

AGENDA
NEBRASKA INFORMATION TECHNOLOGY COMMISSION
1526 Building, Lower Level - Development Center
1526 K Street
Lincoln, Nebraska
Thursday, November 10, 2016
10:00 a.m.

10:00 a.m.	1.	Call to Order; Roll Call; Meeting Notice; and Open Meetings Act Information	Chair
	2.	Approval of Minutes* - July 14, 2016 (<i>Attachment 2</i>)	
	3.	Public Comment	
10:10 a.m.	4.	Approval of Recommendations on Technology Investments for the 2017-2019 Biennium* (<i>Attachment 4</i>)	Walter Weir
10:40 a.m.	5.	Approval of Progress Report to the Governor and Legislature* (<i>Attachment 5</i>)	Chair
10:45 a.m.	6.	Reports and Action Items from the Councils and Technical Panel	
	a.	Community Council Report (<i>Attachment 6-a</i>)	Anne Byers
	i.	Initiatives Update	
	b.	eHealth Council Report (<i>Attachment 6-b</i>)	
	i.	Approval of Membership Changes*	
	ii.	Initiatives Update	
	c.	Education Council Report (<i>Attachment 6-c</i>)	Tom Rolfes
	i.	Network Nebraska and Digital Education Updates	
	d.	GIS Council Report (<i>Attachment 6-d</i>)	Nathan Watermeier
	i.	OCIO Geospatial/GIS Enterprise	
	ii.	NESDI Update	
	e.	State Government Council Report (<i>Attachment 6-e</i>)	Ed Toner
	i.	CIO Roadmap Update	
	f.	Technical Panel Report (<i>Attachment 6-f</i>)	Walter Weir
	i.	Enterprise Projects - Project Status Dashboard	
	ii.	Enterprise Projects - Project Closures	
	1.	Approval of the Closure of the Network Nebraska Project - Office of the CIO; University of Nebraska; and NET*	
	2.	Approval of the Closure of the District Dashboards Project - Dept. of Education*	

11:45 a.m.	7. Informational Items	Anne Byers
	a. LR 538 Hearing - Interim study to examine telecommunication services in Nebraska	
12:00 p.m.	8. Adjourn	Chair

* Action item

The Commission will attempt to adhere to the sequence of the published agenda, but reserves the right to adjust the order and timing of items and may elect to take action on any of the items listed.

Meeting notice was posted to the [NITC website](#) and the [Nebraska Public Meeting Calendar](#) on October 19, 2016. The agenda was posted to the NITC website on November 3, 2016.

Nebraska Open Meetings Act

Future Meeting Dates:

- March 9, 2017
- July 13, 2017
- November 9, 2017

Video Conferencing Sites

[Neb. Rev. Stat. § 84-1411(2)]

**Northeast Community College
Lifelong Learning Center Building - Suite A
701 E Benjamin Ave
Norfolk, Nebraska**

**Omaha State Office Building - Room 207
1313 Farnam St
Omaha, Nebraska**

Attachment 2

NEBRASKA INFORMATION TECHNOLOGY COMMISSION

Regional West Medical Center-Education Center
4021 Avenue B, Scottsbluff, Nebraska
Thursday, July 14, 2016, 10:00 a.m. (Mountain Time)

MINUTES

MEMBERS PRESENT:

Ed Toner, Chief Information Officer, Chair
Senator Curt Friesen, Nebraska Legislature
Shane Greckel, Greckel Farms, LLC
Dr. Terry Haack, Bennington Public Schools
Dorest Harvey, US Strategic Command/J84
Randy Meininger, City of Scottsbluff
Dan Spray, Precision Technologies, Inc.
Gary Warren, Hamilton Telecommunications
Walter Weir, University of Nebraska

MEMBERS ABSENT: Dan Shundoff, Intellicom

ROLL CALL, NOTICE OF MEETING & OPEN MEETINGS ACT INFORMATION

The meeting was called to order at 10:14 a.m. Roll call was taken. A quorum was present. The meeting notice was posted to the NITC website and the Nebraska Public Meeting Calendar on June 23, 2016. The agenda was posted to the NITC website on July 8, 2016. A copy of the Nebraska Open Meetings Act was located on the table at the back of the room.

NEW COMMISSIONER INTRODUCTIONS

Commissioners Shane Greckel and Dan Spray introduced themselves to the Commission.

APPROVAL OF MARCH 10, 2016 MINUTES

Commissioner Harvey moved to approve the March 10, 2016 meeting minutes. Commissioner Meininger seconded. Roll call vote: Toner-Yes, Greckel-Yes, Haack-Yes, Harvey-Yes, Meininger-Yes, Spray-Yes, Warren-Yes, and Weir-Yes. Results: Yes-8, No-0, Abstained-0. Motion carried.

REPORTS AND ACTION ITEMS FROM THE COUNCILS AND TECHNICAL PANEL

STATE GOVERNMENT COUNCIL

Ed Toner reported on the CIO Roadmap. The roadmap is available on the OCIO website and lays out the OCIO's priorities, mission, and values. Major initiatives have been occurring across the state to better achieve security, consolidation, and availability.

Phase I of the Resources IT Consolidation is almost complete. The OCIO surveyed everyone in state government regarding their IT tasks and job duties in each agencies. The Office of the CIO worked with agency HR staff to evaluate the positions for the IT consolidation under the OCIO working group. Mr. Toner attended the first staff meeting and the morale was high. The group is working together collaboratively. Not all of the consolidation staff are physically located in the Office of the CIO. Some positions are still housed at their agency. The OCIO is continuing to meet with agencies to discuss server consolidation under the OCIO.

Mr. Toner also commented on the data center consolidation effort and the regional support center concept.

Mr. Toner indicated that the roadmap timelines are aggressive but the OCIO leadership and their team members have been meeting the timelines. Commissioners commended Mr. Toner for his efforts.

COMMUNITY COUNCIL

Anne Byers, eHealth and Community Information Technology Manager, provided an update on broadband-related activities.

Updated Broadband Map. The Nebraska Public Service Commission (PSC) with assistance from the Office of the CIO has updated the broadband mapping website (broadbandmap.nebraska.gov). The map shows the rapid deployment of broadband technologies between 2010 and 2015. The increased deployment of fiber-based broadband is particularly noteworthy.

Nebraska Broadband Today Conference. Approximately 160 community leaders, resource providers, and telecommunications providers attended the Nebraska Broadband Today conference on May 24 at the Cornhusker Marriott in Lincoln. The conference was sponsored by the Nebraska Telecommunications Association in partnership with the Nebraska Broadband Initiative. Scholarships for community members were provided by the University of Nebraska Rural Futures Institute.

Nebraska Rural Poll Report on Broadband. The University of Nebraska-Lincoln's Nebraska Rural Poll included several questions on broadband. Eighty-two percent of rural Nebraskans subscribe to broadband at home, and 70 percent of rural Nebraskans access the Internet using their cell phones according to a new report by the Institute of Agriculture and Natural Resources at the University of Nebraska Lincoln. The report is available at <http://ruralpoll.unl.edu/pdf/16broadband.pdf>.

Meeting with Ponca Technology Committee. On June 23, Tom Rolfes and Anne Byers from the NITC, along with Gene Hand, Cullen Robbins, and Jeff Pursley from the Public Service Commission, traveled to Ponca, Nebraska to meet with members of the Ponca technology committee. Representatives of Great Plains Communications also attended. Committee members and representatives of Great Plains discussed issues about broadband service in Ponca and began working on steps to resolve those issues.

Nebraska Broadband Today Newsletter. The NITC Community Council has started publishing a bimonthly newsletter to share broadband success stories and resources. We currently have about 50 subscribers and received about 200 clicks on the newsletter. A copy of the first issue is included in the meeting materials. The May/June issue is also available at <http://goo.gl/Vt921N>.

Social Media Campaign. The Community Council started a social media campaign to share broadband success stories and resources in April. The Community Council Twitter account has earned 2,000-9,000 impressions (the number of times users saw the tweet on Twitter) per month. Ms. Byers invited Commissioners to follow the Community Council on social media:
Twitter: @NITCcommunity1 and Facebook: <https://www.facebook.com/NITCcommunity/>

Commissioners discussed broadband availability. Although there have been tremendous improvements in broadband availability, there are still areas of Nebraska that are underserved. Commissioner Greckel expressed concerns about broadband connectivity in rural locations. Rather than looking at the percent of population served, it may be helpful to look at percent of land mass covered. Commissioner Greckel relies on technology for his agriculture operation but often times the connectivity is not there. Mr. Toner stated that the last mile has always been an issue. Commissioner Spray commented that on the industry side access to fiber would be beneficial. If the state could assist in providing the fiber, it would be of benefit to the citizens of smaller rural communities. After discussion, Mr. Toner recommended that Mrs. Byers and Mr. Rolfes work together to provide additional information on broadband funding and policies for the Commissioners. It was suggested to have the Public Service Commission attend the next NITC meeting. The legislature is planning an interim study on telecommunications later this year.

REPORT - EHEALTH COUNCIL

Anne Byers, eHealth and Community Information Technology Manager

Ms. Byers gave an update on the Advance Interoperable Health IT Services to Support Health Information Exchange Cooperative Agreement Project Overview. The Nebraska Information Technology Commission (NITC) received approximately \$2.7 million in funding on July 27, 2015 from the U.S. Department of Health and Human Services Office of the National Coordinator for Health Information Technology. The grant supports greater adoption of health information exchange and to help health care facilities integrate health information technology into their workflow. The NITC is partnering with the Nebraska Health Information Initiative (NeHII) and the University of Nebraska Medical Center (UNMC) on the grant.

Overall, implementation is going well, but there have been some delays. Although the grant team has experienced delays due to NeHII's migration to the new HIE 2.0 platform, delays and roadblocks in working with Critical Access Hospitals (very small rural hospitals) and their electronic health record (EHR) vendors have been a bigger issue. Some Critical Access Hospitals are finding that their EHR vendors are charging exorbitant interface fees. One Critical Access Hospital has decided to implement a new EHR system and can't begin implementation with NeHII until after the grant period. A couple have had new CEOs come on board who are now rethinking the decision to participate. NeHII has been documenting these challenges and has shared them with the Office of the National Coordinator (ONC). Other states are also experiencing similar challenges. As an alternative approach, NeHII will be contacting Federally Qualified Health Centers to see if they are interested in participating. ONC is on board with including Federally Qualified Health Centers.

EDUCATION COUNCIL REPORT

Tom Rolfes, Education IT Manager

Membership*. Every two years, the Council members come up for renewal of membership terms. In addition, two members have resigned and are being replaced by Tom Peters and Alan Moore. Commissioner Haack recognized Randy Schmailzl for his contributions and work on the Education Council.

The Education Council members would like to nominate the following higher education representatives to serve on the council for the 2016-18 term:

- Mary Niemiec, representing the University of Nebraska System
- Greg Maschman, representing Independent Colleges & Universities
- Tom Peters (pro tem), representing Community College System
- John Dunning, representing the Nebraska State College System

The Education Council members would like to nominate the following K-12 representatives to serve on the council for the 2016-18 term:

- Gary Needham, representing Educational Service Units
- Dan Hoelsing, representing Administrators
- Alan Moore, representing School Board Members
- Burke Brown, representing Public Teachers

Commissioner Warren moved to approve the Education Council's membership nominations. Commissioner Haack seconded. Roll call vote: Harvey-Yes, Meininger-Yes, Spray-Yes, Warren-Yes, Weir-Yes, Toner-Yes, Greckel-(out of room at time of voting), and Haack-Yes. Results: Yes-7, No-0, Abstained-0. Motion carried.

Network Nebraska and Digital Education Updates. The Education Council has developed action items for Network Nebraska and Digital Education Strategic Initiative. Network Nebraska, along with the University of Nebraska team, is working with vendors to upgrade circuits for 245 school districts. South Platte Public Schools has joined the network so the project is now at 100% participation of public school districts. All circuit upgrades are scheduled to be in place by August 5. Mr. Toner commended Mr. Rolfes and Mr. Weir for their efforts with Network Nebraska.

GIS COUNCIL REPORT

Bill Wehling, Department of Roads

Membership Update. There are four GIS Council seats up for renewal in September 2016. These seats include Public Power Districts, Lincoln Metro, Nebraska geospatial professional association, and one Member at Large. The GIS Council nomination and selection committee provided notice in June that they are seeking nominations. The current member seat representatives were also notified to express interest if they wanted to be re-nominated. Specific selection criteria were used in the process that was in accordance with the GIS Council charter. The following candidates are the nominations coming forward from the GIS Council selection committee. The final appointments of these individuals are subject to approval by the Commission and appointed by the Governor.

The GIS Council would like to nominate the following slate of nominees to serve for a 3-year term on the GIS Council:

- Tim Cielocha of Nebraska Public Power District to fill Nebraska Public Power Districts GIS Council seat. Mr. Cielocha is also the current Chair of the GIS Council.
- Jeff McReynolds of the City of Lincoln/Lancaster County to fill the Lincoln Metro GIS Council seat.
- Lesli Rawlings of the Geographic Educators of Nebraska to fill the Nebraska geospatial professional association GIS Council seat.
- Todd Whitfield of Lamp Rynearson to fill the Member-At-Large GIS Council seat.

Commissioner Harvey moved to approve the GIS Council's membership nominations.

Commissioner Warren seconded. Roll call vote: Spray-Yes, Meininger-Yes, Harvey-Yes, Haack-(out of room at time of voting), Greckel-Yes, Toner-Yes, Weir-Yes, and Warren-Yes. Results: Yes-7, No-0, Abstained-0. Motion carried.

Nebraska Statewide Elevation Program. Nebraska has identified the collection of topographic (i.e., land surface, elevation) information as a priority and employs the Nebraska GIS Council's Elevation Working Group as a coordinating group for the effort. The group includes individuals representing federal, state and local entities. Since 2008, the group, its members, and partner agencies have worked to collect LiDAR data over more than 75% of Nebraska's land area.

LiDAR is an acronym for Light Detection and Ranging, a technology that is used in conjunction with GPS technology, an aerial collection platform, and a processing computer to collect data points that can be used to define the location of objects that reflect near infrared light, including the land surface, structures and vegetation.

The Elevation Working Group has outlined a plan earlier this year to complete the initial phase of the program. This involves collecting LiDAR over uncompleted areas of the state. This area encompasses the Sandhills region. Currently, the project has secured nearly \$3.5 million in seed funding from federal, state and local partners. The remaining funding is contingent on additional support of local, state, and federal entities. The current federal partners include the Natural Resources Conservation Service (NRCS), U.S. National Forest Service, and the U.S. Geological Survey (USGS). State partners involve the Nebraska Department of Natural Resources, Nebraska Department of Roads, Nebraska Department of Environmental Quality, and the Office of the Chief Information Officer. Local partners include the Twin Platte Natural Resources District, Upper Elkhorn Natural Resources District, Upper Loup Natural Resources District, Upper Niobrara-White Natural Resources District, and the Lower Loup Natural Resources District.

Sandhills Project Area Metrics. The following are details about the current project area. All values are estimated and subject to change. The estimated unit cost of collection is anticipated to decrease somewhat during contracting.

Area = 18,111 square miles (the white area in the figure below)

Cost = \$4 to \$4.6 Million (depends on level of involvement for price break per square mile)

Benefit/Cost* = 5:1 for QL2 data, the project value is estimated at \$23,000,000.

**Reference:* Dewberry, 2011, Final report of the National Enhanced Elevation Assessment (revised 2012): Fairfax, Va., Dewberry, 84 p. plus appendixes, <http://www.dewberry.com/Consultants/GeospatialMapping/FinalReport-NationalEnhancedElevationAssessment>.

Other LiDAR Collection Projects include the following:

- South Platte Basin. The South Platte Basin project completed data flight acquisition in mid-April. This project covers approximately 4,500 square miles using \$1.3 million among several stakeholders including a 50% match from the USGS awarded in 2015. The project is contracted through USGS who contracts out for data collection and preparation of the data. They are currently processing all the data files for quality control measures. The final data deliverable is not due until early 2017.
- Omaha Metro Area. Partners in Douglas County, the City of Omaha, Sarpy County, the City of Fremont, the City of Blair, and the Papio-Missouri River Natural Resource District have received a 3DEP USGS matching grant to acquire high-resolution LiDAR data across 800+ square miles around the metropolitan Omaha area. This amounts to approximately \$230,000 in total cost. Data acquisition could begin as early as the fall of 2016.

NebraskaMAP – Data Sharing and Web Services Network

The new public facing NebraskaMAP (<http://www.NebraskaMAP.gov>) has been unveiled to state agencies to begin uploading their data sets and begin using the new web site. All state agencies that use geospatial data are working together to reduce duplicated datasets and streamline the data sharing process. This also involves accessing data in one sole location for the most current information. The basis for cataloging data and resources to include on NebraskaMAP require metadata. An initial set of data has been peer-reviewed by the NebraskaMAP Data Subcommittee and approved for being cataloged in the new system. There are more than 40 data resources involving more than 150 files that are currently available for public access. The next phase of the project is to partner with other data stewards who share public data through local and county governments and other political subdivisions. New modifications to the existing Metadata Standards (NITC 3-201) have been approved by the NITC Technical Panel and will need to have action by NITC. The changes to these standards include detailed documentation on definitions on minimum and complete metadata categories for use with creating and maintaining geospatial data. The web site will eventually include a component to provide an easier way to view and access available imagery, LiDAR and other raster and large file size datasets for Nebraska. This component is currently under development. NebraskaMAP is a product of the State of Nebraska Geospatial / GIS Enterprise platform that is currently underway through the OCIO Roadmap.

TECHNICAL PANEL REPORT

Walter Weir, Chair

Charter Amendments*. The panel has updated and revised the Technical Panel charter regarding membership, frequency of meeting and meeting procedures.

Commissioner Harvey moved to approve the Technical Panel charter amendments. Commissioner Warren seconded. Roll call vote: Toner-Yes, Greckel-Yes, Haack-(out of room at time of voting), Harvey-Yes, Meininger-Yes, Spray-Yes, Warren-Yes, and Weir-Yes. Results: Yes-7, No-0, Abstained-0. Motion carried.

Standards and Guidelines

Amendments to NITC 1-201 Agency Information Technology Plan*. The Office of the CIO would like to have the form available online this year.

Commissioner Spray moved to approve amendments to NITC 1-201 Agency IT Plan on-line form. Commissioner Harvey seconded. Roll call vote: Warren-Yes, Spray-Yes, Meininger-Yes, Harvey-Yes, Haack-(out of room at time of voting), Greckel-Yes, Toner-Yes, and Weir-Yes. Results: Yes-7, No-0, Abstained-0. Motion carried.

Amendments to NITC 1-202 Project Review Process*. The dates were amended to reflect the upcoming fiscal year.

Commissioner Warren moved to approve amendments to NITC 1-202 Commissioner Harvey seconded. Roll call vote: Weir-Yes, Warren-Yes, Spray-Yes, Meininger-Yes, Harvey-Yes, Haack-Yes, Greckel-Yes, and Toner-Yes. Results: Yes-8, No-0, Abstained-0. Motion carried.

Amendments to NITC 3-201 Geospatial Metadata Standard*. The amendments includes metadata lite, metadata categories and definitions to provide clarity and timelines.

Commissioner Spray moved to approve the amendments to NITC 3-201 Geospatial Metadata Standard and Guideline. Commissioner Warren seconded. Roll call vote: Toner-Yes, Greckel-Yes, Haack-Yes, Harvey-Yes, Meininger-Yes, Spray-Yes, Warren-Yes, and Weir-Yes. Results: Yes-8, No-0, Abstained-0. Motion carried.

Enterprise Projects

The approval of the closure of the Network Nebraska project was tabled until the next meeting. Network Nebraska has been a collaborative project between the Office of the CIO and the University of Nebraska.

Status Report. Mr. Weir provided the status report on enterprise projects. The Technical Panel and the NITC are charged with oversight of these enterprise projects. On the NITC website, there are lessons learned from closed projects.

Mr. Weir entertained questions from the Commissioners. Mr. Toner indicated that the status reports are self-reports from the agency.

INFORMATIONAL ITEMS

Ed Toner, Chief Information Officer

Update on Security Audits. The state has gone through multiple agency audits with a few recommendations. The state has redesigned this process and utilizing current tool.

Cyber Security Conference. The 2016 Nebraska Cyber Security Conference will be held on September 29, at Southeast Community College in Lincoln, Nebraska.

Cloud Computing Update. The State Government Council is in the process of developing cloud standards. The standard has been posted for the public 30-day comment. The Office of the CIO wants to provide guidance to agencies wanting to move to the cloud.

Office of the CIO. The Office of the CIO has created and filled two new positions. Annie King, Solution Architect, will assist and recommend overall architect solutions for state government and will be heavily involved with the CIO Road Map. Holly West has been hired as the OCIO Public Information Officer.

PRESENTATION: CITY OF SCOTTSBLUFF – PATHWAYS IN GIS

Commissioner Randy Meininger

Commissioner Meininger, along with representatives from the North Platte Natural Resources District, provided a presentation on their GIS efforts and initiatives. The presentation was followed by a tour of the Regional West Medical Center.

ADJOURNMENT

Commissioner Harvey moved to adjourn. Commissioner Spray seconded. All were in favor. Motion carried.

The meeting was adjourned at 1:39 p.m. The next meeting of the NITC will be held on November 10, 2016.

Meeting minutes were taken by Lori Lopez Urdiales and reviewed by the NITC IT Managers.

Attachment 4

Nebraska Information Technology Commission

**2017-2019 Biennial Budget
Information Technology Project Proposals**

Project Review Documents

November 10, 2016

**Nebraska Information Technology Commission
2017-2019 Biennial Budget - Information Technology Project Proposals**

Project #	Agency	Project Title	FY18	FY19	Total*	Score	Recommendations	
							State Gov't Council	Ed. Council
13-01	DEPT OF EDUCATION	IT Education Systems of Support	\$ 7,724,365	\$ 7,909,342	\$ 15,633,707	85		Tier 2
13-02	DEPT OF EDUCATION	Teacher Cert System Upgrade	\$ 275,000	\$ 275,000	\$ 550,000	74		Tier 1
23-01	DEPT OF LABOR	Modernization of UI Tax and Benefits System	\$ 7,000,000	\$ 7,000,000	\$ 14,000,000	80	Tier 2	
39-01	NEBRASKA BRAND COMMITTEE	NBC Database System	\$ 216,000	\$ 216,000	\$ 432,000	87	Tier 2	
46-01	DEPT OF CORRECTIONAL SERVICES	CIT [Corrections Information and Tracking system]	\$ 700,000	\$ 700,000	\$ 1,400,000	60	Insufficient Information	
47-01	EDUCATIONAL TELECOMMUNICATIONS COMM	KHNE TV Transmitter	\$ 365,000	\$ -	\$ 365,000	98	Tier 2	
47-02	EDUCATIONAL TELECOMMUNICATIONS COMM	Radio Transmission Replacement	\$ 350,000	\$ 350,000	\$ 700,000	100	Tier 2	
47-03**	EDUCATIONAL TELECOMMUNICATIONS COMM	KHNE Tower Lighting System	\$ -	\$ 125,000	\$ 125,000	100		
54-01	STATE HISTORICAL SOCIETY	Storage and Preservation of 12 TB Historical Data	\$ 90,000	\$ 90,000	\$ 270,000	83	Tier 2	
65-01	DEPT OF ADMINISTRATIVE SERVICES	Enterprise Resource Management Consolidation	\$ 7,181,000	\$ 10,577,000	\$ 17,758,000	64	Tier 1	

Notes:

*Total may include prior year or future planned costs in addition to biennial budget request amounts.

**No review necessary; outside the scope of review requirements.

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

IT Project Proposal Summary Sheets

- Summary Sheet Contents:
 - Summary of Request
 - Financial Summary
 - Proposal Score
 - Reviewer Comments
 - Technical Panel Comments
 - Advisory Council Comments
 - NITC Comments
 - Agency Response to Review Comments (if any)
- Full text of all the project proposals are posted at:
http://nitc.nebraska.gov/commission/project_proposals/2017-2019.html

13 - Department of Education

Proposal Name: IT Education Systems of Support

NITC ID: 13-01



PROJECT DETAILS

Project Contact: Dean Folkers

Agency: 13 - Department of Education

NITC Tier Alignment:

Agency Priority: 1

SUMMARY OF REQUEST

The primary purpose of this Shared Systems and Supports project creates a fundamental shift toward efficiency in access to digital learning resources and tools. The proposed approach reduces local and state burdens, increases equitable access to digital education, and improves the privacy and security of student information across Nebraska. The comprehensive nature of the project supports a significant need found by a recent study estimating that Nebraska’s K-12 Public School districts spend approximately \$100 million annually on software licenses and staff, including over 655,000 hours each year submitting data for reporting purposes. The study also found the size of a school often determines the level of access to digital learning resources and tools. Primary reasons include costs and capacity to support.

