

- An itemized list of hardware and software.
- If new FTE positions are included in the request, please provide a breakdown by position, including separate totals for salary and fringe benefits.
- Provide any on-going operation and replacement costs not included above, including funding source if known.
- Provide a breakdown of all non-state funding sources and funds provided per source.

#### **Hardware and Software**

At least one high-end server will be required to support the ArcGIS Server, the exact specifications will be deferred until the GIS Technical Lead/Project Manager is available to provide input.

It is currently estimated that at least in the early stages of this project the existing OCIO SQL Server and storage capacity will be adequate. As the project matures and participation increases, additional storage capacity may be needed.

An enterprise license for ESRI ArcGIS Server 9.2 will be required when the project goes into production mode. During the initial development phase, it is anticipated that we will be able to utilize the UNL ESRI site license for this software at a minimal cost.

#### **New FTEs**

At this point no new FTEs are planned for the initial two-year implementation phase of this project. The equivalent of one new FTE, for two-years, will be secured under an interagency agreement between the Office of the CIO and UNL-CALMIT to provide technical leadership and support to this project. Because individuals with the skills required for this project are not widely available, the estimated costs for this position are somewhat high. Likely, because of the relative scarcity of these skill sets, it was felt necessary to secure funding for at least two years to be able to attach an individual with these skills to the position. As part of this project design, during the initial two-year implementation phase an assessment will be made of the types of resources that will be necessary to sustain the project on an on-going basis. As part of that process, an assessment will also be made regarding the possible requirement for new FTEs to support the project.

#### **Replacement Costs**

The major replacement and/or maintenance costs associated with this project will be a need to periodically acquire an updated high-end server to support the ArcGIS Server and the need to maintain the annual license fee for ArcGIS Server.

#### **Non-State Funding**

At this point, a \$43,000 grant has been secured from the US Geological Survey to support hardware and software costs related to this project. As additional non-state sources become potentially available they will be pursued.

The most significant source of non-state funding will likely be in the form of in-kind services in the form of geospatial data and technical support provide by local and regional public entities such as Omaha/Douglas County, Lincoln/Lancaster County, Sarpy County and local NRDs.

17. Please indicate where the funding requested for this project can be found in the agency budget request, including program numbers.

NA

## APPENDIX

### Appendix 1 - Draft Position Description for Project Manager

#### Responsibilities

- Provide technical leadership for building the **Nebraska Geospatial Data Sharing and Web Services Network**
- Manage and maintain ArcIMS servers and software. Utilize ArcIMS to develop online map applications. Utilize ArcGIS for managing data for publication in ArcIMS map services
- Manage and maintain ArcSDE and SQL Server servers and software. Perform data loading and maintenance. Perform regular backups of database
- Write, test, and document Java web applications to enhance or modify online capabilities of SCO and AGIC. Manage and maintain MYSQL RDBMS in conjunction with Java web applications.
- Provide support to Nebraska GIS Steering Committee functions and activities
- Assist in developing and maintaining statewide geospatial data and databases
- Customer service and outreach to the statewide GIS community for cooperative data & GIS development projects as needed

#### Qualifications:

Master's degree in an appropriate field with a minimum of two years experience working with ArcGIS and one year experience working with ArcIMS, ArcSDE. Experience with web scripting and markup languages (HTML, CSS, JavaScript). Experience with one or more RDBMS packages (Oracle, SQL Server, MySQL, PostgreSQL), ArcObjects programming, geodatabase design and Object Oriented language (Java, C++, C#, Visual Basic) are helpful. Current legal ability to work in the United States and current residency in the United States is required.

Additional skills preferred:

- Knowledge of other GIS software such as ERDAS Imagine or Intergraph
- Experience in implementing FGDC and ISO metadata standards
- Working knowledge of Open GIS Consortium standards and initiatives
- Competence in SQL scripting