The details in this proposal reveal alignment to NDE Strategic Priorities, to the Nebraska’s Statewide Technology Plan: An Enterprise Vision for IT in Nebraska, specifically in the areas of cost savings realized through eliminating duplication, and centralizing services; and to the OCIO Top Priorities Centralize-Optimize-Standardize. Highlights in the plan include:

- Efficiencies through an estimated per-pupil cost savings of between \$100 - \$300 per pupil;
- Timely and cost effective upgrades to future technology implementations in a nimble and responsive environment;
- Targeted and coordinated professional development;
- Transitions resources from supporting technology to supporting teaching and learning;
- Enhances security and privacy of student information; and
- Provides equitable access to all services and resources to both rural and urban districts.

Building on the strong statewide success of Network Nebraska for Internet access, this project addresses the efficient availability of educational resources like software applications, training, and supports to most effectively use the network. As the Nebraska Department of Education supports and coordinates delivery of solutions meeting expectations of stakeholders, there is a need to stay current with the exponentially increasing pace of technology innovation. Shared sustainable resources allocated for continuous updates to modern and efficient systemic solutions support the future of education in Nebraska all while increasing efficiency, access, and security.

FINANCIAL SUMMARY

	<u>Expenditures</u>		
	<u>Fiscal Year 2018</u>	<u>Fiscal Year 2019</u>	<u>Total</u>
Contractual Services:	\$6,020,000.00	\$6,256,133.00	\$12,276,133.00
Telecommunications:	\$20,580.00	\$21,197.00	\$41,777.00
Training:	\$70,000.00	\$79,000.00	\$149,000.00
Operating Costs:	\$1,497,585.00	\$1,553,012.00	\$3,050,597.00
Capital Expenditures:	\$116,200.00	\$0.00	\$116,200.00
Total Estimated Costs:	\$7,724,365.00	\$7,909,342.00	\$15,633,707.00

Comments:

	<u>Funding</u>		
	<u>Fiscal Year 2018</u>	<u>Fiscal Year 2019</u>	<u>Total</u>
General Fund:	\$7,479,223.00	\$7,672,500.00	\$15,151,723.00
Cash Fund:	\$0.00	\$0.00	\$0.00
Federal Fund:	\$245,142.00	\$236,842.00	\$481,984.00
Revolving Fund:	\$0.00	\$0.00	\$0.00
Other Fund:	\$0.00	\$0.00	\$0.00
Total Requested Funding:	\$7,724,365.00	\$7,909,342.00	\$15,633,707.00

Comments:

PROPOSAL SCORE

13 - Department of Education

Proposal Name: IT Education Systems of Support

NITC ID: 13-01



		reviewer1	reviewer2	reviewer3	Average
Average	Goals, Objectives and Projected Outcomes (15)	15	15	12	14
	Project Justification / Business Case (25)	22	25	20	22
	Technical Impact (20)	18	19	10	16
	Preliminary Plan for Implementation (10)	7	10	8	8
	Risk Assessment (10)	7	10	6	8
	Financial Analysis and Budget (20)	15	20	15	17
	Total Score	84	99	71	85

REVIEWER COMMENTS

Goals, Objectives and Projected Outcomes

Review Score = 15/15

Strengths: This proposal is well articulated, thorough and consistent with best practices regarding IT spending and development.

Weaknesses:

Project Justification / Business Case

Review Score = 22/25

Strengths: Business case is well stated and documented.

Weaknesses:

Technical Impact

Review Score = 18/20

Strengths: Strong partnerships with OCIO. Emphasis on enterprise solutions rather than disparate systems across the state.

Weaknesses:

Preliminary Plan for Implementation

Review Score = 7/10

Strengths:

Weaknesses: Ambitious plan and schedule. Impact of not meeting proposed schedule unclear.

Risk Assessment

Review Score = 7/10

Strengths:

Weaknesses: Scope of project and change management required during implementation implies significant risk.

Financial Analysis and Budget

Review Score = 15/20

Strengths: A certain level of trust is granted due to the overall excellence of the proposal.

Weaknesses: Lack of details makes close analysis difficult.

Goals, Objectives and Projected Outcomes

Review Score = 15/15

Strengths: This is probably the most comprehensive and well written proposal I've seen in many years.

Weaknesses:

Project Justification / Business Case

Review Score = 25/25

Strengths: The project justification and business cases well thought out and very clearly stated. The shared systems and support model is clearly explained and it is good to see the amount of support from the partners associated with this project.

Weaknesses:

Technical Impact

Review Score = 19/20

Strengths: It is still early in this project to get any real details about the technical components of the overall project, however the intent and the direction as described do not appear, at this point to be technically unachievable.

Weaknesses:

Preliminary Plan for Implementation

Review Score = 10/10

Strengths: The proposal describes an excellent project management approach to implementing the shared systems and support project. Roles and responsibilities are clearly identified staffing considerations appear appropriate and monitoring of the implementation seems to be well thought out.

Weaknesses:

Risk Assessment

Review Score = 10/10

13 - Department of Education

Proposal Name: IT Education Systems of Support

NITC ID: 13-01



Strengths: The author of the proposal does point out that a project of this scope will require a great deal of coordination communication and skills from a wide range of participants. I did like the risk sharing comment that NDE and partners are solely responsible for all risks of the shared systems and supports project.

Weaknesses:

Financial Analysis and Budget

Review Score = 20/20

Strengths: Based on the assumptions in the financial analysis and budget portion of the proposal there will be a tremendous amount of savings by moving to this model. the document points out they are estimating a \$31.3 million in savings per year after the third year of making the changes, that is rather significant.

Weaknesses:

Goals, Objectives and Projected Outcomes

Review Score = 12/15

Strengths: Goals are clearly articulated and aligned with industry best practices. The proposed project builds atop existing work that requires greater resources if it is to be generalized to provide statewide benefits.

Weaknesses: The goals of the project are clearly defined by the requesting agency, however, it is less clear that those goals have widespread support from the stakeholders as what is most needed to improve teaching and learning throughout the state. That is not to say that the goals aren't appropriate, only that many school districts have not been engaged in the dialogue that arrived at this set of goals.

Project Justification / Business Case

Review Score = 20/25

Strengths: The proposal provides persuasive evidence for the need to streamline the acquisition, reporting, and presentation of data. Consolidation and coalescence of efforts to develop, maintain, train and support a suite of teaching, learning and administrative applications is a necessary step to moving the focus from integrating technology to its integral use where it can be leveraged to obtain desired learning outcomes.

Weaknesses: The proposal language makes it clear that consolidation of efforts can result in greater efficiency, however, it is not clear that the level of savings can be realized. In the opinion of the reviewer, the more likely outcome is that consolidation of efforts will result in higher yield from a like or similar expenditure.

Technical Impact

Review Score = 10/20

Strengths: The merits of consolidating software/hardware/application/platform/services are clear and there is little doubt that the delivery of services across the state is varied.

Weaknesses: The linkage between standardizing and centralizing technology with a shift in the focus of district personnel is an outcome that is not supported by any empirical data presented in the proposal. Additionally, the greatest threat to information security at this time is poor data sharing practices and the lack of security training for end users. There is little doubt that the proposed approach may have the desired impact from a technology perspective but without sufficient preparation of end users the approach is incomplete.

Preliminary Plan for Implementation

Review Score = 8/10

Strengths: The projects seeks to use industry standards for project management, change management, and project evaluation. The proposal outlines a number of additional staff resources assigned to expected outcomes and timelines.

Weaknesses: The project timelines are aggressive and the deliverables are articulated in general terms.

Risk Assessment

Review Score = 6/10

Strengths: The proposed project management practices are designed to identify, mitigate and remediate risk.

Weaknesses: There are a host of technical and human risks associated with a project of the proposed scope. The description of risk associated with district implementation is very limited. If the proposed project is to have the enumerated outcomes, much is dependent upon the implementation with districts.

Financial Analysis and Budget

Review Score = 15/20

Strengths: Intended expenditures are clearly articulated.

Weaknesses: Premised savings to districts are mathematically demonstrable, however, the degree to which they can be achieved is not supported by the proposal.

TECHNICAL PANEL COMMENTS

13 - Department of Education

Proposal Name: IT Education Systems of Support

NITC ID: 13-01



Is the project technically feasible? Yes

Is the proposed technology appropriate for the project? Unknown

Can the technical elements be accomplished within the proposed timeframe and budget? Unknown

Comments: Unknown until further information is available.

ADVISORY COUNCIL COMMENTS

Advisory Council Tier Recommendation: Tier 2

Comments:

1. Additional Budget Detail is requested, specifically "Other Contractual Services".
2. Sustained funding will be needed. Additional explanation of sustainability beyond FY19 is requested.
3. I.T. Operations are not included in the budget request.
4. Project 13-01 reads more like a strategic plan than an I.T. project proposal. Please detail each project component in the category of software selection for the marketplace versus a component to be purchased or developed in house. Those components being purchased or developed in house have a greater budgetary impact, while those in the marketplace will have little or no budget impact and will still allow for local control.
5. Recommend that NDE take the path described of populating the Software as a Service (SaaS) Marketplace by using collaborative procurement to help drive data standards in all data sets where that is possible.
6. Recommend that NDE collaborate with NITC Education Council on the Digital Education Initiative Action Items.

NITC COMMENTS

AGENCY RESPONSE

See attachment [13-01_agencyresponse.pdf] for agency response

October 20, 2016

Attn: Rick Becker, Office of the Chief Information Officer

Re: 2017 Project Proposal 13-01

The Nebraska Department of Education is pleased to provide responses to comments provided in feedback from the original proposal reviewers, and feedback during a review by the NITC Education Council, of the NDE project proposal for **Shared Systems and Supports**.

Comments have been grouped under the topic headings of the outcome review scores from the technical panel. Comments from the NITC Education Council appear under the most relevant heading.

Goals, Objectives and Projected Outcomes

Strengths:

1. This proposal is well articulated, thorough and consistent with best practices regarding IT spending and development.
2. This is probably the most comprehensive and well written proposal I've seen in many years.
3. Goals are clearly articulated and aligned with industry best practices. The proposed project builds atop existing work that requires greater resources if it is to be generalized to provide statewide benefits.

Weaknesses:

1. The goals of the project are clearly defined by the requesting agency, however, it is less clear that those goals have widespread support from the stakeholders as what is most needed to improve teaching and learning throughout the state. That is not to say that the goals aren't appropriate, only that many school districts have not been engaged in the dialogue that arrived at this set of goals.

NITC Education Council comments:

- Recommend that NDE collaborate with NITC Education Council on the Digital Education Initiative Action Items.

RESPONSE:

Goals for this proposal are a culmination of several areas of research. One, the national trend toward centralizing common services to support efficiencies, increase the application of security, and support the training and sustainability of the systems. Two, and the primary reason for taking this approach, resulted from data gathered in the LR264 study. In fact, the outcomes stated in the **Shared Systems and Supports** proposal are directly tied to the findings of this report:

- Outcome 1: Reduced burden and costs through shared systems
- Outcome 2: Increased capacity for instructional and administrative work
- Outcome 3: Equitable access to common resources
- Outcome 4: Enhanced data security and privacy

Please reference the LR264 Summary Graphic attached at the end of the response for a quick look at the study's results. For greater detail, the entire study may be viewed at here [Legislative Resolution 264](#)

Collaboration is another intended outcome of the proposal. It is evident that many stakeholder communities are going down similar paths, stretching resources and creating pockets of inequity. The Steering Committee and outreach to partner communities, such as the NITC Ed Council's strategic initiatives, is intended and essential to bringing these efforts together, to identify best practices, and to establishing centers of excellence.

In addition, the Nebraska Department of Education has responsibilities as identified in the following state statutes, and believes the goals in this proposal, speaks to each of these responsibilities and mission as stated:

79-1302: The Legislature finds that the utilization of appropriate technologies can provide enhanced educational services and broadened educational opportunities for Nebraska learners. It is the intent of the Legislature:

1. To utilize technology to provide effective and efficient distance learning;
2. to provide assistance and direction in the training of Nebraska teachers in uses of technology for instruction through electronic means;
3. to establish and support an electronic data network and data bases for Nebraska educators and learners;
4. to support the evaluation and dissemination of models of successful technologies which improve instruction or learning;
5. to provide support for cooperative education-technology ventures in partnership with public or private entities; and
6. to provide support for cooperative purchase or leasing of administrative or instructional software or software licenses in partnership with schools, educational service units, and other states.

79-1303: Educational Technology Center; created; mission.

The Educational Technology Center within the State Department of Education is created. **The mission of the center is to achieve the legislative goals set forth in section 79-1302 and to provide leadership and support for the integration of technology and innovation into Nebraska elementary and secondary schools in order to provide quality education and equal opportunity for Nebraska learners.**

Project Justification / Business Case Review Scores

Strengths:

1. Business case is well stated and documented.
2. The project justification and business cases well thought out and very clearly stated. The shared systems and support model is clearly explained and it is good to see the amount of support from the partners associated with this project.
3. The proposal provides persuasive evidence for the need to streamline the acquisition, reporting, and presentation of data. Consolidation and coalescence of efforts to develop, maintain, train and support a suite of teaching, learning and administrative applications is a necessary step to moving the focus from integrating technology to its integral use where it can be leveraged to obtain desired learning outcomes.

Weaknesses:

1. The proposal language makes it clear that consolidation of efforts can result in greater efficiency, however, it is not clear that the level of savings can be realized. In the opinion of the reviewer, the more likely outcome is that consolidation of efforts will result in higher yield from a like or similar expenditure.

RESPONSE:

Much of the decision making is a result of findings from the LR264 study, which, in part, identified the number of hours and costs associated with many of the outcomes targeted in the proposal. A review of the financial investments and returns can be found beginning on page 40 of the study [[click here](#)]. In addition, one of the things that Nebraska is very good at is finding good examples where a solution has worked and reviewing that solution to meet Nebraska's needs. The Kentucky Department of Education provides a great example and through the Gartner validated studies realized millions in cost savings annually.

Technical Impact Review Score

Strengths:

1. Strong partnerships with OCIO. Emphasis on enterprise solutions rather than disparate systems across the state.
2. It is still early in this project to get any real details about the technical components of the overall project; however the intent and the direction as described do not appear, at this point to be technically unachievable.
3. The merits of consolidating software/hardware/application/platform/services are clear and there is little doubt that the delivery of services across the state is varied.

Weaknesses:

1. The linkage between standardizing and centralizing technology with a shift in the focus of district personnel is an outcome that is not supported by any empirical data presented in the proposal. Additionally, the greatest threat to information security at this time is poor data sharing practices and the lack of security training for end users.
2. There is little doubt that the proposed approach may have the desired impact from a technology perspective but without sufficient preparation of end users the approach is incomplete.

NITC Ed Council comments:

- Recommend that NDE take the path described of populating the Software as a Service (SaaS) Marketplace by using collaborative procurement to help drive data standards in all data sets where that is possible.

RESPONSE:

The process of establishing a large systemic enterprise view and strategy for shared systems involves a number of different connected and integrated projects. The focus of the proposal was at the strategic level and set forth the expectations of the processes that were to be used to accomplish the specific projects. The issues identified around training the end users were identified in several places within the proposal, including the additional training staff in the budget, the role of the privacy/security officer, and others involved in supporting the systemic transformation and prioritization of the training. It can be difficult during a review process to catch everything presented including the expansion of the ESUCC Marketplace districts can access hardware and software applications at enterprise level pricing (p. 6).

It should also be mentioned that projects do experience change in scope as they progress (changes in technology, priorities, policy) and should remain flexible to embrace new technologies and procedures in the learning process as it moves forward in order to achieve greater success and return on investment.

The primary focus of the proposal is to establish the vision, set forth the known projects and costs, and secure the minimal investment in scale to the nearly \$4 Billion spent annual on K12 Education in Nebraska. Without the needed investment this enterprise project will not be achievable. There simply are not enough resources to do anything more than status quo.

Quantifying the shift in how staff time will be utilized at the local level is almost impossible. However, numbers in the LR264 study have provided a basis for the number of hours spent and on what process by which these can be quantified globally. The plan includes integration of professional development to help transition to new roles or efforts, removes the burden for staff time in certain technical areas, and coordinates with ESUs to provide ongoing support as these transitions take place.

NDE is very cognizant of the need to engage stakeholders throughout the process and has integrated change management and communication into its plan. Trainers, the Help Desk, and the Steering Committee, made up of representative stakeholders, will be key components to assure to the best of its ability that no one or thing is left out.

Preliminary Plan for Implementation Review Score

Strengths:

1. The projects seeks to use industry standards for project management, change management, and project evaluation. The proposal outlines a number of additional staff resources assigned to expected outcomes and timelines.
2. The proposal describes an excellent project management approach to implementing the shared systems and support project. Roles and responsibilities are clearly identified staffing considerations appear appropriate and monitoring of the implementation seems to be well thought out.

Weaknesses:

1. Ambitious plan and schedule. Impact of not meeting proposed schedule unclear.
2. The project timelines are aggressive and the deliverables are articulated in general terms.

RESPONSE:

NDE agrees that the timeline is aggressive, but believes that most objectives can be completed, or near completed, within 2-3 years - given the needed resources. In fact, the foundation for many of the projects in the plan have begun, especially in the area of security and the implementation of a Project Management Office. The unfortunate truth is, that without additional funds and staff, these efforts will trickle on to either eventual completion or be abandoned from lack of movement. A slow implementation will require more resources over time as technologies advance creating a larger chasm of access and opportunity in the future.

Moving forward, in order to ensure NDE delivers solutions to meet the expectations of its stakeholders, there is an identified need to keep up with the exponentially increasing pace

of technology innovation and consumption. Only through continuous adoption of modern solutions will the educational systems in Nebraska stay current with industry advances, school district and student learner needs, and do so while increasing efficiency and access, sustainable resources must be allocated.

Risk Assessment Review Score

Strengths:

1. The author of the proposal does point out that a project of this scope will require a great deal of coordination communication and skills from a wide range of participants. I did like the risk sharing comment that NDE and partners are solely responsible for all risks of the shared systems and supports project.
2. The proposed project management practices are designed to identify, mitigate, and remediate risk.

Weaknesses:

1. Scope of project and change management required during implementation implies significant risk.
2. There are a host of technical and human risks associated with a project of the proposed scope. The description of risk associated with district implementation is very limited. If the proposed project is to have the enumerated outcomes, much is dependent upon the implementation with districts.

NITC Ed Council comments:

- Project 13-01 reads more like a strategic plan than an I.T. project proposal. Please detail each project component in the category of software selection for the marketplace versus a component to be purchased or developed in house. Those components being purchased or developed in house have a greater budgetary impact, while those in the marketplace will have little or no budget impact and will still allow for local control.

RESPONSE:

The Project Proposal Form provided by the NITC was treated as a “proposal” and was prepared based on the questions asked in each section. The **Shared Systems and Supports** proposal represents more of a scope of work statement. The Project Management Office has identified the outcome-based projects within the proposal that require their own project manager and planning needs, including rough order of magnitude, risk management, communications, stakeholder engagement, training, etc. Previous engagement with the school districts on the Statewide Longitudinal Data System grant funded ADVISER project gave the Agency lessons learned on change management processes. This led to the formation of a Virtual Support Team whose mandate is to provide a distributed and scalable model for training and support through the collaborative relationship between the ESUCC, ESUs, school districts, and NDE. Many of the systems outlined in this project proposal bring changes (improvements) to workflow and practices. These changes will require strong communication throughout the project and effective training as components are rolled out and manage expectations.

The Steering Committee will also be key in communicating and managing the changes needed in the communities they represent, identifying first and second order change needs, and helping to assure any aspects of changes occurring at various stakeholder levels are not missed.

The spreadsheet copied below provides additional budget detail not required by the proposal submission process. The “cost types” were added as requested by the Education Council.

Financial Analysis and Budget Review Score

Strengths:

1. A certain level of trust is granted due to the overall excellence of the proposal.
2. Based on the assumptions in the financial analysis and budget portion of the proposal there will be a tremendous amount of savings by moving to this model. The document points out they are estimating a \$31.3 million in savings per year after the third year of making the changes, that is rather significant.
3. Intended expenditures are clearly articulated.

Weaknesses:

1. Lack of details makes close analysis difficult.
2. Premised savings to districts are mathematically demonstrable, however, the degree to which they can be achieved is not supported by the proposal.

NITC Ed Council comments:

- Additional Budget Detail is requested, specifically "Other Contractual Services".
- I.T. Operations are not included in the budget request.
- Sustained funding will be needed. Additional explanation of sustainability beyond FY19 is requested.

RESPONSE:

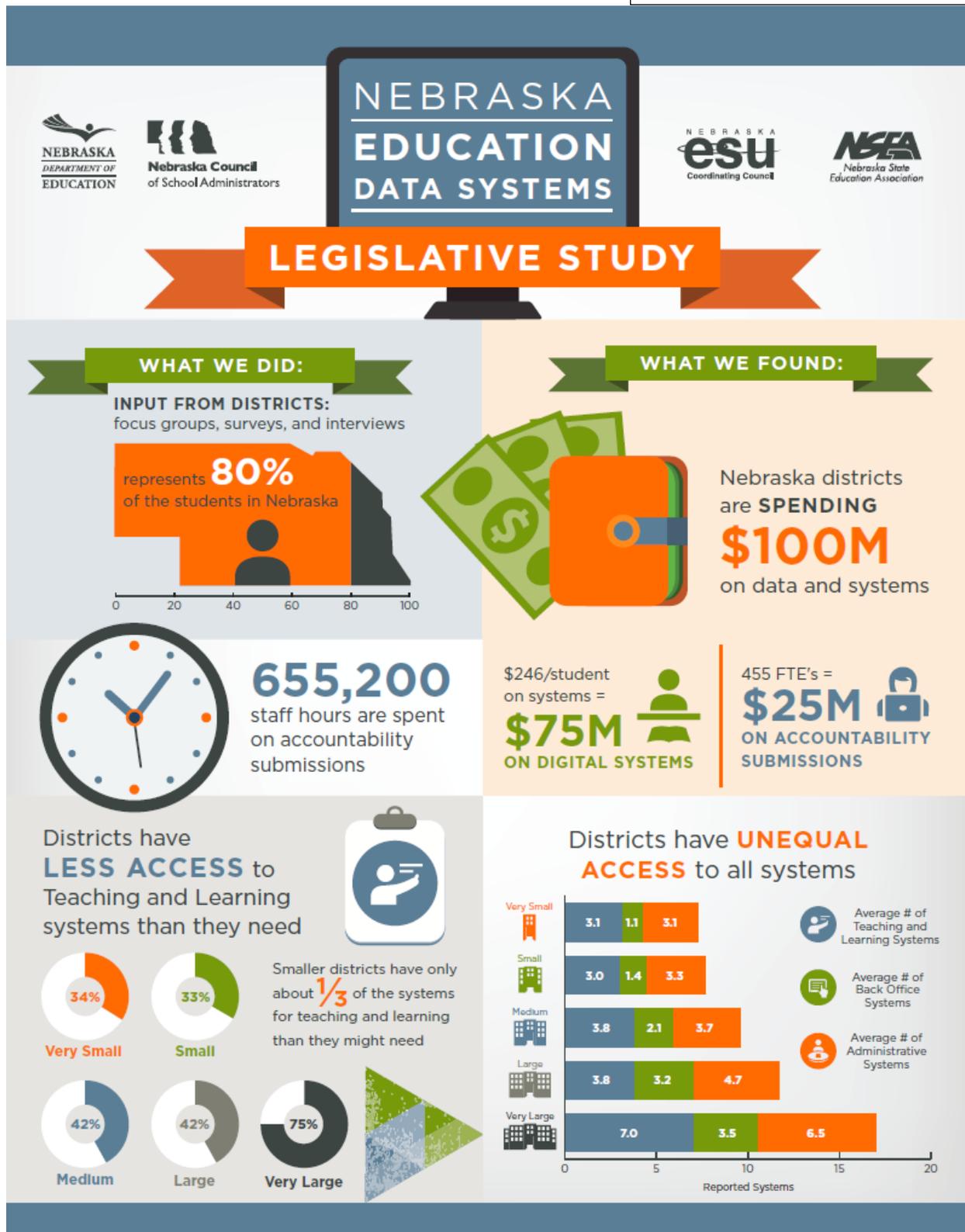
A detailed spreadsheet is attached in Appendix A. The budget form included with the proposal form template limited the detail that could be provided in the cost associated with this proposal. Based on findings in the LR264 study, and using statewide averages, it was determined that the savings over time would average \$200 per student. In some cases it will be more, and in some cases less.

In addition, it is important to clarify that the budget for this proposal is a part of a broader education budget request from the State Board of Education. The State Board of Education budget request fully funded TEEOSA, funded a 10% increase in Special Education, fully funded an increase in ESU aid, and also included the increase in funding for the proposed key systems of support outlined in the project proposal.

Please let me know if I can be of any further assistance.

Sincerely,

Dr. Dean R. Folkers
Chief Information Officer
Nebraska Department of Education



13 - Department of Education

Proposal Name: Teacher Certification Upgrade

NITC ID: 13-02



PROJECT DETAILS

Project Contact: Dean Folkers

Agency Priority: 2

Agency: 13 - Department of Education

NITC Tier Alignment:

SUMMARY OF REQUEST

The teacher certification (TC) and licensure system operated at the Nebraska Department of Education has undergone periodic maintenance and operational retrofitting over the past 15 years. As part of a department wide focus on evaluating systems status, increasing efficiency and operations, and mitigating security risks the TC system has been identified as needing to go through an update. A portion of the licensing fees provided by users is set aside to support future updates/upgrades to the system and are targeted for the process.

The primary scope of an initial phase is the evaluation and documentation of business process, integration of other existing related legacy systems, and a recommendation for the options to move forward with the system upgrade/development. Based on these recommendations and decision will be made as to the appropriate path, costs, and project plan to complete the work.

FINANCIAL SUMMARY

	<u>Expenditures</u>		
	<u>Fiscal Year 2018</u>	<u>Fiscal Year 2019</u>	<u>Total</u>
Contractual Services:	\$275,000.00	\$275,000.00	\$550,000.00
Telecommunications:	\$0.00	\$0.00	\$0.00
Training:	\$0.00	\$0.00	\$0.00
Operating Costs:	\$0.00	\$0.00	\$0.00
Capital Expenditures:	\$0.00	\$0.00	\$0.00
Total Estimated Costs:	\$275,000.00	\$275,000.00	\$550,000.00

Comments:

	<u>Funding</u>		
	<u>Fiscal Year 2018</u>	<u>Fiscal Year 2019</u>	<u>Total</u>
General Fund:	\$0.00	\$0.00	\$0.00
Cash Fund:	\$275,000.00	\$275,000.00	\$550,000.00
Federal Fund:	\$0.00	\$0.00	\$0.00
Revolving Fund:	\$0.00	\$0.00	\$0.00
Other Fund:	\$0.00	\$0.00	\$0.00
Total Requested Funding:	\$275,000.00	\$275,000.00	\$550,000.00

Comments:

PROPOSAL SCORE

		reviewer1	reviewer2	reviewer3	Average
Average	Goals, Objectives and Projected Outcomes (15)	12	15	10	12
	Project Justification / Business Case (25)	24	25	15	21
	Technical Impact (20)	15	10	10	12
	Preliminary Plan for Implementation (10)	7	10	8	8
	Risk Assessment (10)	5	5	6	5
	Financial Analysis and Budget (20)	15	15	15	15
	Total Score	78	80	64	74

REVIEWER COMMENTS

Goals, Objectives and Projected Outcomes

Review Score = 12/15

13 - Department of Education

Proposal Name: Teacher Certification Upgrade

NITC ID: 13-02



Strengths: Existing system is 20-25 years old and needs to be brought up to standards. Review, planning and setting requirements is a sound approach of addressing the problems.

Weaknesses:

Project Justification / Business Case

Review Score = 24/25

Strengths: This project has been anticipated, and use of cash funds that were set aside for this purpose makes sense.

Weaknesses:

Technical Impact

Review Score = 15/20

Strengths:

Weaknesses: Solutions are unknown until recommendations from selected vendor are reviewed.

Preliminary Plan for Implementation

Review Score = 7/10

Strengths:

Weaknesses: Unclear what is being deployed in April through June.

Risk Assessment

Review Score = 5/10

Strengths:

Weaknesses: Proposal states risks cannot be assessed until solutions are proposed.

Financial Analysis and Budget

Review Score = 15/20

Strengths:

Weaknesses: Budget establishes "target" costs. Actuals could vary - how significantly is unknown.

Goals, Objectives and Projected Outcomes

Review Score = 15/15

Strengths: The goals and objectives are quite clear, as are the benefits of the system.

Weaknesses:

Project Justification / Business Case

Review Score = 25/25

Strengths: Project proposal does identify tangible benefits that will accrue based on the implementation of the system. should be noted that this is a starting point for this project and that a solution has not been identified.

Weaknesses:

Technical Impact

Review Score = 10/20

Strengths: Because the solution for this project has not been identified and is very difficult to assess the technical solution.

Weaknesses:

Preliminary Plan for Implementation

Review Score = 10/10

Strengths: It is very positive to see that the NDE project management office will be responsible for overall management of the project. What's provided in the document is very well thought out and clearly identifies roles and responsibilities.

Weaknesses:

Risk Assessment

Review Score = 5/10

Strengths: Somewhat difficult to assign risk when it is still not clear what the solution will be. I think risk can be assigned or reviewed once the requirements have been gathered and the solution identified.

Weaknesses:

Financial Analysis and Budget

Review Score = 15/20

Strengths: While the agency has identified a budget estimate for the project, it is not clear what the total overall cost will be once the solution is identified

Weaknesses:

Goals, Objectives and Projected Outcomes

Review Score = 10/15

Strengths: The need for an update to the existing teacher certification system is clear based on the age of the existing system and desired functionality.

Weaknesses: There is very little detail in available upon which to assess the proposal, however, what is being proposed is to scope a future project.

Project Justification / Business Case

Review Score = 15/25

Strengths: The desired outcomes are desirable and would offer operational efficiencies.

13 - Department of Education

Proposal Name: Teacher Certification Upgrade

NITC ID: 13-02



Weaknesses: There is very little detail in available upon which to assess the proposal, however, what is being proposed is to scope a future project.

Technical Impact

Review Score = 10/20

Strengths: The proposed update is clearly needed to replace a system based on an aged code base.

Weaknesses: At this point in the process it is nearly impossible to assess the technical impact beyond a clear need to remove the risk inherent in operating a mission critical system on such aged technology.

Preliminary Plan for Implementation

Review Score = 8/10

Strengths: The project management infrastructure is consistent with industry best practice and appears capable of addressing the requirements of managing the proposed project.

Weaknesses: There are numerous implementation differences depending upon whether the decision is to build the solution or buy it. It is impossible to make any evaluation of an eventual implementation without greater detail.

Risk Assessment

Review Score = 6/10

Strengths:

Weaknesses: It is impossible to make any reasonable assertions as to the assessment of risk when the project is not scoped.

Financial Analysis and Budget

Review Score = 15/20

Strengths: The proposed is, essentially, budget neutral in that existing funds will be diverted to cover identified costs.

Weaknesses: The proposed budget is fit to available funds rather than clearly delineating required resources.

TECHNICAL PANEL COMMENTS

Is the project technically feasible? Yes

Is the proposed technology appropriate for the project? Unknown

Can the technical elements be accomplished within the proposed timeframe and budget? Unknown

Comments: Unknown until further information is available.

ADVISORY COUNCIL COMMENTS

Advisory Council Tier Recommendation: Tier 1

Comments:

1. More budget detail is requested for "Other Contractual Services".

NITC COMMENTS

AGENCY RESPONSE

23 - Department of Labor

Proposal Name: Modernization of UI Tax and Benefits System

NITC ID: 23-01



PROJECT DETAILS

Project Contact: Terri Slone
Agency: 23 - Department of Labor
NITC Tier Alignment:

Agency Priority: 1

SUMMARY OF REQUEST

The Nebraska Department of Labor (NDOL) will do a total replacement of the existing unemployment insurance (UI) business systems, including the Benefit Payment System (BPS), employer portal (UIConnect), and Tax Management System (TMS). The solution will be a single UI benefits and tax system utilized by both external and internal customers (i.e., employers, claimants, third parties, and staff), fully integrated with the existing NEworks reemployment/employment and case management system and interfaced with other systems as required by the UI program. The implementation will include replacement of existing system platforms, applications, mainframe databases, and processes to support the federally funded UI and reemployment/employment programs.

Currently NDOL's systems reside on separate platforms. BPS and UIConnect are web-based Java applications on an AIX/IBM p750 Series platform with DB2 on the mainframe. TMS is a COBOL application with DB2 on the mainframe. NEworks is a COTS solution with a SQL database. The complexity of the environment requires the agency to contract for managed services to support the IBM platform. The environment requires continual care and feeding, including upgrading hardware and software, in addition to ongoing significant infrastructure costs (see Cost Justification). The integration between BPS and NEworks supports UI, as well as the NERes and RESEA reemployment programs. Because data is shared and the applications are tightly integrated, the complexity of synchronizing both often requires development and duplicity on both sides. The integration between the systems is handled through tokens and web services. A single system would remove the technical barriers described above.

The NERes and RESEA reemployment programs – getting unemployed workers reemployed sooner – are important to Nebraska's economy and to Nebraska employers as it impacts their unemployment insurance tax experience rates, and ultimately, the solvency of the unemployment trust fund.

The proposed single COTS solution would replace existing unemployment systems while providing complete transparency between unemployment and reemployment. The solution would align with the State's mission of providing solutions that make government work and grow Nebraska's economy.

FINANCIAL SUMMARY

	<u>Expenditures</u>		
	<u>Fiscal Year 2018</u>	<u>Fiscal Year 2019</u>	<u>Total</u>
Contractual Services:	\$7,000,000.00	\$7,000,000.00	\$14,000,000.00
Telecommunications:	\$0.00	\$0.00	\$0.00
Training:	\$0.00	\$0.00	\$0.00
Operating Costs:	\$0.00	\$0.00	\$0.00
Capital Expenditures:	\$0.00	\$0.00	\$0.00
Total Estimated Costs:	\$7,000,000.00	\$7,000,000.00	\$14,000,000.00

Comments:

	<u>Funding</u>		
	<u>Fiscal Year 2018</u>	<u>Fiscal Year 2019</u>	<u>Total</u>
General Fund:	\$0.00	\$0.00	\$0.00
Cash Fund:	\$0.00	\$0.00	\$0.00
Federal Fund:	\$7,000,000.00	\$7,000,000.00	\$14,000,000.00
Revolving Fund:	\$0.00	\$0.00	\$0.00
Other Fund:	\$0.00	\$0.00	\$0.00
Total Requested Funding:	\$7,000,000.00	\$7,000,000.00	\$14,000,000.00

Comments:

PROPOSAL SCORE

23 - Department of Labor

Proposal Name: Modernization of UI Tax and Benefits System

NITC ID: 23-01



		reviewer1	reviewer2	reviewer3	Average
Average	Goals, Objectives and Projected Outcomes (15)	12	15	12	13
	Project Justification / Business Case (25)	20	20	23	21
	Technical Impact (20)	20	18	15	18
	Preliminary Plan for Implementation (10)	8	8	6	7
	Risk Assessment (10)	10	8	0	6
	Financial Analysis and Budget (20)	15	16	15	15
	Total Score	85	85	71	80

REVIEWER COMMENTS

Goals, Objectives and Projected Outcomes

Strengths: Single platform and database

Weaknesses: "Reduce support requirements" benefit needs clarification in regards to FTE/Contractor count.

Review Score = 12/15

Project Justification / Business Case

Strengths:

Weaknesses:

Review Score = 20/25

Technical Impact

Strengths: Technically valid modernization path.

Weaknesses:

Review Score = 20/20

Preliminary Plan for Implementation

Strengths:

Weaknesses:

Review Score = 8/10

Risk Assessment

Strengths:

Weaknesses:

Review Score = 10/10

Financial Analysis and Budget

Strengths:

Weaknesses: Need additional information on the ROI. Specifically - Cost of support of legacy and new systems during migration.

Level of FTE/Contractor support after migration is complete and plans to recover reduced resource support costs.

Review Score = 15/20

Goals, Objectives and Projected Outcomes

Strengths: The idea of a one stop single solution will greatly improve customer experience and reduce complexity.

Weaknesses:

Review Score = 15/15

Project Justification / Business Case

Strengths: Based on the proposal cost justification is predicated on potential savings

Weaknesses:

Review Score = 20/25

Technical Impact

Strengths: While the commercial off-the-shelf solution has not been identified yet the decision has apparently been made to utilize

the SQL database instead of the IBM DB2 database.

Weaknesses:

Review Score = 18/20

Preliminary Plan for Implementation

Strengths: it does appear that Department of Labor does have a project management team which is good and also includes a PMO.

Weaknesses: The implementation discussion in the proposal is fairly light on details.

Review Score = 8/10

Risk Assessment

Strengths: While the proposal states that it will reduce risk, and I am sure it will once it is installed.

Weaknesses: The proposal does not address risks associated with migrating to a new system. What is their fallback position?

Review Score = 8/10

23 - Department of Labor

Proposal Name: Modernization of UI Tax and Benefits System

NITC ID: 23-01



Financial Analysis and Budget

Review Score = 16/20

Strengths: Yes there is a financial document and highlights at a high level the approximate costs.

Weaknesses: Not sure what is all included in these costs, implementation support, training, staff augmentation etc.

Goals, Objectives and Projected Outcomes

Review Score = 12/15

Strengths: The projects goals are clear and concise. Goals 1 and 4 are particularly good, due to the definition of how much the cost and numbers of systems will decrease

Weaknesses: The requestor should include details for goals 2 and 3 about measuring the change in re-employment speed and lower support requirements. For the support requirements goal, if that's also meant to be cost-specific, those two might be re-worded.

Project Justification / Business Case

Review Score = 23/25

Strengths: All costs for the current, selected and competitor solutions are clearly defined. The breakeven and savings analyses also clearly show the benefit.

Weaknesses: The cost sheet does not include any reference to enhancements or any maintenance costs that may occur over the life of the project, regardless of the option selected. Is that effort meant to be included in the "IT Staff" costs, or are those costs specific to keeping the system operational?

Technical Impact

Review Score = 15/20

Strengths: The reduction of technologies and adherence to State, Federal and NITC standards are all positives, concerning the impact.

Weaknesses: Information about any considerations given to compatibility with other statewide infrastructure (Citizen Active Directory Forest, any state-level data warehouse initiatives), as well as rationale for moving to SQL from DB2 would improve this section.

Preliminary Plan for Implementation

Review Score = 6/10

Strengths: Sufficient coverage of all responsible parties and the project start and end dates.

Weaknesses: Major milestones and intermediate deliverables would improve the plan. Additionally, a description of the provider's experience as well as any options for what the training (both public and internal) would look like would add value.

Risk Assessment

Review Score = 0/10

Strengths:

Weaknesses: This section is meant to highlight risks to the project, not risks avoided by implementing the project. Consider issues like: cost overruns to due integration complexity, changes on external systems (Federal systems for example) during development, changes in law. Since federal funds are being requested, another risk to cover would be if those funds were either reduced or no longer available.

Financial Analysis and Budget

Review Score = 15/20

Strengths: The costs provided are all reasonable, assuming the staff costs are covered in the Department's annual budget outside of the project.

Weaknesses: The project costs in the IT Project Proposal Report (23-01.pdf) requests \$14MM in Federal Funds. There's no commentary around where those funds are coming from and what their availability is.

TECHNICAL PANEL COMMENTS

Is the project technically feasible? Yes

Is the proposed technology appropriate for the project? Yes

Can the technical elements be accomplished within the proposed timeframe and budget? Unknown

Comments: Unknown until further information is available.

ADVISORY COUNCIL COMMENTS

Advisory Council Tier Recommendation: Tier 2

Comments:

23 - Department of Labor

Proposal Name: Modernization of UI Tax and Benefits System

NITC ID: 23-01



NITC COMMENTS

AGENCY RESPONSE

See attachment [23-01_agencyreponse.pdf] for agency response

IT Project Proposal Comments
Agency 023 – Department of Labor
Budget Cycle: 2017 – 2019 Biennium
IT Project: Modernization of UI Tax and Benefits System

Goals, Objectives and Projected Outcomes

Reviewer Comment(s):

- (1) *Reduce support requirements benefit needs clarification in regards to FTE/Contractor count.*
- (2) *The requestor should include details for goals 2 [Reemploy unemployment claimants sooner] and 3 [Reduce support requirements] about measuring the change in reemployment speed and lower support requirements for the support requirements goal, if that's also meant to be cost-specific, those two might be re-worded.*

The Unemployment Insurance program is 100% federally funded. Administrative funds (Base) are provided on the Federal Fiscal Year cycle, starting October 1 and ending September 30. An additional 3-month period allows for Administrative funds obligated on September 30 to be liquidated by December 31 each year. The Administrative grant funds FTE staff in UI Benefits, Tax, Appeals, and most positions in IT. Unliquidated Administrative funds (Above Base) on January 1 each year become "Automation" funds to be used to support UI system enhancement or projects. In addition, when available from USDOL, the Agency receives Supplemental Budget Request (SBR) funds for UI IT projects. Both Automation and SBR funded projects *must* utilize Contract staff, according to the funding requirements set forth by USDOL. Therefore, Labor currently utilizes 10 Contractors for projects funded by Automation or SBR funds.

During development of the new UI system, State FTE would continue to support the existing production environment, funded by the UI Administrative grant. New system development would be done by the COTS provider. Once the new UI system is in production, it would be supported by a reduced number of State FTE (see below) and the COTS provider.

With a consolidated system, the COTS provider would replace the 10 current Contract staff that support UI Automation or SBR funded projects, resulting in a savings of approximately \$1,738,880 per year. The COTS provider would also provide day-to-day production support, reducing the required number of State FTE from 39 to 13, saving \$2,223,094 per year, for a total of \$3,961,974 per year. In addition, the new System would no longer require support for the IBM AIX/WebSphere platform currently provided under a Managed Service Agreement by Sirius Computer Solutions, which is currently \$165,960 per year.

With a single solution, the Agency would not only consolidate platforms and reduce costs, but create one-stop service delivery to UI claimants to not only receive temporary assistance due to job loss through no fault of their own, but also enable them to become reemployed sooner. With the single solution, the claimant is able to complete an online searchable resume and register for and be scheduled for reemployment services even before filing their initial claim for unemployment insurance benefits, facilitating the reemployment process up front. Jobs are presented to claimants upon completion of a weekly claim for benefits and daily via system

notifications that match NE jobs to a claimant's education, experience, and skills. The ability to measure reemployment is further enhanced by having the data available on a single system.

Project Justification/Business Case Reviewer

Comment(s):

- (1) *The cost sheet does not include any reference to enhancements or any maintenance costs that may occur over the life of the project, regardless of the option selected. Is that effort meant to be included in the "IT Staff" costs, or are those costs specific to keeping the system operational?*

The maintenance costs for the COTS provider are included in the Annual License Fee (\$2,500,000/year). Any federal legislation that is applicable to all States that may require an enhancement to the core code is included in the Annual License Fee. State-specific requirements or legislation may be incorporated into the core code or may require a Change Order. Change Orders would be budgeted in the Administrative grant, which we estimate will realize a savings of at least \$571,462 per year based upon the COTS provider scenario. The other scenarios are more difficult to estimate until RFP bids are received, but the Agency's goals and objectives remain the same, and costs of enhancements and ongoing maintenance will be carefully reviewed to ensure they align during the RFP process.

Technical Impact

Reviewer Comment(s):

- (1) *Any considerations given to compatibility with other statewide infrastructure (Citizen Active Directory Forest, any state-level data warehouse initiatives, as well as rationale for moving to SQL from DB2 would improve this section.*

The RFP developed by the Agency requires compliance with NITC standards and guidelines and will be reviewed and approved by OCIO prior to release. Labor has always been an active participant in the State enterprise solutions (ECM, Active Directory, STN Domain, IVR, etc.). We will continue to do so, understanding the value of such. Labor's OU in the Citizens Forest is currently used for the UI Tax employer portal, UIConnect. We are very interested in a solution utilizing the Citizen Forest for our employer/Third Party Administrator community. Our current data warehouse was developed under the Workforce Data Quality Initiative grant, with the goal of expanding universes, incorporating and sharing data with State agencies and workforce partners. Labor is interested in migrating data from DB2 on the mainframe to SQL for cost efficiencies. DB2 on the mainframe requires constant and consistent monitoring by our DBA to maintain or prevent spikes in costs. Our Java developers are trained to write efficient code for the same reason. Our experience is that during seasonal workload increases and economic downturns, CPU costs spike and are difficult to manage. SQL DBAs are typically more available and less cost, as well.

Preliminary Plan for Implementation

Reviewer Comment(s):

- (1) *The implementation discussion in the proposal is fairly light on details.*

(2) Major milestones and intermediate deliverables would improve the plan. Additionally, a description of the provider's experience as well as any options for what the training (both public and internal) would look like would add value.

Below is a preliminary project plan. A detailed project plan will be developed by the Contractor as a requirement of the RFP, along with detailed project documentation deliverables. Labor has been developing the requirements for the RFP since April 2016. We are completing the final draft and plan to release the RFP by the end of the year (2016) and have a Contract in place so development can commence on June 26, 2017. This project will be completed within three years, by June 30, 2020.

Task Name	Duration	Start	Finish
RFP Planning	319 Days	Tue 4/5/16	Fri 6/23/17
UI Modernization Requirements Kickoff	1 Day	Tue 4/5/16	Tue 4/5/16
Analysis/Leveraging UI RFP Requirements	104 Days	Wed 4/6/16	Mon 8/29/16
RFP Development	83 Days	Mon 8/8/16	Wed 11/30/16
RFT Draft Approvals (OCIO / DAS)	21 Days	Thu 12/1/16	Fri 12/30/16
Release of RFP, Advertising, Posting	41 Days	Tues 1/3/17	Tues 2/28/17
RFP Review, Scoring, Award of Bid, Contract	86 Days	Wed 3/1/17	Fri 6/23/17
System Development / Integration / Testing / Implementation	1062 Days	Tues 6/27/17	Fri 6/26/20
Project Kickoff	1 Day	Tues 6/27/17	Tues 6/27/17
Project Plan and Other Contract Deliverables	9 Days	Tue 6/27/17	Fri 7/7/17
Development, Data Migration, Integrations, Interfaces	1010 Days	Mon 7/10/17	
Testing (Each Iteration)	1010 Days	Mon 7/10/17	Fri 6/5/20
Training	35 Days	Mon 5/18/20	Fri 6/26/20
Messaging (Internal and External)	35 Days	Mon 5/18/20	Fri 6/26/20
Go Live Week	7 Days	Thu 6/18/20	Fri 6/26/20

A requirement of the RFP is that the chosen vendor has successfully implemented fully modernized Tax or Benefit solutions in other States. Project documentation deliverables include (not limited to):

- Functional and Non-Functional Requirements Finalization Plan
- Requirements Management Tool
- System Architecture and Design
- System Analysis and Design
- Design and Development Environment
- Sandbox Environment
- Testing Environment
- Training Environment
- Data Staging Environment
- Production Environment
- Logical and Physical Data Modeling

Project Management Plan
 Project Status Reports
 Service Level Reports
 Change Management Plan
 Risk Management Plan
 Incident Reporting Plan
 Security Plan
 Annual Cyber Security Plan
 Configuration Management Tool
 Quality Assurance Plan
 Human Resource Plan
 Test Plan
 Build Management Plan
 Defect Management Tool
 Iteration Test Plan
 Help Desk and Tracking System
 Monitoring Tools
 Disaster Recovery/Backup Plan
Training Plan
Knowledge Transfer Plan
 Data Conversion Plan
 Data Conversion and Verification
 Deployment Plan

Instructive documentation will be developed for Public users and a Communication Plan will be developed by the Agency PIO.

Risk Assessment

- (1) *The proposal does not address risks associated with migrating to a new system. What is their fallback position?*
- (2) *This section is meant to highlight risks to the project, not risks avoided by implementing the project. Consider issues like: cost overruns due to integration complexity, changes on external systems (Federal systems for example) during development, changes in law. Since federal funds are being requested, another risk to cover would be if those funds were either reduced or no longer available.*

The funding has been in place since 2002 and is more than sufficient. It does require an appropriation, so we must stay within budget to ensure no further appropriation is required.

RFP requirements cover all integrations, data exchanges, interfaces to internal and external systems, including Federal systems and will be included in the Contractor's bid. The existing systems would not be decommissioned until the new system is implemented and operational.

Based upon experience, a risk is lack of resource from the Contractor due to other contracts that may occur during our development cycle and the possibility that they may not be able to scale up accordingly. The Contractor is required to provide knowledgeable, experienced resource with UI experience.

Economic downturn is our biggest risk. During the last recession, staff and contractor resources were strained to keep up with the demands of the workload and mandated legislation. The existing system has been and will continue to be enhanced to ensure we are as prepared as possible for economic downturn to continue production activities during new system development. New legislative requirements may require development in both systems. The RFP requires the Contractor to implement federally mandated legislative requirements at no additional cost. During the most recent recession, the Congress enacted many changes to the unemployment benefit payment system that had to be implemented by state staff at a considerable cost to the Agency. A COTS solution shifts the risk of loss in the event of federally mandated changes from the State to the COTS provider. **Financial Analysis and Budget**

- (1) *Need additional information on the ROI. Specifically, cost of support of legacy and new systems during migration. Level of FTE/Contractor support after migration is complete and plans to recover reduced resource support costs.*
- (2) *Not sure what is all included in these costs; implementation, support, training, staff augmentation, etc.*
- (3) *The project costs in the IT Project Proposal Report requests \$14M in Federal Funds. There's no commentary around where those funds are coming from or what their availability is.*

Legacy system(s) costs will continue during development of the new system and are part of the Biennium Budget submission. They are funded by the UI Administrative grant under Program 31 and are currently \$4,272,748 for UI Systems (BPS, UIConnect, TMS, REX) and UI IT Staff.

Reed Act funds, under Title IX of the Social Security Act, provide the funding for the development of the proposed system. Reed Act distributions to states occur under certain financial conditions where there are excess federal tax funds in the federal Unemployment Trust Fund. The transferred funds are referred to as Reed Act distributions. States are permitted to use Reed Act funds for the "administration of its unemployment compensation law and public employment offices". NE has received several Reed Act distributions, the last being in 2002. These funds are available for use upon appropriation by the Legislature.

During development of the new UI system, State FTE would continue to support the existing production environment, funded by the UI Administrative grant. New system development would be done by the COTS provider. Once the new UI system is in production, it would be supported by a reduced number of State FTE (see **Goals, Objectives and Projected Outcomes** and **Project Justification/Business Case** sections) and the COTS provider. The RFP requires a 10-year Total Cost of Ownership proposal and includes development, implementation, training, and staff augmentation. Maintenance costs would be covered by the UI Administrative grant post-production.

Savings from reduced costs will support the UI program and improved service delivery. Administrative funding for UI programs nationwide has decreased, in large part due to diminished workload since the recession. However, IT costs continue to rise regardless of workload. The UI program in Nebraska is entirely dependent on the federal Administrative grant.

From FFY16 to FFY17, Nebraska experienced a 28.4% cut in Administrative funding for nonpersonal services, from \$3,023,431 to \$2,163,748 (Note: State IT staff do not necessarily factor into this. See below). This follows a decrease of \$194,912 from FFY15 to FFY16.

Unlike other states, Nebraska does not receive state general funds for the administrative operation of the program. Nebraska has been able to support innovative modernization efforts in large part due to frugal budgeting of the Administrative grant, resulting in Automation funding, as well as utilizing Supplemental Budget Request (SBR) opportunities aimed at efficient and improved IT operations. Unfortunately, due to decreased Administrative funding, there is no projected Automation funding in 2017 and SBR opportunities have dwindled.

Sources:

UIPL 19-14, Att I, https://wdr.doleta.gov/directives/attach/UIPL/UIPL_19-14_Attachment_I_Acc.pdf

UIPL 21-15, Att I, https://wdr.doleta.gov/directives/attach/UIPL/UIPL_21-15_Attachment_I.pdf

UIPL 20-16, Att I, https://wdr.doleta.gov/directives/attach/UIPL/UIPL_20-16-Attachment1_Acc.pdf

ET Handbook 410, 5th Edition, Resource Justification Model, from UIPL 15-16, Att I, https://wdr.doleta.gov/directives/attach/UIPL/UIPL_15-16_Attachment1_Acc.pdf

39 - Nebraska Brand Committee

Proposal Name: Nebraska Brand Committee (NBC) - Database System
NITC ID: 39-01



PROJECT DETAILS

Project Contact: Shawn Harvey
Agency: 39 - Nebraska Brand Committee
NITC Tier Alignment:

Agency Priority: 1

SUMMARY OF REQUEST

The Nebraska Brand Committee has a proposal from Nebraska Interactive LLC to develop a program to automate many of its functions, increase efficiencies such as reducing data entry and call volume, and implementing additional audit controls.

The program will develop a mobile brand inspection application for inspectors to include supplying mobile devices and printers. The program will also include implementation of payment processing, minimizing the need for inspectors to hold and carry or check payments. The payment data along with the inspection records will automatically be submitted to the NBC Database System, eliminating data entry, providing timely receipt and disbursement of monies, and access to inspection records.

FINANCIAL SUMMARY

	<u>Expenditures</u>		
	<u>Fiscal Year 2018</u>	<u>Fiscal Year 2019</u>	<u>Total</u>
Contractual Services:	\$216,000.00	\$216,000.00	\$432,000.00
Telecommunications:	\$0.00	\$0.00	\$0.00
Training:	\$0.00	\$0.00	\$0.00
Operating Costs:	\$0.00	\$0.00	\$0.00
Capital Expenditures:	\$0.00	\$0.00	\$0.00
Total Estimated Costs:	\$216,000.00	\$216,000.00	\$432,000.00

Comments:

	<u>Funding</u>		
	<u>Fiscal Year 2018</u>	<u>Fiscal Year 2019</u>	<u>Total</u>
General Fund:	\$0.00	\$0.00	\$0.00
Cash Fund:	\$216,000.00	\$216,000.00	\$432,000.00
Federal Fund:	\$0.00	\$0.00	\$0.00
Revolving Fund:	\$0.00	\$0.00	\$0.00
Other Fund:	\$0.00	\$0.00	\$0.00
Total Requested Funding:	\$216,000.00	\$216,000.00	\$432,000.00

Comments:

PROPOSAL SCORE

		<u>reviewer1</u>	<u>reviewer2</u>	<u>reviewer3</u>	<u>Average</u>
Average	Goals, Objectives and Projected Outcomes (15)	15	11	15	14
	Project Justification / Business Case (25)	20	20	25	22
	Technical Impact (20)	18	15	16	16
	Preliminary Plan for Implementation (10)	10	8	10	9
	Risk Assessment (10)	10	6	8	8
	Financial Analysis and Budget (20)	20	15	20	18
	Total Score	93	75	94	87

REVIEWER COMMENTS

Goals, Objectives and Projected Outcomes

Review Score = 15/15

Strengths:

Weaknesses:

39 - Nebraska Brand Committee

Proposal Name: Nebraska Brand Committee (NBC) - Database System

NITC ID: 39-01



Project Justification / Business Case	Review Score = 20/25
Strengths:	
Weaknesses:	
Technical Impact	Review Score = 18/20
Strengths:	
Weaknesses:	
Preliminary Plan for Implementation	Review Score = 10/10
Strengths:	
Weaknesses:	
Risk Assessment	Review Score = 10/10
Strengths:	
Weaknesses:	
Financial Analysis and Budget	Review Score = 20/20
Strengths: I believe this will be of financial value due to greater efficiency and overall reporting and analytics.	
Weaknesses:	
<hr/>	
Goals, Objectives and Projected Outcomes	Review Score = 11/15
Strengths: Conceptually a good project.	
Weaknesses: Not sure all aspects of operation have been considered and all of the variability of devices that can or will be used.	
Project Justification / Business Case	Review Score = 20/25
Strengths: This appears to be a project consistent with the Governor goals/expectations	
Weaknesses: Not comfortable with the numbers provided for accomplishing the project. Believe the numbers may be low in the cost of the total project.	
Technical Impact	Review Score = 15/20
Strengths:	
Weaknesses: concerned with the overall security or need for security of the project. Could not determine from the proposal if there was security provided at all levels of the operation or if the customer was not required to have any form of secure ID for using the system.	
Preliminary Plan for Implementation	Review Score = 8/10
Strengths:	
Weaknesses: The plan for implementation contains a lot of scoping and discovery meetings. The proposed project could change during the initial phases.	
Risk Assessment	Review Score = 6/10
Strengths:	
Weaknesses: If there was a better explanation of overall security, this number could be higher, but there is a concern on the overall security/ID operation of the application	
Financial Analysis and Budget	Review Score = 15/20
Strengths: project income is good	
Weaknesses: projected costs may be off for development and hardware/device costs.	
<hr/>	
Goals, Objectives and Projected Outcomes	Review Score = 15/15
Strengths:	
Weaknesses:	
Project Justification / Business Case	Review Score = 25/25
Strengths:	
Weaknesses:	
Technical Impact	Review Score = 16/20
Strengths:	

39 - Nebraska Brand Committee

Proposal Name: Nebraska Brand Committee (NBC) - Database System

NITC ID: 39-01



Weaknesses: Connection to the internet is required by user of system, This will be a mobile systems that stores and uploads data when internet not available, not clear how data lose from device would be handled. Mobile devices should be running some type of MDM (mobile device management) for security. Will devices be used for access to other internet sites?

Technical support for devices not clearly defined.

Preliminary Plan for Implementation

Review Score = 10/10

Strengths:

Weaknesses:

Risk Assessment

Review Score = 8/10

Strengths:

Weaknesses: Use of mobile devices in the field new for this agency. User training will be critical as well as call support to answer user question when running application in the field.

Financial Analysis and Budget

Review Score = 20/20

Strengths: cost risk to agency minimized based on fee based charges,

Weaknesses:

TECHNICAL PANEL COMMENTS

Is the project technically feasible? Yes

Is the proposed technology appropriate for the project? Yes

Can the technical elements be accomplished within the proposed timeframe and budget? Yes

Comments:

ADVISORY COUNCIL COMMENTS

Advisory Council Tier Recommendation: Tier 2

Comments:

NITC COMMENTS

AGENCY RESPONSE

See attachment [39-01_agencyresponse.pdf] for agency response

Gentlemen,

I spoke with Steven Chase, Executive Director for the State Records Board, regarding some possible confusion regarding the 2017-2019 Biennium Budget request for the Nebraska Brand Committee referencing an IT Issue for a Data Base System. He suggested we send you an email to clarify any of that confusion.

To clarify, when working with our budget analyst through the budget process, it was advised that we include an IT Plan to address the need for additional spending authority to pay for the project management of the Data Base System being developed for the Nebraska Brand Committee by Nebraska Interactive LLC.

The Nebraska Brand Committee is not asking for additional funds, only additional spending authority to cover the future expense of the project.

The Nebraska Brand Committee is a self-funded agency and all expenses are paid by funds received through inspections and brand recording. The current Data Base System being developed will be based off that self-funded model. When a producer pays for the inspection, whether it be electronically at the point of inspection, or at a later date on-line, any fee charged for the processing of that electronic transaction will be covered by the Nebraska Brand Committee in the 6 cents per head paid to Nebraska Interactive for the management of the program.

Again, the Nebraska Brand Committee is only asking for additional spending authority and not additional funds. Including the IT Issue in the budget process was only done under advisement to help explain what is planned.

If you have any questions or future concerns please let us know.

Thanks,

Shawn D. Harvey

Chief Investigator/Chief Inspector
Nebraska Brand Committee
Office: (308) 763-2930
Email: shawn.harvey@nebraska.gov

46 - Department of Correctional Services

Proposal Name: CIT - Corrections Information and Tracking System
NITC ID: 46-01



PROJECT DETAILS

Project Contact: Ron TeBrink
Agency: 46 - Department of Correctional Services
NITC Tier Alignment:

Agency Priority: 1

SUMMARY OF REQUEST

The Nebraska Department of Corrections operates 10 facilities responsible for 6500 inmates with a staff of 2200 employees. Currently Inmate accounting is in the Corrections Information and Tracking system (CIT) and was developed and then implemented on May 1, 1997. This system is crucial to the stability of maintaining accurate financial records for the inmate population. This is a mainframe system that has reporting limitations from the start the system. Certain reports and data can only be obtained through Structured Query Language (SQL) which runs against the live production system. Since being developed almost 20 years ago, the advancement of technology and platforms has given us the opportunity to develop a more efficient, effective and supportable application.

FINANCIAL SUMMARY

	<u>Expenditures</u>		
	<u>Fiscal Year 2018</u>	<u>Fiscal Year 2019</u>	<u>Total</u>
Contractual Services:	\$700,000.00	\$700,000.00	\$1,400,000.00
Telecommunications:	\$0.00	\$0.00	\$0.00
Training:	\$0.00	\$0.00	\$0.00
Operating Costs:	\$0.00	\$0.00	\$0.00
Capital Expenditures:	\$0.00	\$0.00	\$0.00
Total Estimated Costs:	\$700,000.00	\$700,000.00	\$1,400,000.00

Comments:

	<u>Funding</u>		
	<u>Fiscal Year 2018</u>	<u>Fiscal Year 2019</u>	<u>Total</u>
General Fund:	\$0.00	\$0.00	\$0.00
Cash Fund:	\$0.00	\$0.00	\$0.00
Federal Fund:	\$0.00	\$0.00	\$0.00
Revolving Fund:	\$700,000.00	\$700,000.00	\$1,400,000.00
Other Fund:	\$0.00	\$0.00	\$0.00
Total Requested Funding:	\$700,000.00	\$700,000.00	\$1,400,000.00

Comments:

PROPOSAL SCORE

		reviewer1	reviewer2	reviewer3	Average
Average	Goals, Objectives and Projected Outcomes (15)	10	10	9	10
	Project Justification / Business Case (25)	16	13	15	15
	Technical Impact (20)	12	12	10	11
	Preliminary Plan for Implementation (10)	5	5	5	5
	Risk Assessment (10)	7	10	5	7
	Financial Analysis and Budget (20)	13	13	10	12
	Total Score	63	63	54	60

REVIEWER COMMENTS

Goals, Objectives and Projected Outcomes

Review Score = 10/15

Strengths:

Weaknesses: Lack of details.

46 - Department of Correctional Services

Proposal Name: CIT - Corrections Information and Tracking System

NITC ID: 46-01



Project Justification / Business Case

Strengths:
Weaknesses: Benefits, other than replacing outdated and inefficient system, are not articulated. Review Score = 16/25

Technical Impact

Strengths:
Weaknesses: Lack of details restricts the technical impact scoring. Review Score = 12/20

Preliminary Plan for Implementation

Strengths: Implementation plan is vague and incomplete. Review Score = 5/10
Weaknesses:

Risk Assessment

Strengths: Risk is substantial. Review Score = 7/10
Weaknesses: Proposal scoring is limited by lack of details.

Financial Analysis and Budget

Strengths: Review Score = 13/20
Weaknesses: What the financials are based upon is not documented.

Goals, Objectives and Projected Outcomes

Strengths: Understand the objective, Review Score = 10/15
Weaknesses: the description is unclear as to the final product. Written as if the reviewer already has a full understanding of NDCS operations.

Project Justification / Business Case

Strengths: Review Score = 13/25
Weaknesses: No idea what NiCams is or the need for integration. Difficult to evaluate with little knowledge or understanding of how this is a beneficial move. Agree with moving from the mainframe

Technical Impact

Strengths: Quite likely a very good project, however Review Score = 12/20
Weaknesses: Again, no understanding of the end goal and system to evaluate for value.

Preliminary Plan for Implementation

Strengths: Review Score = 5/10
Weaknesses: Proposal needs more work and detail to provide a complete review.

Risk Assessment

Strengths: agree with the mainframe risk Review Score = 10/10
Weaknesses:

Financial Analysis and Budget

Strengths: Review Score = 13/20
Weaknesses: not enough info provide to support the overall project benefit..

Goals, Objectives and Projected Outcomes

Strengths: There is little doubt that a system nearly to decades old where reporting requires direct database access is in significant need of update for information security, data privacy, human interface and efficiency reasons. While basing decisions on data is an important goal, simple operational efficiency is reason enough to consider updating the existing system. Review Score = 9/15
Weaknesses: Brevity and concision are admirable qualities, however, in this case the proposer did not provide adequate information.

Project Justification / Business Case

Strengths: Replacement of the existing system is beneficial for all the reasons previously stated. Review Score = 15/25
Weaknesses: While the business case is easily made for updating the existing environment, very scant information was provided to assess the proposal. The lack of specificity in what is being proposed makes it impossible to fully evaluate the business case.

Technical Impact

Strengths: The proposer articulates both a clear need to update the existing environment and provides a possible alternative. Review Score = 10/20

46 - Department of Correctional Services

Proposal Name: CIT - Corrections Information and Tracking System

NITC ID: 46-01



Weaknesses: There is no evidence provided as to what alternatives have been investigated and what ability there is to execute the proposed project.

Preliminary Plan for Implementation

Review Score = 5/10

Strengths: The articulated plan outlines a process of scoping the project based on stakeholder input.

Weaknesses: There is not adequate detail to determine what will be implemented, how it will be implemented or the project resources that will be committed.

Risk Assessment

Review Score = 5/10

Strengths: The need to update the existing system is clearly articulated.

Weaknesses: The proposer provides very little information as to the "what" and the "how" of getting from the current situation to the desired outcome.

Financial Analysis and Budget

Review Score = 10/20

Strengths:

Weaknesses: Based on the available information it is impossible to determine what is being funded.

TECHNICAL PANEL COMMENTS

Is the project technically feasible? Unknown

Is the proposed technology appropriate for the project? Unknown

Can the technical elements be accomplished within the proposed timeframe and budget? Unknown

Comments: Insufficient information in the proposal to evaluate the technical elements.

ADVISORY COUNCIL COMMENTS

Advisory Council Tier Recommendation:

Comments:

Insufficient information to recommend a tier

NITC COMMENTS

AGENCY RESPONSE

See attachment [46-01_agencyresponse.pdf] for agency response.

IT Project: CIT

EXECUTIVE SUMMARY (UPDATED):

The Nebraska Department of Corrections operates 10 facilities responsible for 6500 inmates with a staff of 2200 employees. The primary applications that support Inmate Case Management and Inmate Accounting include:

1. CTS – Corrections Tracking System: This application is the oldest application and was rewritten on a relational database on the mainframe around the year 2000. This version runs on DB2/CICS today and is the initial ‘starting point’ for entry of an inmate.
2. CIT – Corrections Information and Tracking system (CIT): This system was developed and then implemented on May 1, 1997. This system is crucial to the stability of maintaining accurate financial records for the inmate population. This is a mainframe system that has reporting limitations from the start the system. Certain reports and data can only be obtained through Structured Query Language (SQL) which runs against the live production system. Since being developed almost 20 years ago, the advancement of technology and platforms has given us the opportunity to develop a more efficient, effective and supportable application.
3. NICaMS (previously ‘Websuite’) – the Nebraska Inmate Case Management System (NICaMS) was developed to replace applications developed by NDCS on the IBMs VM platform that was being ‘sunsetting’. These applications are web-based, written in Java and use a SQL-Server back-end. As this platform is more flexible, accessible and maintainable, all new application development was to be done on this platform. The platform has grown to over 200 screens and subsystems.
4. An Oracle Business Intelligence and Reporting product (OBIEE) that runs on the web platform is used for all the majority of NDCS’s reporting. Extensive dashboards of canned reports spanning a half a dozen business areas have been built in this tool. It also is used for ad hoc reporting as well. In order to include data that originates on the mainframe (in DB2), that data must be passed down to SQL Server tables.

NDCS’s IT direction was to move both the CTS and CIT systems off of the mainframe to the modernized web-based platform gradually, over time. Until that time, the three systems are tightly dependent on each other, but require nightly downloads from the mainframe to the SQL Server platform to keep them synchronized. As a result, data that originates on the mainframe could be 24 hours behind when viewed from the NICaMS screens or when reported on through OBIEE.

In 2010, all Adult Parole data we moved off the mainframe into NICaMS, to a subsystem called PIMS. Then in March of 2015, the first large-scale effort to move significant modules from CTS on the mainframe to NICaMS was initiated. This project – the Sentence Calculation Rewrite Project (SCRP) moved all inmate sentence calculation functions from the mainframe to NICaMS. This NICaMS subsystem went live on 9/24/2016.

What remains on the mainframe are portions of CTS and all of CIT. The admission process and all inmate movement tracking remain in CTS and will need to be moved to NICaMS. The admission process in CTS can also be thought of as the ‘first step’ in the CIT system; upon entry of a new inmate into CTS, all the inmate accounts in CIT are set up. CTS and CIT are tightly integrated and dependent on each other. Consideration of both systems has to be planned for in any future project to migrate either from the mainframe to the web platform.

GOALS, OBJECTIVES, AND OUTCOMES (15 PTS):

The goal of NDCS is to become more data driven in the analysis of our business. With this objective in mind the need to build a user friendly application for inmate accounting that can be used and shared by a greater number of our staff, will increase our ability to meet these directives. The CIT system, and the remainder of the CTS system, house critical data that is needed for capacity planning, data analysis, and intel, and has to be available for immediately for inquiry, entry and reporting. Data must be able to be secured at a more granular level and selectively available to the correct target audience in reports or view only screens. By moving the remaining mainframe systems to the web platform, all data will be immediately available as soon as it is entered and much easier to share with other law enforcement and criminal justice entities and victim notification processes.

The migration of the inmate admission process, inmate movement process and all accounting functions will need to be considered in one project, although the actual migration can be staged in phases. Phase 1 was the migration of all sentencing functions to the web platform. This request will encompass the migration of the remaining mainframe functionality, likely in 2 additional phases.

ORIGINAL FEEDBACK:

Review Scores = 10/15, 10/15, 9/15

Strengths: Understand the objective;

There is little doubt that a system nearly two decades old where reporting requires direct database access is in significant need of update for information security, data privacy, human interface and efficiency reasons. While basing decisions on data is an important goal, simple operational efficiency is reason enough to consider updating the existing system.

Weaknesses: Lack of details.

(**Response** – Added detail in this section and Executive Summary.)

The description is unclear as to the final product; written as if the reviewer already has a full understanding of NDCS operations.

(**Response** – added a clearer description of the end result in this section. A full description of NICaMS and the main NDCS systems is now in the Executive Summary.)

Brevity and concision are admirable qualities; however, in this case the proposer did not provide adequate information.

(**Response** – added additional detail in this section and the Executive Summary.)

PROJECT JUSTIFICATION / BUSINESS CASE (25 PTS):

With the current CIT application as a mainframe solution, NDCS has been limited in the ability to integrate the CIT and NICaMS applications. Integrating the CIT application with NICaMS would allow the ability to effectively utilize existing data base entries, to help eliminate errors and duplicating data entry.

Currently certain reports and data can only be obtained through Structured Query Language (SQL), and this runs against the live production system.

Accounting staff most knowledgeable in developing queries is limited and while we have had training classes with Accounting staff, this is a difficult system to learn. OCIO and NDCS have limited resources to ensure the system stays operational and able to implement program changes to comply with statutory and

other requirements. This system is also used for the canteen sales and inventory. A system developed in NICaMS would allow better report writing by more users and more information would be readily available to various staff within DCS. Additionally, NDCS would be better served by focusing resources on the development of the system in an environment other than the mainframe.

The mainframe platform is not as nimble and flexible as the web platform for making changes. The NICaMS web-based architecture will allow NDCS to be more responsive to legislative changes and business process improvement. Development resources for Java, SQL Server are far more available than resources that can support COBOL, CICS, and other mainframe technologies. Additionally, many existing support resources are at or near retirement age and re-filling those positions will be difficult.

In addition, as other mission critical applications are developed, or purchased from vendors, data sharing between web-based applications using relational views and stored procedures makes overnight jobs and SFTP'ing of data obsolete; data is immediately available to partner applications such as NCJIS, VINE, State Patrol systems. We can integrate with applications purchased from outside vendors in real-time. Opportunities to share data immediately with the FBI, DMV (for facial recognition) and Departments of Revenue, Labor or DHHS are greatly enhanced.

ORIGINAL FEEDBACK:

Review Scores = 16/25, 13/25, 15/25

Strengths: Replacement of the existing system is beneficial for all the reasons previously stated.

Weaknesses: Benefits, other than replacing outdated and inefficient system, are not articulated.
(**Response** – these benefits have been clarified in this section and in preceding sections.)

No idea what NICaMS is or the need for integration. Difficult to evaluate with little knowledge or understanding of how this is a beneficial move. Agree with moving from the mainframe

(**Response** – The explanation of NDCS's primary systems has been added to the Executive Summary.)

While the business case is easily made for updating the existing environment, very scant information was provided to assess the proposal. The lack of specificity in what is being proposed makes it impossible to fully evaluate the business case.

(**Response** – additional details have been added in this section and the preceding sections. Additional specificity will be added when we begin defining the project scope and writing the initial charter.)

TECHNICAL IMPACT (20 PTS):

A system developed in NICaMS would allow better report writing by more users and more information would be readily available to various staff within NDCS. While the data from the mainframe can be brought in to NICaMS, it is not up to the minute and is only as good as the previous day. Additionally, NDCS would be better served by focusing resources on the development of the system in an environment other than the mainframe.

NDCS's mission critical inmate case management and accounting systems have spanned multiple technical platforms for nearly 20 years, requiring nightly jobs and processing to keep all the data in sync and available. As more sophisticated functionality is not only requested, but often required by statutory changes, points of failure and technical constraints increase with data and applications residing on multiple technical platforms.

Three primary 'paths forward' were identified and evaluated back in 2013. These included: remain on multiple platforms; purchase a COTS system from a vendor to replace both mainframe and web inmate case management and accounting systems; or migrate the mainframe applications to the existing NiCaMS architecture.

The option to remain 'as-is' was discarded, for reasons articulated above as well as looming problems with the inherent structure of the existing mainframe system. An example of one of these issues is the current mainframe system uses an inmate ID structure with 'intelligence' in the numbering system, based on ranges of numbers. These ranges will begin to be exhausted and new ranges created in the near future. Overcoming technical some of these upcoming technical challenges will be far more costly and take longer on the mainframe platform.

So the decision remained between purchase from a vendor and in-house development. In 2014, when problems were found in the CTS mainframe system with inmate sentence calculation, immediate changes were needed. When the sentence calculation process was prioritized to be rewritten in early 2015, rewriting it on the mainframe – in COBOL/CICS on 'green screens' that were already over-crowded and unwieldy – the choice was made that doing so on the mainframe too costly and inflexible. Significant investment was made in migrating the sentence calculation process to NiCaMS and rewriting it based on an actual calendar calculation.

ORIGINAL FEEDBACK:

Review Scores = 12/20, 12/20, 10/20

Strengths: Quite likely a very good project, however

The proposer articulates both a clear need to update the existing environment and provides a possible alternative.

Weaknesses: Lack of details restricts the technical impact scoring.

(**Response** – additional technical detail added.)

Again, no understanding of the end goal and system to evaluate for value.

(**Response** – additional technical detail added.)

There is no evidence provided as to what alternatives have been investigated and what ability there is to execute the proposed project.

(**Response** – high-level information on the options evaluated and the decision made has been added to this section.)

PRELIMINARY PLAN FOR IMPLEMENTATION (10 PTS):

The implementation plan would start with the building of a project team, the project team would then determine which screens and processes could be migrated from the current mainframe system down to the NiCaMS application with the least negative impact of daily activities. These daily activities would be identified by the business users currently using the mainframe application.

Similar to the SCRP project, once the project is approved and a start date is determined, a project charter will be established. This document identifies the participants (including Project Management, Sponsors, Stakeholders and Subject Matter Experts), the high-level scope of work, project milestones, risks and critical success factors. As the project will be a joint effort between OCIO and NDCS, responsibilities for each group will be identified.

Once the charter is agreed upon, the technical architecture decisions need to be made. Some have already been made (when the first CTS modules were migrated down and the upgraded NiCaMS architecture put into place for the SCRP project); others will have to be evaluated once the project starts.

A high-level scope has been identified and that includes migration of the Inmate Admissions, Inmate Accounting and Inmate Movements to NiCaMS. The final decision on the order of the migration of these components will have to be determined by the technical team once the project is approved.

ORIGINAL FEEDBACK:

Review Scores = 5/10, 5/10, 5/10

Strengths: The articulated plan outlines a process of scoping the project based on stakeholder input.

Weaknesses: Implementation plan is vague and incomplete.

(Response – at this stage of the Software Development Lifecycle, there is no detailed implementation plan. The business case is first articulated, and then a charter is for the project is created. The project scope is defined at a high-level in that charter. We traditionally use the standard format/template from OCIO for all our project charters. Once the charter is accepted and signed off on by both OCIO (who will provide all the technical resources) and NDCS, the project team identified in the charter will begin to ‘drill down’ into ever increasing levels of detail.)

Proposal needs more work and detail to provide a complete review.

(Response – some detail added in this section and preceding sections. Also see response above.)

There is not adequate detail to determine what will be implemented, how it will be implemented or the project resources that will be committed.

(Response – at this juncture, what we do know is that the final application will reside on a web-based platform, use SQL Server for the database and be written in Java. It will include all CIT functionality and all remaining CTS functionality. The full project timeline is not yet known we anticipate at least 2 years. OCIO’s consolidated model will be used to provide all the technical resources for business analysis, development, alpha testing and project management; NDCS will commit resources for subject matter expertise as well as customer acceptance testing and training. A steering committee will be put in place with upper-level management from NDCS and other stakeholders as appropriate, which will meet on a regular schedule, yet to be determined. This is the same model used for the successful development and implementation of the SCRP project.)

RISK ASSESSMENT (10 PTS):

CIT being a mainframe system developed almost 20 years ago has made it difficult to make necessary changes. OCIO and NDCS have limited resources and support with become increasing difficult to obtain in the future. A failure of the current CIT system would have a devastating effect on the function for inmate accounting.

While the risks inherent in a project this size are sizable, they are outweighed by the risks of remaining on the current platforms, which have dwindling support from both the business expertise and technical expertise perspectives. The recently completed SCRIP project provides the architecture for the new system (the 'how'). Business and technical decisions made – and successfully implemented – are the foundation for this project, which substantially reduces the risk for this project. The 'roadmap' has been partially defined by the SCRIP project. The specific details and challenges for this project have yet to be identified. However, with each passing month, the risks continue to increase as many with business expertise in the current CIT and CTS systems will be retiring. There is no benefit to 'postponing' the project, only increased risk.

ORIGINAL FEEDBACK:

Review Scores = 7/10, 10/10, 5/10

Strengths: agree with the mainframe risk
 Risk is substantial.
 The need to update the existing system is clearly articulated.

Weaknesses: Proposal scoring is limited by lack of details.
 (**Response** – some detail added in this section and preceding sections.)
 The proposer provides very little information as to the "what" and the "how" of getting from the current situation to the desired outcome.
 (**Response** – while not a lot of detail is available at this point in the project definition, some detail has been added in this section and preceding sections.)

FINANCIAL ANALYSIS AND BUDGET (20 PTS):

The funding for this project will be revolving funds estimated at \$700,000 for FY 2018 and \$700,000 for FY 2019.

ORIGINAL FEEDBACK:

Review Scores = 13/20, 13/20, 10/20

Strengths: None identified

Weaknesses: Based on the available information it is impossible to determine what is being funded.
 (**Response** – this request would include the migration of the entire CIT system to NiCaMS, as well as migrating the remaining CTS functionality to NiCaMS.)

What the financials are based upon is not documented.

(Response – we used the size and estimated budget from the SCRP project as a starting point for this request. The CIT project is larger in scope and complexity and we anticipate will take longer. Those differences were factored into the request.)

Not enough info provided to support the overall project benefit.

(Response – significant additional detail has been added in the previous sections that should clarify the project benefit.)

47 - Nebraska Educational Telecommunications Commission

Proposal Name: KHNE TV Transmitter
NITC ID: 47-01



PROJECT DETAILS

Project Contact: Ling-Ling Sun
Agency: 47 - Nebraska Educational Telecommunications Commission
NITC Tier Alignment:

Agency Priority: 1

SUMMARY OF REQUEST

NET seeks funding to replace the television transmitter at KHNE (Hastings). The present transmitter is a 21-year old Inductive Output Tube (IOT) liquid cooled model that was modified for DTV transmission in 2003. IOT transmitters are no longer manufactured and the tubes are very difficult to acquire. The IOT at KHNE was last replaced in 2014 with a spare tube that was shipped from France. The new solid state transmitter will be a much more energy efficient solid state transmitter which will be upgradeable to the impending ATSC 3.0 broadcast standard. Delaying the replacement risks significant broadcast television service outages if repairs are required due to the scarcity of parts. Any outage would also effect satellite and central Nebraska cable subscribers.

FINANCIAL SUMMARY

	<u>Expenditures</u>		
	<u>Fiscal Year 2018</u>	<u>Fiscal Year 2019</u>	<u>Total</u>
Contractual Services:	\$0.00	\$0.00	\$0.00
Telecommunications:	\$0.00	\$0.00	\$0.00
Training:	\$0.00	\$0.00	\$0.00
Operating Costs:	\$0.00	\$0.00	\$0.00
Capital Expenditures:	\$365,000.00	\$0.00	\$365,000.00
Total Estimated Costs:	\$0.00	\$0.00	\$0.00

Comments:

	<u>Funding</u>		
	<u>Fiscal Year 2018</u>	<u>Fiscal Year 2019</u>	<u>Total</u>
General Fund:	\$365,000.00	\$0.00	\$365,000.00
Cash Fund:	\$0.00	\$0.00	\$0.00
Federal Fund:	\$0.00	\$0.00	\$0.00
Revolving Fund:	\$0.00	\$0.00	\$0.00
Other Fund:	\$0.00	\$0.00	\$0.00
Total Requested Funding:	\$365,000.00	\$0.00	\$365,000.00

Comments:

PROPOSAL SCORE

		<u>reviewer1</u>	<u>reviewer2</u>	<u>reviewer3</u>	<u>Average</u>
Average	Goals, Objectives and Projected Outcomes (15)	15	14	15	15
	Project Justification / Business Case (25)	25	24	25	25
	Technical Impact (20)	20	19	20	20
	Preliminary Plan for Implementation (10)	10	9	10	10
	Risk Assessment (10)	10	10	10	10
	Financial Analysis and Budget (20)	20	19	20	20
	Total Score	100	95	100	98

REVIEWER COMMENTS

Goals, Objectives and Projected Outcomes

Review Score = 15/15

Strengths:

Weaknesses:

Project Justification / Business Case

Review Score = 25/25

47 - Nebraska Educational Telecommunications Commission

Proposal Name: KHNE TV Transmitter

NITC ID: 47-01



Strengths:	
Weaknesses:	
Technical Impact	Review Score = 20/20
Strengths:	
Weaknesses:	
Preliminary Plan for Implementation	Review Score = 10/10
Strengths:	
Weaknesses:	
Risk Assessment	Review Score = 10/10
Strengths:	
Weaknesses:	
Financial Analysis and Budget	Review Score = 20/20
Strengths:	
Weaknesses:	
<hr/>	
Goals, Objectives and Projected Outcomes	Review Score = 14/15
Strengths:	
Weaknesses:	
Project Justification / Business Case	Review Score = 24/25
Strengths: Good justification to update obsolete hardware.	
Weaknesses:	
Technical Impact	Review Score = 19/20
Strengths:	
Weaknesses:	
Preliminary Plan for Implementation	Review Score = 9/10
Strengths:	
Weaknesses:	
Risk Assessment	Review Score = 10/10
Strengths:	
Weaknesses:	
Financial Analysis and Budget	Review Score = 19/20
Strengths:	
Weaknesses:	
<hr/>	
Goals, Objectives and Projected Outcomes	Review Score = 15/15
Strengths:	
Weaknesses:	
Project Justification / Business Case	Review Score = 25/25
Strengths:	
Weaknesses:	
Technical Impact	Review Score = 20/20
Strengths:	
Weaknesses:	
Preliminary Plan for Implementation	Review Score = 10/10
Strengths:	
Weaknesses:	
Risk Assessment	Review Score = 10/10
Strengths:	

47 - Nebraska Educational Telecommunications Commission

Proposal Name: KHNE TV Transmitter

NITC ID: 47-01



Weaknesses:

Financial Analysis and Budget

Review Score = 20/20

Strengths:

Weaknesses:

TECHNICAL PANEL COMMENTS

Is the project technically feasible? Yes

Is the proposed technology appropriate for the project? Yes

Can the technical elements be accomplished within the proposed timeframe and budget? Yes

Comments:

ADVISORY COUNCIL COMMENTS

Advisory Council Tier Recommendation: Tier 2

Comments:

NITC COMMENTS

AGENCY RESPONSE

47 - Nebraska Educational Telecommunications Commission

Proposal Name: Radio Transmission Replacement
NITC ID: 47-02



PROJECT DETAILS

Project Contact: Ling-Ling Sun
Agency: 47 - Nebraska Educational Telecommunications Commission
NITC Tier Alignment:

Agency Priority: 2

SUMMARY OF REQUEST

NET is requesting an appropriation to replace aging FM antenna and feed line at FM sites KUCV (Lincoln), KTNE (Alliance), KRNE (Merriman), and KXNE (Norfolk). The antennas and feed lines at KTNE and KXNE are 26 years old, KRNE's is 16 years old and KUCV's is 15 years old. Replacing this equipment and older components would be done to reduce rising maintenance costs and to eliminate downtime. Also, the NET FM system is the State of Nebraska's primary relay system for the Emergency Alert System. This is the final phase of updating the statewide NET Radio Network. Delaying the completion of this final phase any further would just continue to increase off-air, downtime at these sites and increase annual operating expenses for repairs, maintenance and supplies. The project would begin the summer of 2017 and proceed through the fall (weather and tower crews permitting) at KUCV and KTNE. Work on the KRNE and KXNE sites would begin summer of 2018 and run thru the fall of 2018. Delaying the work heightens the risk that tower crews will be difficult to schedule and may be more expensive due to anticipated demand related to spectrum repacking adjustments on television towers and a nationwide shortage of tower crews.

FINANCIAL SUMMARY

	<u>Expenditures</u>		
	<u>Fiscal Year 2018</u>	<u>Fiscal Year 2019</u>	<u>Total</u>
Contractual Services:	\$0.00	\$0.00	\$0.00
Telecommunications:	\$0.00	\$0.00	\$0.00
Training:	\$0.00	\$0.00	\$0.00
Operating Costs:	\$0.00	\$0.00	\$0.00
Capital Expenditures:	\$350,000.00	\$350,000.00	\$700,000.00
Total Estimated Costs:	\$350,000.00	\$350,000.00	\$700,000.00

Comments:

	<u>Funding</u>		
	<u>Fiscal Year 2018</u>	<u>Fiscal Year 2019</u>	<u>Total</u>
General Fund:	\$350,000.00	\$350,000.00	\$700,000.00
Cash Fund:	\$0.00	\$0.00	\$0.00
Federal Fund:	\$0.00	\$0.00	\$0.00
Revolving Fund:	\$0.00	\$0.00	\$0.00
Other Fund:	\$0.00	\$0.00	\$0.00
Total Requested Funding:	\$350,000.00	\$350,000.00	\$700,000.00

Comments:

PROPOSAL SCORE

		reviewer1	reviewer2	reviewer3	Average
Average	Goals, Objectives and Projected Outcomes (15)	15	15	15	15
	Project Justification / Business Case (25)	25	25	25	25
	Technical Impact (20)	20	20	20	20
	Preliminary Plan for Implementation (10)	10	10	10	10
	Risk Assessment (10)	10	9	10	10
	Financial Analysis and Budget (20)	20	20	20	20
	Total Score	100	99	100	100

REVIEWER COMMENTS

Goals, Objectives and Projected Outcomes

Review Score = 15/15

47 - Nebraska Educational Telecommunications Commission

Proposal Name: Radio Transmission Replacement

NITC ID: 47-02



Strengths:	
Weaknesses:	
Project Justification / Business Case	Review Score = 25/25
Strengths:	
Weaknesses:	
Technical Impact	Review Score = 20/20
Strengths:	
Weaknesses:	
Preliminary Plan for Implementation	Review Score = 10/10
Strengths:	
Weaknesses:	
Risk Assessment	Review Score = 10/10
Strengths:	
Weaknesses:	
Financial Analysis and Budget	Review Score = 20/20
Strengths:	
Weaknesses:	
<hr/>	
Goals, Objectives and Projected Outcomes	Review Score = 15/15
Strengths: Good justification.	
Weaknesses:	
Project Justification / Business Case	Review Score = 25/25
Strengths:	
Weaknesses:	
Technical Impact	Review Score = 20/20
Strengths:	
Weaknesses:	
Preliminary Plan for Implementation	Review Score = 10/10
Strengths:	
Weaknesses:	
Risk Assessment	Review Score = 9/10
Strengths:	
Weaknesses:	
Financial Analysis and Budget	Review Score = 20/20
Strengths:	
Weaknesses:	
<hr/>	
Goals, Objectives and Projected Outcomes	Review Score = 15/15
Strengths:	
Weaknesses:	
Project Justification / Business Case	Review Score = 25/25
Strengths:	
Weaknesses:	
Technical Impact	Review Score = 20/20
Strengths:	
Weaknesses:	
Preliminary Plan for Implementation	Review Score = 10/10
Strengths:	

47 - Nebraska Educational Telecommunications Commission

Proposal Name: Radio Transmission Replacement

NITC ID: 47-02



Weaknesses:

Risk Assessment

Review Score = 10/10

Strengths:

Weaknesses:

Financial Analysis and Budget

Review Score = 20/20

Strengths:

Weaknesses:

TECHNICAL PANEL COMMENTS

Is the project technically feasible? Yes

Is the proposed technology appropriate for the project? Yes

Can the technical elements be accomplished within the proposed timeframe and budget? Yes

Comments:

ADVISORY COUNCIL COMMENTS

Advisory Council Tier Recommendation: Tier 2

Comments:

NITC COMMENTS

AGENCY RESPONSE

54 State Historical Society

Proposal Name: Storage and Preservation of 12 TB Historical Data
NITC ID: 54-01



PROJECT DETAILS

Project Contact: Jay Shaeffer
Agency: 54 State Historical Society
NITC Tier Alignment:

Agency Priority: 1

SUMMARY OF REQUEST

Establishing a basic level of digital preservation functionality via cloud storage is the first step in addressing the two critical challenges NSHS faces: (1) preservation of and (2) access to an increasing volume of data (currently ~12 TB). Statute requires NSHS to collect and preserve government records, now mostly digital-born. NSHS must make historic resources accessible, increasingly online. Aging servers show data at risk. Cloud storage and access will cost ~\$90,000/year is not currently funded.

NSHS is challenged by existing ad hoc digital storage and management. Born digital materials are increasingly generated by staff and state agencies. Planning for the long-term preservation and access of digitized historic materials and digital born records is underway. Preservation of digital data is the first step in a larger strategic effort.

FINANCIAL SUMMARY

Expenditures

	<u>Fiscal Year 2018</u>	<u>Fiscal Year 2019</u>	<u>Total</u>
Contractual Services:	\$90,000.00	\$90,000.00	\$180,000.00
Telecommunications:	\$0.00	\$0.00	\$0.00
Training:	\$0.00	\$0.00	\$0.00
Operating Costs:	\$0.00	\$0.00	\$0.00
Capital Expenditures:	\$0.00	\$0.00	\$0.00
Total Estimated Costs:	\$90,000.00	\$90,000.00	\$180,000.00

Comments: An additional \$90,000 was requested in future fiscal years.

Funding

	<u>Fiscal Year 2018</u>	<u>Fiscal Year 2019</u>	<u>Total</u>
General Fund:	\$90,000.00	\$90,000.00	\$180,000.00
Cash Fund:	\$0.00	\$0.00	\$0.00
Federal Fund:	\$0.00	\$0.00	\$0.00
Revolving Fund:	\$0.00	\$0.00	\$0.00
Other Fund:	\$0.00	\$0.00	\$0.00
Total Requested Funding:	\$90,000.00	\$90,000.00	\$180,000.00

Comments: An additional \$90,000 was requested in future fiscal years.

PROPOSAL SCORE

		<u>reviewer1</u>	<u>reviewer2</u>	<u>reviewer3</u>	<u>Average</u>
Average	Goals, Objectives and Projected Outcomes (15)	13	13	12	13
	Project Justification / Business Case (25)	20	21	20	20
	Technical Impact (20)	16	16	16	16
	Preliminary Plan for Implementation (10)	7	8	8	8
	Risk Assessment (10)	8	8	8	8
	Financial Analysis and Budget (20)	20	18	18	19
	Total Score	84	84	82	83

REVIEWER COMMENTS

Goals, Objectives and Projected Outcomes

Review Score = 13/15

Strengths: Need is sufficiently defined.

Weaknesses:

54 State Historical Society

Proposal Name: Storage and Preservation of 12 TB Historical Data

NITC ID: 54-01



Project Justification / Business Case

Review Score = 20/25

Strengths: OCIO involvement strengthens project proposal.

Weaknesses:

Technical Impact

Review Score = 16/20

Strengths: This score is based on the request for redundant storage, not on the future development project that is mentioned.

Weaknesses:

Preliminary Plan for Implementation

Review Score = 7/10

Strengths:

Weaknesses: Unclear if limited IT resources at NSHS will be adequate to complete the project on time.

Risk Assessment

Review Score = 8/10

Strengths: Proposal addresses risks and agency has undertaken appropriate research and planning.

Weaknesses:

Financial Analysis and Budget

Review Score = 20/20

Strengths: Proposal is based on OCIO estimates.

Weaknesses:

Goals, Objectives and Projected Outcomes

Review Score = 13/15

Strengths: Effectively stated their need.

Weaknesses:

Project Justification / Business Case

Review Score = 21/25

Strengths: Definitely a need for replacement of aging hardware. NSHS will need to ensure their data has been classified appropriately prior to moving it to any Cloud solution.

Weaknesses:

Technical Impact

Review Score = 16/20

Strengths:

Weaknesses:

Preliminary Plan for Implementation

Review Score = 8/10

Strengths: Plan seems reasonable. It will be important to make sure data is correctly classified and NSHS has full knowledge of bandwidth requirements, retention policies and back out plans.

Weaknesses:

Risk Assessment

Review Score = 8/10

Strengths: Appears research has been done. Might be valuable to share that information with the OCIO as you work with them on this project.

Weaknesses:

Financial Analysis and Budget

Review Score = 18/20

Strengths: Appropriate OCIO rates have been used.

Weaknesses:

Goals, Objectives and Projected Outcomes

Review Score = 12/15

Strengths: The goal of cheaper storage can be achieved with this project.

Weaknesses: The longer term goal of retrieval of stored data could prove to be more challenging and costly than budget can support.

Project Justification / Business Case

Review Score = 20/25

Strengths:

Weaknesses: project only addresses the cost to store data, access to stored data could be more costly than anticipated.

Technical Impact

Review Score = 16/20

Strengths:

Weaknesses: Additional technical resources may be required to complete this project. Limited agency IT staff may not be sufficient.

54 State Historical Society

Proposal Name: Storage and Preservation of 12 TB Historical Data

NITC ID: 54-01



Preliminary Plan for Implementation

Review Score = 8/10

Strengths:

Weaknesses: data migration could be challenging and method of public access not well defined.

Risk Assessment

Review Score = 8/10

Strengths:

Weaknesses: scope and resources required may not be available or outside of currently budget request.

Financial Analysis and Budget

Review Score = 18/20

Strengths:

Weaknesses: cost analysis is based on storage cost only.

TECHNICAL PANEL COMMENTS

Is the project technically feasible? Yes

Is the proposed technology appropriate for the project? Yes

Can the technical elements be accomplished within the proposed timeframe and budget? Yes

Comments:

ADVISORY COUNCIL COMMENTS

Advisory Council Tier Recommendation: Tier 2

Comments:

NITC COMMENTS

AGENCY RESPONSE

65 - Administrative Services

Proposal Name: Enterprise Resource Management Consolidation
NITC ID: 65-01



PROJECT DETAILS

Project Contact: Byron Diamond
Agency: 65 - Administrative Services
NITC Tier Alignment:

Agency Priority: 1

SUMMARY OF REQUEST

Migrate five current disparate IT systems individually supporting human resource and benefit management, employee recruiting and development, payroll and financial functions, and budget planning to a cloud-based single enterprise platform. The migration will include implementation of two new modules: E-Procurement and Budget Planning. The end state would be the realization of operational, process, and expense synergies by moving to a single enterprise platform at the end of this migration.

Various options and alternatives were analysed to determine the best way to leverage technology to improve the business processes and reduce the overhead costs for the State of Nebraska's enterprise HRM/ERP system. The approach described herein allows us to meet our operational objectives of continuously improving efficiency and processes, reducing costs, and capitalizing on technology.

FINANCIAL SUMMARY

	<u>Expenditures</u>		
	<u>Fiscal Year 2018</u>	<u>Fiscal Year 2019</u>	<u>Total</u>
Contractual Services:	\$6,620,000.00	\$8,280,000.00	\$14,900,000.00
Telecommunications:	\$0.00	\$0.00	\$0.00
Training:	\$0.00	\$0.00	\$0.00
Operating Costs:	\$561,000.00	\$2,297,000.00	\$2,858,000.00
Capital Expenditures:	\$0.00	\$0.00	\$0.00
Total Estimated Costs:	\$7,181,000.00	\$10,577,000.00	\$17,758,000.00

Comments:

	<u>Funding</u>		
	<u>Fiscal Year 2018</u>	<u>Fiscal Year 2019</u>	<u>Total</u>
General Fund:	\$7,181,000.00	\$10,577,000.00	\$17,758,000.00
Cash Fund:	\$0.00	\$0.00	\$0.00
Federal Fund:	\$0.00	\$0.00	\$0.00
Revolving Fund:	\$0.00	\$0.00	\$0.00
Other Fund:	\$0.00	\$0.00	\$0.00
Total Requested Funding:	\$7,181,000.00	\$10,577,000.00	\$17,758,000.00

Comments:

PROPOSAL SCORE

		reviewer1	reviewer2	reviewer3	Average
Average	Goals, Objectives and Projected Outcomes (15)	14	15	12	14
	Project Justification / Business Case (25)	15	25	15	18
	Technical Impact (20)	5	15	10	10
	Preliminary Plan for Implementation (10)	5	7	5	6
	Risk Assessment (10)	5	2	5	4
	Financial Analysis and Budget (20)	8	18	12	13
	Total Score	52	82	59	64

REVIEWER COMMENTS

Goals, Objectives and Projected Outcomes

Review Score = 14/15

65 - Administrative Services

Proposal Name: Enterprise Resource Management Consolidation

NITC ID: 65-01



Strengths: The goals and objectives have been clearly stated. In reading the document it appears to me that DAS is looking for a (SaaS) software as a service solution cloud-based environment.

Weaknesses: I think it is important to recognize that a SaaS solution is different than other cloud models. With a SaaS solution the software keys are turned over to the selected vendor who runs all aspects of the software solution responsible for everything including application performance security upgrades access and the hardware platform. Lost will be the ability to customize software applications, which may or may not be a bad thing.

Project Justification / Business Case

Review Score = 15/25

Strengths: It is fairly clear, from reading the business case justification, that the current environment is untenable as evidenced by the challenges stated in the document.

Weaknesses: I'm not sure the risks associated with the change of this magnitude have been fully identified. I did not see anything related to a sound cloud exit strategy which I believe is very important. I'm also concerned with the integration that will be necessary with this project as it moves to a cloud environment. My assumption, after reading the document, that they want to move everything to the cloud but that will have to be done in some sort of a staged manner in my view.

Technical Impact

Review Score = 5/20

Strengths:

Weaknesses: It was not much of any technical impact described within the document. Clearly they are looking for a cloud-based ERP solution. My biggest concern is with the transition process that will take time, and will be rather complex. Another major concern is we are adding complexity to an already complex technology architecture, the potential of runaway cloud transition project cost, the risk of exposing sensitive data, the risk of service disruption and risk associated with choosing a cloud vendor. Possibly more detail in the proposal would help overcome some of my concerns

Preliminary Plan for Implementation

Review Score = 5/10

Strengths: Implementation will be conducted in two phases over a two-year period of time with everything online as of November 2019

Weaknesses: This is a very aggressive transition implementation. Did not see any discussion of staff being dedicated to this process only and nothing else. Did not see any discussion of how processes that operate one way with the current system may have to be transitioned to work in the cloud solution. Having implemented several previous ERP systems, it is safe to say nothing works quite the same in a new system as it used to.

Risk Assessment

Review Score = 5/10

Strengths:

Weaknesses: Other than a statement that both the legacy and new systems will run in tool during the migration and up to three months after migration, nothing else related to risk was mentioned.

Financial Analysis and Budget

Review Score = 8/20

Strengths: There was financial information provided

Weaknesses: While financial data was provided I did not see or have access to the subscription fee detail. I am assuming this is an RFP type of project and I am a bit concerned with the level of specificity when it comes to the subscription fees seems awfully specific.

Goals, Objectives and Projected Outcomes

Review Score = 15/15

Strengths: Detailed coverage of all expected goals, financial, user-related and technical.

Weaknesses:

Project Justification / Business Case

Review Score = 25/25

Strengths: Project justification documents cover significant tangible and intangible goals.

Weaknesses:

Technical Impact

Review Score = 15/20

Strengths: Strong description of current environment and on how the future state will be an improvement.

Weaknesses: Little commentary on migration from the current system to the future system. There is minimal description of any technical details of how the new system will integrate with remaining on-premise systems, such as Active Directory (for the Single sign-on objective), any timesheet utilities that may exist on a mobile platform and other data center-based databases or data warehouses, as well as any existing cloud infrastructure.

Preliminary Plan for Implementation

Review Score = 7/10

Strengths: The initial two phases described are a great start.

65 - Administrative Services

Proposal Name: Enterprise Resource Management Consolidation

NITC ID: 65-01



Weaknesses: Additional milestones, such as data conversion timelines, training schedules (both for technical admins and end users, possibly by module) would improve schedule accountability. Experience info about project stakeholders would also improve the score in this section.

Risk Assessment

Review Score = 2/10

Strengths: System concurrency is a critical way to mitigate risks for such a highly integrated migration.

Weaknesses: No discussion of any other possible risks: integration/migration, conversion, ability for vendor to integrate with any existing enterprise cloud assets, budget (especially the impact of a technically complex project and reliance on contractors to execute), schedule.

Financial Analysis and Budget

Review Score = 18/20

Strengths: Great detail of how the projects costs and savings will be derived, module by module and year by year.

Weaknesses: Minimal description of where projected costs come from, including contingency rate and details on customizations required once the project begins.

Goals, Objectives and Projected Outcomes

Review Score = 12/15

Strengths: The anticipated outcomes of greater system coherence, manageability, information security and data privacy are achievable goals with tremendous potential to improve operational effectiveness.

Weaknesses: The risk associated with a project of this magnitude is considerable and it is difficult to determine what specific alternative is being proposed.

Project Justification / Business Case

Review Score = 15/25

Strengths: The need to consolidate is clear in order to achieve the desired outcomes.

Weaknesses: Consolidation and cloud-delivered infrastructure, platform, software and data-recovery "as a service" has the potential to address many of the shortcomings associated with the current environment. That said, there is not sufficient information provided to determine the "what" and the "how" of what is being proposed. While the "why" is well articulated in the attachments, the aphorism "the devil is in the details" definitely applies and based on the proposal it is impossible to assess.

Technical Impact

Review Score = 10/20

Strengths: Simplifying the existing environment has significant technical benefits.

Weaknesses: Consolidation and cloud-delivered infrastructure, platform, software and data-recovery "as a service" has the potential to address many of the shortcomings associated with the current environment. That said, there is not sufficient information provided to determine the "what" and the "how" of what is being proposed. While the "why" is well articulated in the attachments, the aphorism "the devil is in the details" definitely applies and based on the proposal it is impossible to assess.

Preliminary Plan for Implementation

Review Score = 5/10

Strengths:

Weaknesses: The preliminary plan is not documented to any significant degree. This is an enormous undertaking deserving of greater specificity as to what is being proposed and how the implementation will be successfully conducted.

Risk Assessment

Review Score = 5/10

Strengths:

Weaknesses: The risks are not articulated and the mitigation strategy of running the systems in parallel is, in itself, a risk with respect to information security, data privacy and data integrity.

Financial Analysis and Budget

Review Score = 12/20

Strengths:

Weaknesses: Without considerably more detail it is impossible to evaluate the budget in the context of what is being proposed.

TECHNICAL PANEL COMMENTS

Is the project technically feasible? Yes

Is the proposed technology appropriate for the project? Unknown

Can the technical elements be accomplished within the proposed timeframe and budget? Unknown

Comments: Unknown until further information is available.

ADVISORY COUNCIL COMMENTS

65 - Administrative Services

Proposal Name: Enterprise Resource Management Consolidation

NITC ID: 65-01



Advisory Council Tier Recommendation: Tier 1

Comments:

NITC COMMENTS

AGENCY RESPONSE

November 15, 2016

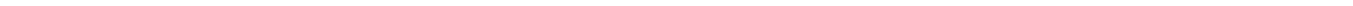
Progress Report to the Governor and Legislature



Nebraska Information
Technology Commission



State of Nebraska
Nebraska Information Technology Commission
nitc.nebraska.gov
501 S. 14th Street
P.O. Box 95045
Lincoln, NE 68509-5045
(402) 471-3560





Contents

NITC Commissioners and Staff	1
Executive Summary	2
Introduction	5
Realization of Vision and Employment of Strategies	5
• State Government IT Strategy	6
• Cloud Strategy	8
• State IT Spending Analysis	8
• IT Security	9
• Nebraska Spatial Data Infrastructure	10
• Network Nebraska	17
• Digital Education	18
• Community IT Development and Planning	20
• eHealth	23
Improved Coordination and Assistance to Policymakers	25
Policy and Funding Recommendations	26
Policies, Standards, Guidelines and Architectures	27
Information Technology Clearinghouse	28
Input and Involvement of Interested Parties	29
Infrastructure Innovation, Improvement, and Coordination	30
Awards and Recognition	31
Fun Facts	32
Advisory Group Members	33
Appendix: Policy Objectives and Review Criteria	35

NITC Commissioners

Ed Toner, Chief Information Officer, Office of the Chief Information Officer, State of Nebraska, Chair

Senator Curt Friesen, Nebraska Legislature (ex-officio)

Shane Greckel, Owner/Operator, Greckel Farms, LLC

Dr. Terry Haack, Superintendent, Bennington Public Schools

Dorest Harvey, USSTRATCOM/AFLCMC-HBCC

Randy Meininger, Mayor, City of Scottsbluff

Dan Shundoff, Chief Executive Officer, Intellicom

Daniel Spray, President, Precision Technology

Gary Warren, President of Services Corporation, Hamilton Telecommunications

Walter Weir, Chief Information Officer, University of Nebraska

Staff

Ed Toner, Chief Information Officer

Rick Becker, Government Information Technology Manager

Anne Byers, eHealth and Community Information Technology Manager

Tom Rolfes, Education Information Technology Manager

Jayne Scofield, IT Administrator, Network Services

Nathan Watermeier, GIS Technology Manager

Lori Lopez Urdiales, Office Services Manager

Executive Summary

The Legislature established the Nebraska Information Technology Commission (NITC) in 1998 to provide advice, strategic direction, and accountability on information technology investments in the state. This progress report highlights many of the significant accomplishments of the Commission and fulfills the requirement of Section 86-518 to submit a progress report to the Governor and Legislature by November 15 of each even-numbered year.

In particular, significant progress has been made on the following priority areas designated as strategic initiatives by the NITC.

- **State Government IT Strategy.** The objective of this initiative is to develop and implement a comprehensive strategy for the use of information technology by Nebraska state government. The strategy will utilize a hybrid centralization model combining elements of both the centralized and decentralized IT management models. Enterprise technologies will be centralized with agency-specific activities remaining with the agencies. Recent accomplishments include migration to a new help desk solution at the OCIO, implementing a phased migration to a consolidated domain, implementing a phased migration to a consolidated data center, and implementing an active/hot standby network.
 - **Cloud Strategy.** This initiative will develop a comprehensive strategy for the use of cloud-based services by Nebraska state government. Research shows that organizations with an enterprise-wide cloud strategy are far more successful at using the cloud to reduce costs, improve efficiency, and increase business agility.
 - **State IT Spending Analysis.** The objective of this initiative is to gain a better understanding of information technology spending by Nebraska state government. Recent accomplishments include creating new accounting codes to better capture IT-related spending and rolling those codes out to cabinet agencies.
 - **IT Security.** This initiative will define and clarify policies, standards and guidelines, and responsibilities related to the security of the State's information technology resources. Recent accomplishments include conducting a gap analysis on NITC standards and identifying items needing to be addressed to bring the standards up to NIST framework criteria, completing a Cyber Resilience Review (Security Assessment) performed by the Department of Homeland Security for six State of Nebraska Agencies, deploying Albert monitoring system from MS-ISAC to measure anomalies in netflow, completing an inventory of Personally Identifiable Information, and sponsoring the Annual Cyber Security Conference.
-

- **Nebraska Spatial Data Infrastructure.** This initiative promotes coordination of geospatial data and GIS programs, guides policy, provides guidance on data accuracy requirements, coordinates dissemination of data through NebraskaMAP, and strengthens data sharing through partnerships to ensure access to quality geospatial datasets for governmental business needs and the public. In 2016 the NITC GIS Council and the Office of the CIO launched the NebraskaMAP.gov website which serves as a gateway to Nebraska's geospatial data and information. The system integrates with the State's GIS Enterprise platform and has more than 150 data sets. The site had over 10,000 visitors in the first three weeks of its release. Partnerships and more than \$4 million dollars in contributions have been finalized to complete LiDAR elevation acquisition for the state to be completed in 2017.
 - **Digital Education.** The primary objective of the Digital Education Initiative is to promote the effective and efficient integration of technology into the instructional, learning, and administrative processes and to utilize technology to deliver enhanced digital educational opportunities to students at all levels throughout Nebraska on an equitable and affordable basis. In 2016, a University of Nebraska-Kearney agreement with a cloud videoconferencing vendor was scaled to serve over 15,000 K-20 licensees which yielded significant savings for those purchasers. The Education Council and the Community Council created a joint work group to research and recommend interventions to improve the equity of access for digital learners.
 - **Network Nebraska.** Participants in Network Nebraska are reducing costs and stimulating investment in Nebraska's telecommunications infrastructure. During the 2014-2016 time period, Network Nebraska grew its membership by 13 school districts, 1 Educational Service Unit, 33 nonpublic schools, 1 public library system, and 1 municipality. The demand for Internet has increased by 128% as the unit cost has decreased by 69% over this same period.
 - **Community IT Planning and Development.** The NITC Community Council continues to work with the University of Nebraska, Nebraska Public Service Commission, Nebraska Department of Economic Development, and AIM as part of the Nebraska Broadband Initiative to help communities understand the importance of broadband. Over the past two years, the initiative has developed a broadband planning workbook for communities, recognized outstanding broadband projects, and co-sponsored two broadband conferences. The Nebraska Public Service Commission updated the state broadband map in the spring of 2016, giving policymakers and consumers access to more current information on broadband availability. The NITC Community Council has also worked with the initiative to produce a bimonthly newsletter to highlight best practices and success stories.
 - **eHealth.** On July 27, 2015 the Nebraska Information Technology Commission/Office of the State CIO was awarded a two-year \$2.7 million cooperative agreement from the U.S. Department of Health and Human Services' Office of the National Coordinator for Health IT. The grant is supporting the adoption of health information exchange by Critical Access Hospitals, long-term care facilities, public
-

health and researchers. The grant is also supporting the implementation of additional functionalities through the Nebraska Health Information Initiative (NeHII).

Over the past two years, the NITC has also realized significant achievements in each of the seven criteria set forth in Section 86-524(2).

- The NITC's vision is being realized and short-term and long-term strategies have been articulated and employed. The NITC has developed a vision statement, goals, and strategic initiatives to articulate its vision and to highlight technology projects which have strategic importance to the State of Nebraska.
- The statewide technology plan prepared annually by the NITC has been an effective vehicle for identifying key projects, building stakeholder support, coordinating efforts, and communicating with policy makers.
- The NITC website serves as an information technology clearinghouse. In addition, the Community Council produces a newsletter to inform stakeholders of new research and developments. The Community Council is also using social media to share information about broadband development in Nebraska.
- In order to encourage interoperability and standardization, the NITC has adopted over 40 standards and guidelines. Within the past two years, six new or revised standards and guidelines have been adopted.
- Recommendations made by the commission to the Governor and Legislature have assisted policy and funding decisions. The review process and prioritization of new IT projects provides policy makers with information about the objectives, justification, technical impact, costs, and risks of proposed systems.
- The NITC encourages and facilitates input and involvement of all interested parties by engaging in collaborative processes, involving five advisory councils, the Technical Panel, and numerous workgroups and subcommittees. Additionally information is publicly distributed and public input is encouraged.
- The NITC is addressing long-term infrastructure innovation, improvement, and coordination through Network Nebraska and related initiatives.

Introduction

The Nebraska Information Technology Commission (NITC) was established by the Legislature in 1998 to provide advice, strategic direction, and accountability on information technology investments in the state. Chief Information Officer Ed Toner currently serves as the governor designated chair of the NITC. Commissioners are appointed by the Governor, approved by the Legislature, and represent elementary and secondary education, postsecondary education, communities, the Governor, and the general public.

The NITC conducts most of its work through six advisory groups: the Community Council, Education Council, eHealth Council, Geographic Information Systems Council, State Government Council, and Technical Panel. Each council establishes ad hoc work groups to prepare recommendations on specific topics. The Office of the Chief Information Officer provides support for the NITC, its councils, the Technical Panel, and ad hoc groups.

Section 86-518 directs the NITC to submit a progress report to the Governor and Legislature by November 15 of each even-numbered year. This report fulfills this requirement. Over the past two years, the NITC has realized many significant achievements in each of the seven criteria established by the Legislature in Section 86-524(2). This report details those achievements.

Realization of Vision and Employment of Strategies

The vision has been realized and short-term and long-term strategies have been articulated and employed.

The NITC has developed a vision statement, goals, and strategic initiatives to articulate its vision and to highlight technology projects which have strategic importance to the State of Nebraska. The NITC continues to make progress toward the realization of its vision. However, because technology constantly presents new challenges and opportunities, the NITC's vision will continually evolve.

Vision. The NITC vision statement is to “promote the use of information technology in education, health care, economic development, and all levels of government services to improve the quality of life of all Nebraskans.”

Goals. The NITC has established four goals:

1. Support the development of a robust statewide telecommunications infrastructure that is scalable, reliable, and efficient;
 2. Support the use of information technology to enhance community and economic development;
 3. Promote the use of information technology to improve the efficiency and delivery of governmental and educational services, including homeland security;
-

4. Promote effective planning, management and accountability regarding the state's investments in information technology.

Strategic Initiatives. In 2004 the NITC began identifying priority areas as strategic initiatives. Each strategic initiative includes measureable action items. The development of the action items has been a collaborative effort involving many individuals and entities. These efforts have been successful in gaining cooperation of many stakeholders. The strategic initiatives form the core of the NITC's annual Statewide Technology Plan (http://nitc.nebraska.gov/documents/statewide_technology_plan.pdf).

The current list of strategic initiatives includes:

- State Government IT Strategy
- Cloud Strategy
- State IT Spending Analysis
- IT Security
- Nebraska Spatial Data Infrastructure
- Network Nebraska
- Digital Education
- Community IT Planning and Development
- eHealth

The past two years have brought significant progress in each of the strategic initiatives. A summary of each strategic initiative follows.

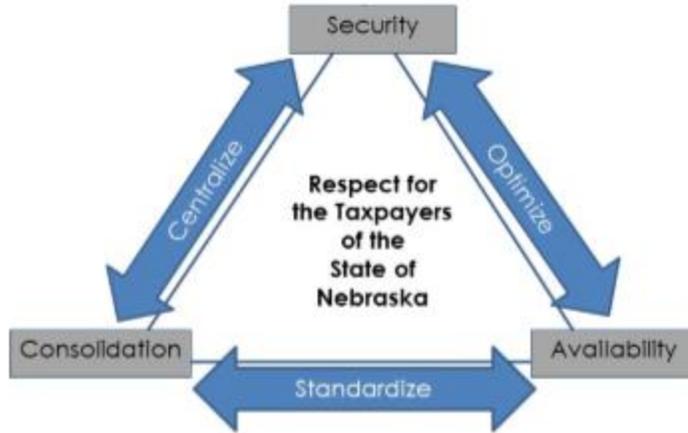
State Government IT Strategy

This initiative focuses on the development and implementation of a comprehensive strategy for the use of information technology by Nebraska state government. The strategy will utilize a hybrid centralization model combining elements of both the centralized and decentralized IT management models. Enterprise technologies will be centralized with agency-specific activities remaining with the agencies. Top priorities include:

- Security
- Consolidation
- Availability

The following graphic illustrates the priorities of the OCIO:

OCIO Top Priorities



Action items supporting this initiative include:

- Single help desk solution incident management implementation;
- Service catalog implementation;
- Change management solution implementation;
- Enhance information security;
- Enhanced operations center;
- IT cost efficiencies;
- Operationalize IT and project governance;
- Consolidate on STN domain;
- Data center consolidation—agency server migration; and
- Initiate active/hot standby solution—enterprise apps.

Recent accomplishments include:

- Migrated to a new help desk solution at the OCIO and began the migration of other agencies;
 - Implementing a phased migration to a consolidated domain;
 - Implementing a phased migration to a consolidated data center; and
 - Implementing an active / hot standby network.
-

Cloud Strategy

Research shows that organizations with an enterprise-wide cloud strategy are far more successful at using the cloud to reduce costs, improve efficiency, and increase business agility. There are three categories of cloud services: private cloud, public cloud, and hybrid cloud. Descriptions of these services follow:

- **Private Cloud** (The OCIO provides private cloud services.) A private cloud can be built and managed by either internal IT or an external service provider, typically on-premise inside the organization's firewall. IT services are offered to the organization's internal customers via chargeback capabilities. These services are critical to the core business functions and contain highly confidential and sensitive information.
- **Public Cloud.** Best suited for applications that tend to have low strategic value and high operational flexibility requirements such as archive storage.
- **Hybrid Cloud** (A viable option especially for SAAS [Software as a Service] and currently in use.) Best suited for applications that have low strategic value with workloads that are unpredictable and require flexibility and scalability for spikes in demand.

This initiative will focus on researching and developing a comprehensive strategy for use of cloud-based services by Nebraska state government. Topics for consideration include:

- Examine the potential benefits of moving services to the cloud;
- Determine infrastructure needed to implement the strategy;
- Identify security, legal and other restrictions;
- Research best practices for use of the cloud by governmental agencies;
- Identify the appropriate uses for of the various types of cloud services -- public cloud, private cloud, and hybrid cloud;
- Develop a framework for categorizing functions/applications based on appropriateness for using cloud services;
- Examine dimensions such as strategic value and operational flexibility for categorization of functions/applications;
- Identify and prioritize initial projects; and
- Identify metrics for measuring successful implementation of the strategy.

State IT Spending Analysis

This initiative is focusing on researching and preparing an analysis of information

technology spending by Nebraska state government. Action items for this initiative include:

- Creating new accounting codes to better capture IT-related spending;
- Developing reporting tools using the new accounting codes; and
- Preparing an analysis of information technology spending by Nebraska state government.

This initiative will support the following objectives of the OCIO:

- Institute a central governance model for technology purchases and roadmap;
- Identify and consolidate and/or eliminate disparate technology including hardware and software within and across State agencies to include enterprise software agreements;
- Standardize personal workstation platforms reducing complexity, cost per unit and cost of end user management;
- Consolidate and optimize IT infrastructure support staff where appropriate. Services requiring agency-specific competencies will remain at the agency;
- Define model and process for governance and standardization around shared services and shared infrastructure.

Recent accomplishments include creating new accounting codes to better capture IT related spending and rolling those codes out to cabinet agencies.

IT Security

This initiative focuses on defining and clarify policies, standards and guidelines, and responsibilities related to the security of the State's information technology resources, including:

- Reviewing security settings on State hardware and software;
 - Reviewing security requirements for IT purchases;
 - Conducting security awareness training and education;
 - Conducting security assessments and risk assessments on data and facilities;
 - Conducting vulnerability management scanning;
 - Conducting application vulnerability scanning;
 - Complying with Federal regulations for PCI, HIPAA, IRS, CJIS, SSA; Following the NIST Framework;
 - Implementing a statewide reporting mechanism for security related events;
-

- Implementing a statewide Security Operations Center in cooperation with the University of Nebraska System;
- Implementing a statewide Computer Emergency Response Team (CERT).

Recent Accomplishments:

- Gap analysis performed on NITC standards identifying items needing to be addressed to bring the standards up to NIST framework criteria.
- Cyber Resilience Review (Security Assessment) performed by the Department of Homeland Security for six State of Nebraska Agencies.
- Deployed Albert monitoring system from MS-ISAC to measure anomalies in netflow.
- Completed inventory of Personally Identifiable Information.
- 10th Annual Cyber Security Conference was held.

**Nebraska Spatial Data Infrastructure**

Mapping and geospatial data support the economy, safety, environment and overall quality of life for Nebraskans. More than \$35 million has been invested to date in core framework data throughout local, state and federal stakeholders. Coordination and management of these activities are essential to reduce duplication of efforts and provide cost savings to our taxpayers.

The GIS Council develops strategies, standards and policies as it relates to the creation and use of geospatial data and geographic information system technologies for Nebraska. The council's interagency and intergovernmental coordination efforts focus on facilitating data sharing, coordinating joint database development, developing GIS enterprise services, data and system standards, and education. The council represents interests among state, local and federal government agencies and other stakeholders needing access to data. The council is affiliated with national coordination efforts through the Federal Geographic Data Committee and the National States Geographic Information Council.

GIS Council Mission

Encourage the appropriate utilization of GIS technology and to assist organizations to make public investments in GIS technology and geospatial data in an effective, efficient, and coordinated manner.

Nebraska Revised Statute - §86-569 through §86-573

“Geospatial technologies incorporate geographic information systems (GIS), global positioning systems (GPS), remote sensing such as imagery and Light Detection and Ranging (LiDAR), and other geographic data and information systems. GIS is a tool to capture, store, manipulate, analyze, manage, and present all types of geographic data.”

This initiative promotes coordination, guides policy, provides guidance on Nebraska Spatial Data Infrastructure (NESDI) data accuracy requirements, and strengthens data sharing through partnerships to ensure access to quality geospatial datasets for governmental business needs and the public.

The objective of the NESDI is:

“To develop and foster an environment and infrastructure that optimizes the efficient use of geospatial technology, data, and services to address a wide variety of business and governmental challenges within the state. Geospatial technologies and data will be delivered in a way that supports policy and decision making at all levels of government to enhance the economy, safety, environment and quality of life for Nebraskans.”

The major components of this initiative include:

1. Facilitating the creation, maintenance, analysis and publishing of quality NESDI data and information systems.
2. Encouraging data sharing and provide widespread access to data and services through NebraskaMAP.gov.
3. Developing and implementing NESDI layer standards and guidelines.
4. Facilitating technical assistance and education outreach opportunities for furthering the adoption of the NESDI and geospatial applications.
5. Achieving sustainable and efficient allocation of resources to support the implementation and wise governance of GIS services and geospatial data.

NESDI Data Layers for Nebraska

- Survey and Geodetic control
- Transportation (roads, rail, air, etc.)
- Cadastre/parcels
- Elevation
- Aerial imagery
- Hydrography
- Political and administrative boundaries
- Addresses
- Soils
- Groundwater features
- Watershed boundaries
- Land use/land cover

NESDI Framework Layer Assessment. The NESDI comprises of geospatial data layers that have multiple applications and are used by a vast majority of stakeholders. They are consistent with the Federal National Spatial Data Infrastructure (NSDI) “7 framework layers” and provide additional layers of particular importance to Nebraska stakeholders. The current priority layers for the state include imagery, elevation, street centerlines, address points, and land records.

The Nebraska Boundary Assessment Project started in 2016. This effort evaluates all political and administrative boundaries in relation to the NESDI framework layers. Many boundaries are derived from other datasets such as survey and geodetic control, imagery, street centerlines, parcels, and other authoritative data layers such as municipalities, counties, and state boundaries.

The results of this project will assist in developing best practices and minimum set of standards to be used towards standardization of data schemas, statewide data aggregation, and develop agreements to be used for geometric placement of boundaries to support Enhanced/Next Generation 9-1-1, U.S. Census 2020 Boundary Validation Program and other uses.

Metadata standards (NITC 3-201 Geospatial Metadata) have been developed specific to the needs of Nebraska stakeholders while maintaining compliance with the metadata standards from the Federal Geographic Data Committee (FGDC).

The following are other accomplishments for the priority data layers.

Survey and Geodetic Control. Survey and geodetic control need to be taken into consideration for good quality data to exist in the future for several of the NESDI framework layers—particularly if multiple data sets are used in combinations for

analysis and decision making. Some of the State's current data sets were created for specific purposes with given budgets. As the use of geospatial data has grown, there are now other needs for the data. Some of these additional uses require a greater level of spatial accuracy.

Recommendations are being implemented including the need for control in standards and data acquisition plans. Survey and geodetic control recommendations have been identified and are included into recent NITC standards for elevation, imagery, street centerline, and address points.

A low-distortion projection (LDP) project has begun under the direction of the State Surveyor's office with assistance with other registered land surveyors of Nebraska. The LDP will create the best ground to grid solution with control established using recognized local control. This will eventually lead to a better source data for all GIS horizontal calculations that improves all of our spatial data sets. Survey and geodetic control recommendations have been identified and included into ongoing data collection projects.

Elevation (LiDAR). This action item establishes the Nebraska Statewide Elevation Program. It is led by the Elevation Working Group which facilitates the acquisition, maintenance, and sharing of a statewide elevation dataset by developing standards and specifications for LiDAR point clouds and derivative products. It further develops alternatives for systematic and cost-effective acquisition of these products and defines a program of stewardship for managing and publishing the data.

The Elevation Business Plan was approved by the GIS Council on March 26, 2015. The plan outlines the business case for LiDAR statewide. The plan takes a comprehensive approach and details the organizational needs, technology and human resource requirements, required product deliverables, funding requirements, legislative support, implementation plans, and a marketing and outreach strategy.

Light Detection and Ranging

LiDAR is a technology that is used in conjunction with GPS technology, an aerial collection platform, and a processing computer to collect data points that can be used to define the location of objects that reflect near infrared light, including the land surface, structures and vegetation.

Progress has been made in acquiring LiDAR data for priority areas of Nebraska. The working group was successful in receiving two cost-share contracts with the United States Geological Survey (USGS) to begin acquiring LiDAR data in western and eastern Nebraska. The western state project finished data acquisition in April 2016. The eastern urban-area project is still being planned for flight acquisition.

A plan is in place to complete LiDAR acquisition for the remaining part of the state. This coincides with additional flight acquisition project areas being planned by the USDA Natural Resources Conservation Service (NRCS). Since 2008, the group, its members, and partner agencies have worked to collect LiDAR data over more than 75% of

Nebraska's land area. The remaining area is predominantly the Sandhills region consisting of 18K square miles. The NRCS is providing the majority of the assistance to the final coverage area. Other partners involved in this project include the Natural Resource Districts (NRD), Department of Natural Resources, Nebraska Department of Roads, Department of Environmental Quality, Federal Emergency Management Agency (FEMA), and USGS.

More than \$4 million in seed funding has been identified from federal, state and local partners in order to start the final project in 2017. Once complete, the remaining project area is expected to have a benefit to cost ratio of five to one, with a project value of \$23 million to taxpayers in Nebraska.

Imagery. This action item establishes the Nebraska Statewide Imagery Program which sets out to coordinate the acquisition, delivery, and data sharing of imagery products and services. All government entities can participate with the program.

The core product is a statewide aerial ortho-image that meets the minimum horizontal accuracy requirements and a spatial resolution of 12 inch or better, preferably flown during the "leaf-off" period for trees. Obliques and other value-added products and services will also be included in the program. The requirements from federal standards (i.e., National Emergency Number Association) are also driving the need for greater spatial accuracy of imagery in order to meet needs to develop and create street centerline and address points for Enhanced/Next Generation 9-1-1.

The business plan is in its final draft and will begin implementation in 2017. Data requirements and program needs were identified the past year through a Request for Information (RFI) to obtain information on advancements in technology and related costs for data acquisition and services. A webinar on remote sensing was hosted by the UNL School of Natural Resources in June 2016. This webinar was used to help gauge stakeholder input on questions and additional needs of the program. The Imagery Working Group has identified a need for preserving historical aerial photographs. The needs assessment and additional stakeholder input are included in the business plan.

Land Records. This action item enables the integration of different local government land records information into a statewide dataset.

A Nebraska Statewide Parcel Geodatabase Development and Implementation Plan was finalized in 2015 with input from several county assessors. The plan outlines expectations of the State's public records request and a timeline going forward to obtain core parcel data and GIS files on an annual basis. The state has developed statewide data aggregation workflows, a data schema/model, and appropriate map services to extend data for business operations. All counties that have digitized parcel data have been collected and aggregated into the statewide database for 2015. This effort has also leveraged a data sharing partnership effort by working together and identifying state level data that can also go back to counties to support their needs.

Currently 95.8% of all parcels in Nebraska are digitized in some form. The Nebraska State Records Board has provided more than \$924,485 in grant assistance to digitize and create geodatabases utilizing the data. In 2013, five counties were awarded State Records Board grants totaling \$117,065 for digitizing land parcel information. This leaves five counties remaining to obtain digitized land records for the database.

Street Centerline Address Database. This action item is designed to develop and maintain a statewide seamless street centerline and address referencing system used for various transportation, emergency management, public safety (i.e., NG9-1-1), economic development and other related applications.

Efforts started in 2015 to communicate the recent street centerline and address standards to those involved with public safety and emergency management. The standards were presented to the State Enhanced 9-1-1 Advisory Board to address questions and to begin to develop partnerships to further build recommendations to transition to Next Generation 9-1-1. A Statewide Street Centerline and Address Data model with data definitions have been developed. This will be used to further communicate to participants who use state funds for projects developing street centerline and address data for the state in order to begin standardizing efforts going forward.

A business planning effort started in 2016 to begin defining data stewardship roles and responsibilities, data processing and workflows, costs, and plans with current E-911 and future NG9-1-1 coordination efforts. A review of federal requirements and national efforts has been completed and will be included in the business plan.

The Statewide Nebraska Street Centerline Database (NSCD) and Nebraska Address Database (NAD) have been developed with coordination between the Nebraska Department of Roads and the Office of the CIO. Both databases have relationships in attribution and geometric placement. The Department of Roads finished a federal street centerline project with US Federal Highway Administration and is beginning to incorporate the geometric framework to improve the existing street centerline data for the state. The NAD is currently being implemented at the Office of the CIO with available address data in the state.

Until seamless address data becomes available to the state, several state agencies have partnered towards a shared service for a statewide enterprise license agreement to acquire statewide address and demographic data for the state. It is available to any state agency, city/local government, other state eligible political subdivision, college, or university (except University of Nebraska Medical Center). The state has leveraged the data to be made available in several formats and map services. This data will also assist the development of addressing points to be used in combination with the street centerline database.

NebraskaMAP. NebraskaMAP (<http://www.NebraskaMAP.gov>) is the online gateway to get access to Nebraska's authoritative geospatial data. The



NebraskaMAP metadata clearinghouse was replaced in 2016 with a new and improved platform to deliver data and information on various platforms. The system integrates with the State's GIS Enterprise platform and has more than 150 data sets. The site had over 10,000 visitors in the first three weeks of its release.

All state agencies that use geospatial data are working together to reduce duplicated datasets and streamline the data sharing process. This also involves accessing data in a sole location for the most current information. The new system formalizes communication with all statewide data stewards to keep data current while exercising the importance of authoritative and quality data for public consumption. The following are recent updates to this initiative:

- Metadata is required for data sets to be included through NebraskaMAP. New modifications to the existing Metadata Standards (NITC 3-201) have been adopted by the NITC in 2016. The new changes provide clearer definitions on minimum and complete metadata categories for use with creating and maintaining geospatial data sets.
- A data content and management policy has been approved through the GIS Council to outline expectations for open geospatial data to be made available through NebraskaMAP. This policy serves as instructions on what kind of data is acceptable and the necessary requirements when submitting data.
- A new NebraskaMAP Data Subcommittee has been formed to peer-review data requests. A workflow is in place to accept requests, review metadata, and publish data to the clearinghouse.
- A data management system has been developed and is tied to metadata standards using the ISO 19115 categories. This allows for content to be found by searching standardized tags and types of content. It also provides a mechanism to feed our holdings into the national clearinghouses such as GISInventory.net and data.gov
- The new web site incorporates search capabilities, featured datasets, news feeds for new data submissions and other news. The site also extends data through a map gallery on various applications and ISO topics.

The next phase of the project is to partner with other data stewards who share public data through local and county governments and other political subdivisions. The website will eventually include a component to provide an easier way to view and access available imagery, LiDAR and other raster and large file size datasets for Nebraska.

Network Nebraska

Participants in Network Nebraska are reducing costs and stimulating investment in Nebraska's telecommunications infrastructure. Network Nebraska is represented as a compilation of three major sub-networks: The University of Nebraska Computing Services Network, State and County Government Network, and the K-20 Education Network. Each network has its own management staff, but takes advantage of co-location facilities, Internet and telecommunications contracts, and shared infrastructure wherever possible.

In order to develop a broadband, scalable telecommunications infrastructure that optimizes quality of service to public entities, the State of Nebraska and the University of Nebraska began aggregating their backbone network services into a core network backbone in 2003. In 2006, the Nebraska Legislature passed LB 1208 which named the statewide network as Network Nebraska, and tasked the Chief Information Officer (assisted by the University of Nebraska) with "providing access to all education entities as soon as feasible, but no later than July 1, 2012." Network Nebraska is also expected to "meet the demand of state agencies and local governments...Such network shall provide access to a reliable and affordable infrastructure capable of carrying a spectrum of services and applications, including distance education, across the state."

Network Nebraska has succeeded in lowering the unit cost of Internet service to participating entities through aggregated purchasing power. By combining Network Nebraska's K-20 Internet purchases into two state contracts of over 30Gbps, the K-12 E-rate-eligible price has gone from \$2.55/Mbps/month on July 1, 2014 down to \$.77/Mbps/month on July 1, 2016, a 69% decrease in unit cost. This will benefit all current and new Network Nebraska schools, ESUs and colleges that purchase their Internet service from the statewide master contract.

Benefits of Network Nebraska also include flexible bandwidth utilization, Intranet routing, lower network costs, greater efficiency, interoperability of systems providing video courses and conferencing, increased collaboration among educational entities, new student learning opportunities, enterprise network management software, and better use of public investments.

Network Nebraska has also stimulated investments in telecommunications infrastructure. As the State bid connectivity to large regional areas of schools and colleges, the telecommunications companies responded with new network technologies such as metropolitan optical Ethernet, multi-protocol label switching (MPLS), and Ethernet "clouds" which have provided benefits for other nonpublic entities.

The development of the K-20 education network has increased the number of distance education courses available to Nebraska students. Through interactive videoconferencing, Nebraska high schools and community colleges exchange over 450

courses per year (2016-17). World languages, mathematics, social sciences, and business courses continue to be popular offerings leveraged by rural students.

Due to advances in WAN Ethernet technology, Network Nebraska-Education is now able to reach every education entity in the State through five core aggregation points: Grand Island, Lincoln, Scottsbluff, and two locations in Omaha.

The development of the K-20 education sub-network has increased the number of customers served by Network Nebraska. Data and Internet customers currently include the three state colleges, all six community colleges, the University of Nebraska system, half of the private colleges, and 245 school districts under 17 different educational service units. The number of K-12 educational entities increased as the remaining K-12 districts in suburban Omaha elected to participate in 2015. The Nebraska K-20 Education sub-network is completely funded by Participation and Interregional Transport Fees from its 291 members.

Network Nebraska has been made possible through a cooperative effort of the Collaborative Aggregation Partnership (CAP). CAP is composed of several operational entities: Office of the CIO, University of Nebraska, and Nebraska Educational Telecommunications with policy assistance from the Nebraska Department of Education, Public Service Commission, and the NITC.

In 2009, the NITC Education Council chartered the Network Nebraska Advisory Group (NNAG). These 16 members, representing all of the major K-12 and higher education communities, have been instrumental in helping guide OCIO decisions concerning network infrastructure, services, and fees.

Network Nebraska is not a state-owned network. Facilities and circuits are leased from private telecommunications providers in the state, allowing the State of Nebraska and members of Network Nebraska to act as anchor tenants.

Digital Education

The primary objective of the Digital Education Initiative is to promote the effective and efficient integration of technology into the instructional, learning, and administrative processes and to utilize technology to deliver enhanced digital educational opportunities to students at all levels throughout Nebraska on an equitable and affordable basis.

The initiative is dependent upon adequate Internet connectivity and transport bandwidth for learners, instructors, administrators, and for educational attendance sites. A minimum acceptable level of classroom technology will have to be established for the initiative to be successful.

The primary components of the Digital Education Initiative include:

- A statewide telecommunications network with ample bandwidth capable of transporting voice, video, and data between and among all education entities (See Network Nebraska.);
- Distance insensitive Internet pricing for all Nebraska education entities;
- Development of a statewide eLearning environment so that every teacher and every learner has access to a web-based, digital curriculum;
- Development of a statewide digital resource library so that any teacher or learner will be able to retrieve digital media for use in instructional and student projects;
- Synchronous videoconferencing interconnections between all schools and colleges;
- The means to coordinate and facilitate essential education opportunities for all students through a statewide student information system; and
- Regional Pre-K-20 education cooperatives that vertically articulate educational programs and opportunities.

Establishing a Digital Education environment is critical to Nebraska's future. Internet has gone from a "nice to have" educational application of the 1990's to the "must have" mission critical application of the 2010's. So much of what teachers, students, and administrators do today is dependent upon Internet-based information and communication. Nebraska has continued to make progress in the ratio of students per high speed, Internet-connected computers in the classroom. However, it still makes it challenging for students to complete their digital assignments when they are expected to share two or three students to a computer, or to wait their turn to be able to use a computer. Educators and administrators are urged to work to achieve the goal of attaining 1:1 computer (or Internet-connected device) availability.

The benefits of the Digital Education Initiative would include:

- Greater technical capacity for schools and colleges to meet the increasing demands of a more diverse customer base;
 - More equitable and affordable Internet access for Nebraska schools and colleges;
 - A comprehensive web-based approach to curriculum mapping and the organization and automation of student assessment data gathering and depiction;
 - The availability of rich, digital media to the desktop that is indexed to Nebraska standards, catalogued, and searchable by the educator or student;
 - A more systematic approach to synchronous video distance learning that enables Nebraska schools and colleges to exchange more courses, staff development and training, and ad hoc learning opportunities.
-

Network Nebraska will be undergoing a significant backbone upgrade that will begin in July 2017. By moving to a higher bandwidth, flexible IP network, participating education entities will be able to:

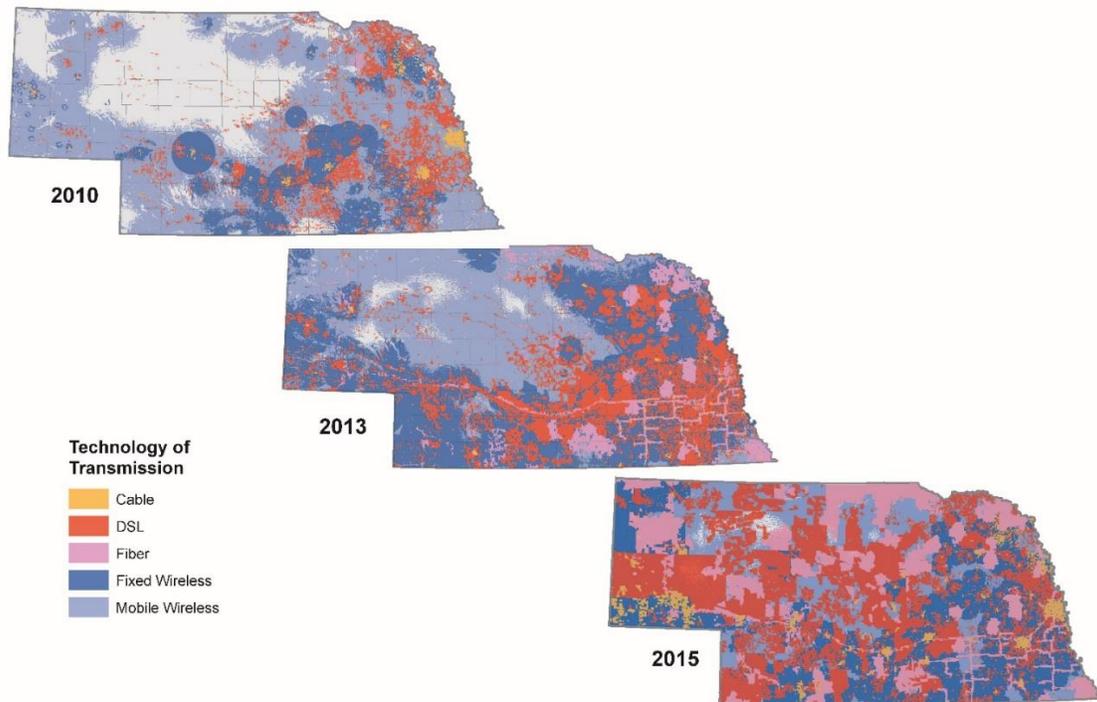
- Have more bandwidth for local and regional transport to accommodate present and future education technology applications;
- Take advantage of nationwide Internet2 routing and resources;
- Purchase some of the lowest Internet access pricing in the country;
- Participate in a statewide, standards-based IP videoconferencing system between all schools and colleges;
- Post their course offerings and unfilled curriculum needs to a statewide clearinghouse and scheduling system for all synchronous and asynchronous distance learning;
- Position themselves to develop new and exciting regional and statewide applications of digital content to serve all students and teachers.

The furthering of the Digital Education initiative and completion of the Digital Education action items requires the participation of many education-related entities. The Educational Service Unit Coordinating Council (ESUCC) and the Nebraska Department of Education (NDE) are cooperating on a comprehensive instructional improvement plan that includes a 2017-2019 biennial budget request.

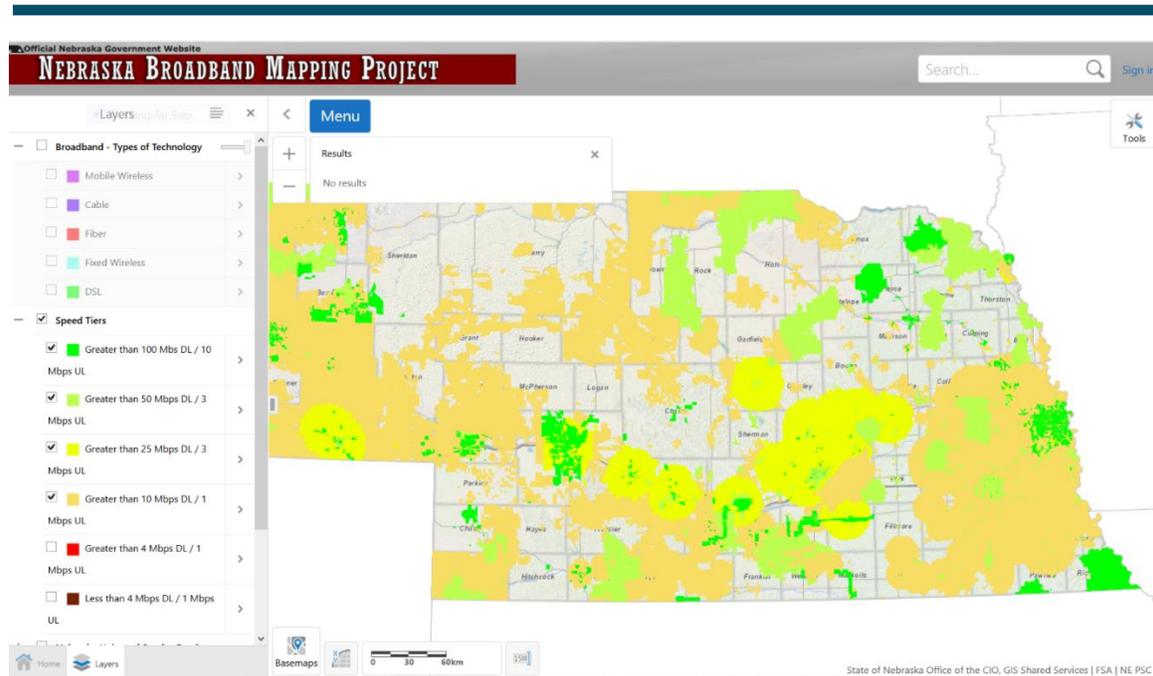
Community IT Planning and Development

The NITC Community Council continues to work with the University of Nebraska, Nebraska Public Service Commission, Nebraska Department of Economic Development, and AIM as part of the Nebraska Broadband Initiative to help communities better understand the importance of broadband. Over the past two years, the initiative has developed a broadband planning workbook for communities, recognized outstanding broadband initiatives, and co-sponsored two broadband conferences. The Nebraska Public Service Commission updated the state broadband map (broadbandmap.nebraska.gov) in the spring of 2016, providing valuable information for consumers and policymakers. The NITC Community Council has also worked with the initiative to produce a bimonthly newsletter to highlight best practices and success stories.

Broadband Availability. Broadband provides high-speed access to applications such as the Internet. Broadband availability in Nebraska continues to improve. The following map from the Nebraska Public Service Commission's broadband map (broadbandmap.nebraska.gov) shows improvements in broadband coverage from 2010 to late 2015.



Some areas of the state remain under or unserved, however. The FCC estimated that 16% of Nebraska's population lacks access to broadband of 25 Mbps or greater down and 3 Mbps or greater up as of December, 2014. Those living in rural areas outside are more likely to be under or unserved. The FCC estimated that 51% of Nebraska's rural population lacked access to broadband of 25 Mbps or greater down and 3 Mbps or greater up as of December, 2014. The map below shows areas in which broadband of 25 Mbps or greater down is available as of December, 2015. Additional information on broadband availability in Nebraska can be found at broadbandmap.nebraska.gov.



Mobile connections are becoming increasingly important to residents and businesses. Although mobile broadband data coverage is improving in Nebraska, mobile coverage in some areas of rural Nebraska is still a challenge. Mobile coverage limitations in rural areas of Nebraska may impact the adoption and utilization of some precision agriculture technologies which rely on mobile broadband services.

Broadband Adoption. Most households in Nebraska have broadband service. In 2014, 82% of Nebraskans subscribed to internet service at home. However, there were significant rural-urban differences with subscription rates of 90% in Lincoln and 87% in Omaha, compared to 72% to 77% in other regions of the state.¹ More recent data on rural Nebraskans indicates that rural subscribership in Nebraska has increased to 82%.²

¹ Vogt, R., Byers, A., Hancock, C., Narjes, C., & Terry, R. (April 2014). Internet connectivity and use in Nebraska: A follow up study. Retrieved from <http://broadband.nebraska.gov>

² Vogt, R.,Burkhart-Kreisel, Cantrell, R., Lubeen, B., & McElravy, L. (2016). Broadband and Mobile Internet Services in Nonmetropolitan Nebraska: 2016 Rural Poll Results. Retrieved from <http://ruralpoll.unl.edu/pdf/16broadband.pdf>

eHealth

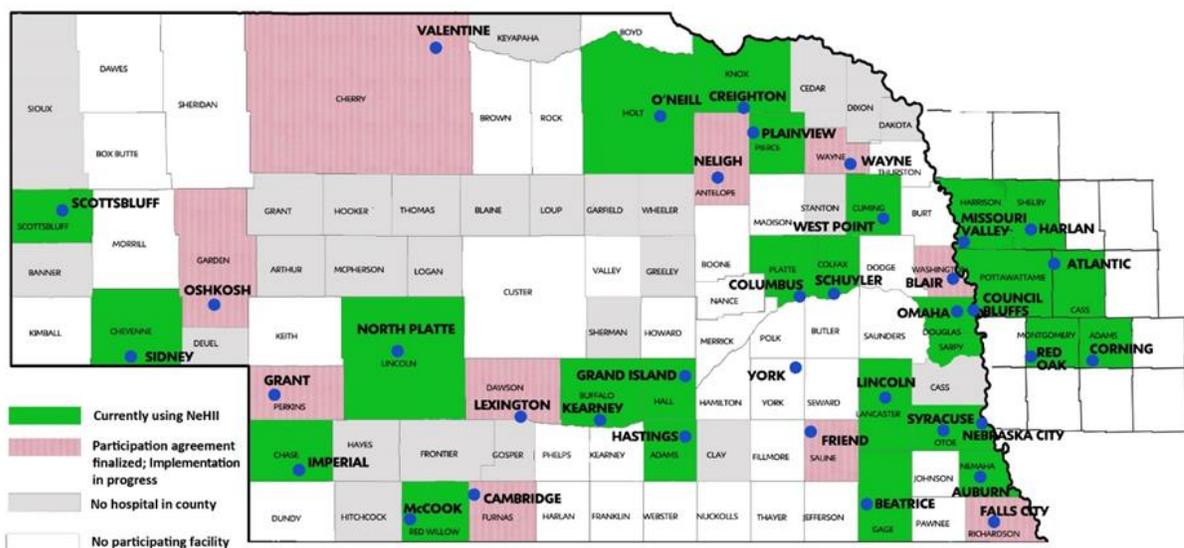
The NITC eHealth Council has worked to support the adoption and utilization of health information exchange in Nebraska. In July 2015, the Nebraska Information Technology Commission/Office of the State CIO was awarded a two-year \$2.7 million cooperative agreement from the U.S. Department of Health and Human Services' Office of the National Coordinator for Health IT. The grant is supporting the adoption of health information exchange by Critical Access Hospitals, long-term care facilities, public health and researchers. As of September 30, 2016, the following have been implemented with grant funds:

- Three facilities have been implanted to share data with NeHII and three more are in progress.
- One hospital is sending data to the State's syndromic surveillance system through NeHII
- 11 long-term care facilities are using Direct secure messaging to send and receive patient information.

In order to facilitate the use of health information, grant team members from UNMC are working with health care providers in two Nebraska communities to identify use cases, implement appropriate technologies, and integrate new technologies into the provider workflow. Training modules are being developed to share lessons learned from the project.

The grant is also supporting the implementation of additional functionalities through the Nebraska Health Information Initiative (NeHII), including population health analytics.

The map below shows participating hospitals in NeHII:



The following table shows the growth of health information exchange through NeHII since 2010.

Health Information Exchange Metrics

NeHII	March 2010	March 2014	Sept. 30, 2016
Number of Clients			
• Number of Clients in the Master Patient Index	1,544,570	2,703,439	3,292,492
• Total Patients That Have Opted Out	27,032	69,020	76,420
• Total Patients Opting Back In	2,092	4,372	5,253
Provider Information			
• Total Number of Users	464	3,590	7,136
Hospital Information			
• Number of Nebraska Hospitals Participating	8	22	32
• % of Nebraska Hospitals Participating	8%	23%	31%
• Percent of Nebraska Hospital Beds Covered	36%	52%	64%
Public Health Information			
• State Public Health Systems Connected to NeHII	0	1 ³	1
• Local Health Departments Participating in NeHII	0	2	2
Payers			
• Number of Payers Participating	1	2	2
Total Number of Results Sent to Exchange			
• LAB	6,633,699	38,411,495	65,222,917
• RAD	1,838,874	7,399,077	11,713,759
• Transcription	947,739	16,623,562	55,106,378

³ In 2011, NeHI implemented the immunization gateway.

Improved Coordination and Assistance to Policymakers

The statewide technology plan and other activities of the commission have improved coordination and assisted policymakers.

The statewide technology plan annually prepared by the NITC has been an effective vehicle for identifying key projects, building stakeholder support, coordinating efforts, and communicating with policy makers.

The current plan was approved in 2015 with minor updates made in 2016. The plan focuses on nine strategic initiatives:

- State Government IT Strategy
- Cloud Strategy
- State IT Spending Analysis
- IT Security
- Nebraska Spatial Data Infrastructure
- Network Nebraska
- Digital Education
- Community IT Planning and Development
- eHealth

These initiatives were identified by the NITC and its advisory groups. These groups include representatives of a wide array of entities, including health care providers, education, local government, the private sector, and state agencies. This process has proven to be effective in building stakeholder support. These initiatives are collaborative projects involving many entities both inside and outside of state government. The statewide technology plan provides a method of communicating the importance of these initiatives, progress made, and plans for further implementation. The plan is submitted to the Legislature and the Governor. The primary role of the NITC in these initiatives has been facilitation and coordination. The success of these initiatives testifies to the NITC's effectiveness at facilitation, coordination, and communication with policymakers.

Chief Information Officer Ed Toner has met with senators at their request and has testified at hearings and given briefings to legislative committees five times over the past two years.

The Chief Information Officer and the staff or advisory groups of the NITC are occasionally called upon to provide analysis or review of technology initiatives, explanation of state-specific information technology data, and other requests as needed by the Governor and Legislature.

Policy and Funding Recommendations

Recommendations made by the commission to the Governor and Legislature have assisted policy and funding decisions.

Section 86-516 (8) directs the NITC to “make recommendations on technology investments to the Governor and the Legislature, including a prioritized list of projects, reviewed by the technical panel,” as part of the biennial budget process. Prior to budget submissions, agencies submit IT plans which are reviewed by the Office of the CIO and the NITC Technical Panel. This information provides a context in which to better review IT projects submitted by agencies. Technical reviews of information technology projects are conducted by a team of reviewers. With input from the NITC State Government and Education Councils, the Technical Panel further reviews the project proposals. Using information from the review process, the NITC makes funding recommendations to the Governor and the Legislature by November 15 of each even-numbered year. The review process and prioritization of new IT projects provides policy makers with information about the objectives, justification, technical impact, costs, and risks of proposed systems. The agency comprehensive information technology plans and the project proposal forms for budget requests of new IT spending provide policy makers with far more information in a more consistent format than before. The Technical Panel also conducts voluntary review of IT projects and projects awarded funding through the NITC Community Technology Fund and Government Technology Fund.

In 2016, nine IT budget requests for new projects were reviewed. Recommendations on these requests were submitted to the Governor and the Legislature.

Policies, Standards, Guidelines, and Architectures

Policies, standards, guidelines, and architectures have been developed and observed.

In order to encourage interoperability and standardization, over 40 standards and guidelines have been adopted. The development of standards and guidelines has helped the State of Nebraska achieve greater interoperability and efficiency. The process encourages public input from all involved constituents. Most standards are developed by a work group consisting of stakeholders from state government agencies and other interested entities. The Technical Panel recommends approval of standards and guidelines to the NITC. All standards are approved at open NITC meetings after a 30-day comment period.

A full listing of the NITC Standards and Guidelines are listed at this website:

<http://www.nitc.ne.gov/standards/index.html>

Information Technology Clearinghouse

An information technology clearinghouse has been established, maintained, and utilized of Nebraska's information technology infrastructure and of activities taking place in the state involving information technology, and the information flow between and among individuals and organizations has been facilitated as a result of the information technology clearinghouse.

The NITC's website (www.nitc.nebraska.gov) serves as an information technology clearinghouse, providing access to information including resources for communities, health care providers, and educational entities, the GIS community, and state government. The NITC website is the official repository for agenda, minutes, and documents for the NITC, its councils and their workgroups. The section on "Standards and Guidelines" provides access to all technical standards and guidelines adopted by the NITC or under development. The Community Council also publishes an electronic newsletter which is available from the NITC website and uses social media to share information on broadband development. Network Nebraska has its own project website, with information designed for current and prospective participants (<http://www.networknebraska.net>). The NITC website also includes a link to NebraskaMAP (<http://www.NebraskaMAP.gov>) which provides public access to geospatial data in Nebraska. Additionally, NITC staff members handle requests for information on technology projects and development and facilitate the exchange of information.

Input and Involvement of Interested Parties

Input and involvement of all interested parties has been encouraged and facilitated.

The NITC engages in collaborative processes, involving five advisory councils, the Technical Panel, and numerous workgroups and subcommittees. Additionally information is publicly distributed and public input is encouraged through the NITC's website and through e-mail distribution. NITC staff also present information on NITC initiatives at conferences, workshops, and meetings across the state. The list of NITC Commissioners, council members, and Technical Panel members is included in this document.

Active work groups and subcommittees over the past two years include:

- State Government Council—Open Data Work Group
- State Government Council—Security Architecture Work Group
- State Government Council—Webmasters Work Group
- State Government Council—Cloud Standard Work Group
- Technical Panel—Accessibility of Information Technology Work Group
- Technical Panel—Learning Management System Standards Work Group
- Technical Panel—Intergovernmental Data Communications Work Group
- GIS Council—Street Centerline-Address Database Work Group
- GIS Council—Imagery Work Group
- GIS Council—Land Records Work Group
- GIS Council—Elevation Work Group
- GIS Council—Geospatial Data Sharing and Web Services Work Group
- GIS Council—Strategic Planning Work Group
- Education Council—Network Nebraska Work Group
- Education Council—Digital Education Work Group
- Education Council—Network Nebraska Advisory Group

Infrastructure Innovation, Improvement and Coordination

Long-term infrastructure innovation, improvement, and coordination has been planned for, facilitated, and achieved with minimal barriers and impediments.

The NITC is addressing long-term infrastructure innovation, improvement, and coordination through Network Nebraska and related initiatives.

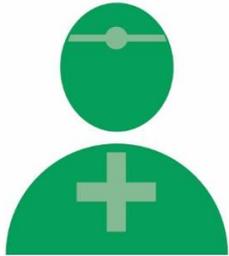
Network Nebraska has aggregated statewide telecommunications to a common infrastructure, generated considerable cost savings to public entities, and decreased the unit cost of Internet service by leveraging the consolidated demand of all participating entities. Since September 2003, Network Nebraska has grown to serve the data and Internet service needs of all state agencies with outstate circuits, the University of Nebraska's four campuses, all six of the state's community colleges, all three state colleges, and all of the 245 school districts under 17 different educational service units. The number of customers is expected to continue growing due to the favorable Internet rates and the high quality of service offered by Network Nebraska. The Network Nebraska K-20 sub-network is one possible alternative for them to interconnect with each other and purchase less expensive Internet.

Network Nebraska has been made possible through a cooperative effort of the State of Nebraska Office of the CIO, University of Nebraska, and Nebraska Educational Telecommunications, with policy assistance from the Nebraska Department of Education, Public Service Commission, and the NITC. This partnership is known as the Collaborative Aggregation Partnership (CAP).

The first phase of the multipurpose statewide backbone became operational in September 2003, serving Omaha, Lincoln, and Grand Island with the second phase following in February 2004, extending service to Norfolk, Kearney, North Platte, and the Panhandle. In July 2008, the Network Nebraska K-20 backbone interconnected Grand Island, Lincoln, and Omaha, and Scottsbluff was added in 2012. The Office of the CIO and the University of Nebraska each have statewide Internet contracts for Network Nebraska that have dramatically reduced the unit cost of Internet access to Network Nebraska participants. By leveraging Internet2 and InterExchange peering relationships, an additional 40 Gbps of Internet egress has been made available at substantially lower costs than commodity Internet.

Network Nebraska is not a state-owned network. Facilities are leased from private telecommunications providers in the state. In this way, the state hopes to stimulate private investment into Nebraska's telecommunications infrastructure.

Awards and Recognition



The NITC received a \$2.7 million cooperative agreement from the U.S. Department of Health and Human Services, Office of the National Coordinator for Health IT to advance health information exchange in Nebraska in July 2015.



The State of Nebraska's Web portal, Nebraska.gov, was awarded the Center for Digital Government's "Best of the Web" awards for 2016.



Nebraska received a grade of "B" in the Center for Digital Government's Digital States Survey in 2016.



Network Nebraska-Education was recognized in December 2015 as one of the "Bright Ideas" of the Innovations in Government Program, by the Ash Center for Democratic Governance and Innovation, Harvard University-Kennedy School of Government.

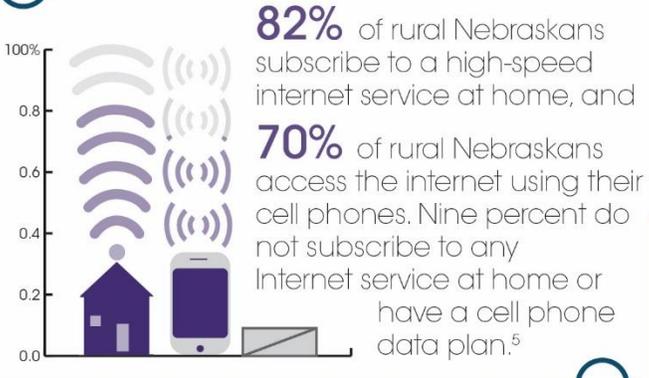
12 Fun Facts about the NITC

6 advisory groups have assisted the NITC. (Community Council, Education Council, eHealth Council, GIS Council, State Government Council, and Technical Panel)



Over **40** standards and guidelines have been adopted by the NITC.

84% of Nebraskans have access to broadband services of at least 25 Mbps down and 3 Mbps down as of December 2014.⁴



Surescripts ranked Nebraska #2 in e-prescribing controlled substances for 2015.

Nearly 3.3 million patients from Nebraska and neighboring states have information in NeHII's master patient index.



Over 7,000 physicians and health care providers are participating in NeHII. NeHII now covers 62% of the state's hospital beds.

The proportional **reduction** of the unit **price** of Internet since the State and University began cooperatively bidding the State's Internet (2007-2016) is **99%**



291 education entities are currently served by Network Nebraska. Network Nebraska-Education daily serves over 425,000 students and staff with Internet and distance learning courses.



The proportional **increase** in length and **bandwidth capacity** of the statewide education backbone, from 2012-2016 is **300%**

Nebraska K-12 entities pay \$.2432/Mbps/month for Internet access after E-rate discounts are applied.

⁴ Data from the FCC's 2016 Broadband Progress Report available at https://apps.fcc.gov/edocs_public/attachmatch/FCC-16-6A1.pdf
⁵ Vogt, R.,Burkhart-Kreisel, Cantrell, R., Lubeen, B., & McElravy, L. (2016). Broadband and Mobile Internet Services in Nonmetropolitan Nebraska: 2016 Rural Poll Results. Retrieved from <http://ruralpoll.unl.edu/pdf/16broadband.pdf>

Advisory Group Members

Technical Panel	Community Council	Education Council
<p>Walter Weir, Chair, University of Nebraska Computer Services Network</p> <p>Michael Winkle, Nebraska Educational Telecommunications</p> <p>Ed Toner, Office of the CIO</p> <p>Christy Horn, University of Nebraska Central Administration</p> <p>Kirk Langer, Lincoln Public Schools</p>	<p>Rod Armstrong, Co-Chair, AIM, Lincoln</p> <p>Phil Green, Co-Chair, City of Blair</p> <p>Pam Adams, American Broadband</p> <p>Chris Anderson, City of Central City</p> <p>Jay Anderson, NebraskaLink</p> <p>Brett Baker</p> <p>Randy Bretz, TEDxLincoln Curator</p> <p>Jessica Chamberlain, Norfolk Public Library</p> <p>Shonna Dorsey, Interface</p> <p>Steve Fosselman, Grand Island Public Library</p> <p>Connie Hancock, University of Nebraska-Lincoln Extension</p> <p>Steve Henderson, City of Lincoln</p> <p>Jacob Knutson, Department of Economic Development</p> <p>David Lofdahl, IT Consultant</p> <p>Monica Lueking-Crowe, Furnas Harlan Partnership</p> <p>Marion McDermott, Kearney Area Chamber of Commerce</p> <p>Megan McGown, City of Sidney</p> <p>Joan Modrell, Department of Labor</p> <p>Jerry Vap, Nebraska Public Service Commission</p> <p>Holly Woldt, Nebraska Library Commission</p>	<p>Mark Askren, University of Nebraska-Lincoln</p> <p>Dr. Mike Baumgartner, Coordinating Commission for Postsecondary Education</p> <p>Derek Bierman, Northeast Community College</p> <p>Burke Brown, District OR-1 Palmyra/Bennet</p> <p>Mike Carpenter, Doane University</p> <p>Matt Chrisman, Mitchell Public Schools</p> <p>Dr. Ted DeTurk, ESU 2-Fremont</p> <p>John Dunning, Wayne State College</p> <p>Brent Gaswick, Nebraska Department of Education</p> <p>Stephen Hamersky, Daniel J. Gross Catholic High School</p> <p>Dr. Dan Hoelsing, Schuyler Community Schools</p> <p>Steve Hotovy, Nebraska State College System</p> <p>Dr. Mike Lucas, York Public Schools</p> <p>Greg Maschman, Nebraska Wesleyan University</p> <p>Gary Needham, ESU 9-Hastings</p> <p>Mary Niemiec, University of Nebraska</p> <p>Alan Moore, ESU 3-LaVista</p> <p>Tom Peters, Central Community College</p> <p>Gary Targoff, Nebraska Educational Telecommunications Commission</p> <p>Ed Toner, Office of the CIO, Nebraska Department of Administrative Services</p>

eHealth Council	GIS Council	State Government Council
<p>Dr. Delane Wycoff, Co-Chair, Pathology Services, PC</p> <p>Marsha Morien, Co-Chair, UNMC College of Public Health</p> <p>Kevin Borcher, NeHII</p> <p>Kevin Conway, Nebraska Hospital Association and NeHII</p> <p>Kathy Cook, Lincoln-Lancaster County Public Health Department</p> <p>Joel Dougherty, OneWorld Community Health Centers</p> <p>Marty Fattig, Nemaha County Hospital</p> <p>Kimberly Galt, Creighton University School of Pharmacy and Health Professions</p> <p>Cindy Kadavy, Nebraska Health Care Association</p> <p>Rama Kolli, Blue Cross Blue Shield of Nebraska</p> <p>Dr. James McClay, Nebraska Medicine</p> <p>Dr. Shawn Murdock, Midlands Family Medicine, North Platte</p> <p>Dave Palm, University of Nebraska Medical Center</p> <p>Jenifer Roberts-Johnson, Nebraska Department of Health and Human Services, Division of Public Health</p> <p>June Ryan, Retired</p> <p>Todd Searls, Wide River</p> <p>Brian Sterud, Faith Regional Health System</p> <p>Robin Szwaneck, AARP</p> <p>Max Thacker, UNMC</p> <p>Anna Turman, Chadron Community Hospital</p> <p>Linda Wittmuss, Nebraska Department of Health and Human Services, Division of Behavioral Health</p> <p>Bridget Young, Visiting Nurse Association</p>	<p>Timothy Cielocha, Chair, Nebraska Public Power District</p> <p>Jon Kraai, Vice-Chair, Nebraska State Patrol</p> <p>Josh Lear, Department of Natural Resources</p> <p>Bill Wehling, Department of Roads</p> <p>Chad Boshart, Nebraska Emergency Management Agency</p> <p>Karis Bowen, Department of Health and Human Services</p> <p>Lash Chaffin, League of Nebraska Municipalities</p> <p>Erin Northwall, Governor's Policy Research Office</p> <p>Steve Cobb, State Surveyor</p> <p>Nancy Cyr, Clerk of the Legislature</p> <p>Eric Herbert, Sarpy County GIS</p> <p>Les Howard, Conservation and Survey Division – UNL</p> <p>Kim Wessels, Harlan County Assessor's Office</p> <p>Cullen Robbins, Public Service Commission</p> <p>James Langtry, US Geological Survey</p> <p>Pat Larson, Grand Island Public Schools</p> <p>Jeff McReynolds, City of Lincoln, Lancaster County</p> <p>Chuck Wingert, Nemaha Natural Resources District</p> <p>James W. Ohmberger, Office of the CIO</p> <p>Sudhir Ponnappan, Nebraska Game and Parks Commission</p> <p>Mike Preston, Nebraska Geospatial Professional Association</p> <p>Mike Schonlau, Omaha/Douglas County</p> <p>Ruth Sorensen, Department of Revenue</p> <p>Gary Morrison, Department of Environmental Quality</p> <p>Todd Whitfield, Lamp, Ryneason and Associates</p> <p>Todd Wiltgen, Lancaster County Commissioners</p>	<p>Ed Toner, Chair, Office of the CIO</p> <p>John Albin, Department of Labor</p> <p>Dennis Burling, Department of Environmental Quality</p> <p>Mike Calvert, Legislative Fiscal Office</p> <p>Byron Diamond, Department of Administrative Services</p> <p>Darrell Fisher, Crime Commission</p> <p>John Gale, Secretary of State of Nebraska</p> <p>Brent Gaswick, Department of Education</p> <p>Rex Gittins, Department of Natural Resources</p> <p>Dorest Harvey, Private Sector</p> <p>Chris Hill, Department of Health and Human Services</p> <p>Rhonda Lahm, Department of Motor Vehicles</p> <p>Kelly Lammers, Department of Banking and Finance</p> <p>Jim Ohmberger, Office of the CIO, Enterprise Computing Services</p> <p>Gerry Oligmueller, DAS—Budget Division</p> <p>Bradley Rice, Nebraska State Patrol</p> <p>Jayne Scofield, Office of the CIO, Network Services</p> <p>Len Sloup, Department of Revenue</p> <p>Robin Spindler, Department of Correctional Services</p> <p>Corey Steel, Supreme Court</p> <p>Rod Wagner, Library Commission</p> <p>Tamra Walz, Workers' Compensation Court</p> <p>Bill Wehling, Department of Roads Governor's Policy Research Office</p>

Appendix

Policy Objectives and Review Criteria

Section 86-518 directs the NITC to submit a progress report to the Governor and Legislature by November 15 of each even-numbered year. This report is offered in fulfillment of that requirement.

Section 86-524 further directs the Appropriations Committee and Transportation and Telecommunications Committee to conduct a joint review of the activities of the NITC by the end of the calendar year of every even-numbered year. Section 86-524 also provides three objectives and a list of criteria for evaluating progress. This report is intended to provide information to assist the Legislature in conducting its review.

Policy Objectives

Section 86-524 states: "It shall be the policy of the state to:

1. Use information technology in education, communities, including health care and economic development, and every level of government service to improve economic opportunities and quality of life for all Nebraskans regardless of location or income;
2. Stimulate the demand to encourage and enable long-term infrastructure innovation and improvement; and
3. Organize technology planning in new ways to aggregate demand, reduce costs, and create support networks; encourage collaboration between communities of interest; and encourage competition among technology and service providers."

Review Criteria

Section 86-524 states: "In the review, the committees shall determine the extent to which:

1. The vision has been realized and short-term and long-term strategies have been articulated and employed;
 2. The statewide technology plan and other activities of the commission have improved coordination and assisted policymakers;
 3. An information technology clearinghouse has been established, maintained, and utilized of Nebraska's information technology infrastructure and of activities taking place in the state involving information technology, and the information flow between and among individuals and organizations has been facilitated as a result of the information technology clearinghouse;
-

4. Policies, standards, guidelines, and architectures have been developed and observed;
5. Recommendations made by the commission to the Governor and Legislature have assisted policy and funding decisions;
6. Input and involvement of all interested parties has been encouraged and facilitated; and
7. Long-term infrastructure innovation, improvement, and coordination has been planned for, facilitated, and achieved with minimal barriers and impediments.”

Attachment 6-a

Oct. 31, 2016

To: NITC Commissioners
From: Anne Byers
Subject: Community Council Report

Broadband USA Webinar. Network Nebraska and NeHII were featured on a Broadband USA webinar on Sept. 21. Anne Byers shared information on how Network Nebraska and NeHII have successfully leveraged partnerships.

Equitable Access to Broadband Services. The Community and Education Council are jointly addressing equitable access to broadband services—especially for students and their families. The Community Council discussed programs to address this issue and potential technologies at their meeting on Sept. 19, 2016:

- Tom Rolfes gave an overview of TV White Space and how it could potentially be used to provide access for students.
- Jessica Chamberlain, director of the Norfolk Public Library, shared information on the library's WiFi hotspot lending program.
- Additionally, the Nebraska Public Service Commission approved three broadband adoption grants totaling up to \$366,218 in September and August.
 - **Allo and Lincoln Public Schools (LPS)** will assist low-income, high-need families in their efforts to obtain affordable access to broadband services in their homes, which will further allow LPS students to increase their educational and employment opportunities.
 - **Arlington Telephone Company, Blair Telephone Company, Eastern Nebraska Telephone Company, Rock County Telephone Company, HunTel CableVision, Consolidated Telephone Company, Consolidated Telco, Inc., Consolidated Telecom, Inc., The Curtis Telephone Company, Hamilton Telecommunications, Nebraska Central Telephone Company, Northeast Nebraska Telephone Company and Three River Telco** received Nebraska Universal Service Fund support for a broadband adoption grant up to \$102,000. The joint applicants in partnership with local schools, senior centers, libraries, and community centers and Consortia Consulting propose to provide in-depth digital literacy training at locations within the joint applicants' service areas.
 - **Cox**, in partnership with **Omaha Public Schools (OPS)**, received up to \$114,218 in support to bring broadband service to low-income students and families in Omaha by modifying a bus to create a Wi-Fi enabled vehicle offering free broadband connectivity and devices to neighborhoods in north Omaha.

IT Degree Completions in Nebraska

The need for more IT workers is an issue for many employers in Nebraska. Recent figures on IT degree completions from the National Center for Education indicate the number of IT degree completions is increasing. Between 2011 and 2015 the total number of IT graduates increased 18%.

IT Degree Completions in Nebraska				
	<i>Female</i>	<i>Male</i>	TOTAL	Fem %
2011	168	715	883	19.02
2012	178	759	937	18.99
2013	187	821	1008	18.55
2014	212	894	1106	19.17
2015	214	828	1042	20.54

Compiled by the Nebraska Department of Economic Development from data from the National Center for Education Statistics

Digital Divide Report. Roberto Gallardo from the Intelligent Community Institute at Mississippi State University has developed a county-level digital divide index (DDI) to rank and identify counties where the digital divide is highest. The results, using 2014 data, are presented in the *2014 Digital Divide Index*.

The DDI ranges in value from 0 to 100, where 100 indicates the highest digital divide. The first DDI component measures infrastructure/adoption and includes percent population without access to fixed broadband at 25 Mbps upload and 3 Mbps download, the number of residential fixed broadband connections at a minimum download of 3 Mbps and upload of 768 Kbps, and average advertised download/upload fixed broadband speeds. The second DDI component measures socioeconomic (SE) characteristics that affect technology adoption, including percent population age 65 and over, percent population 25 and over with less than high school, and individual poverty rate. This component identifies counties at *higher risk* of lagging in technology adoption.

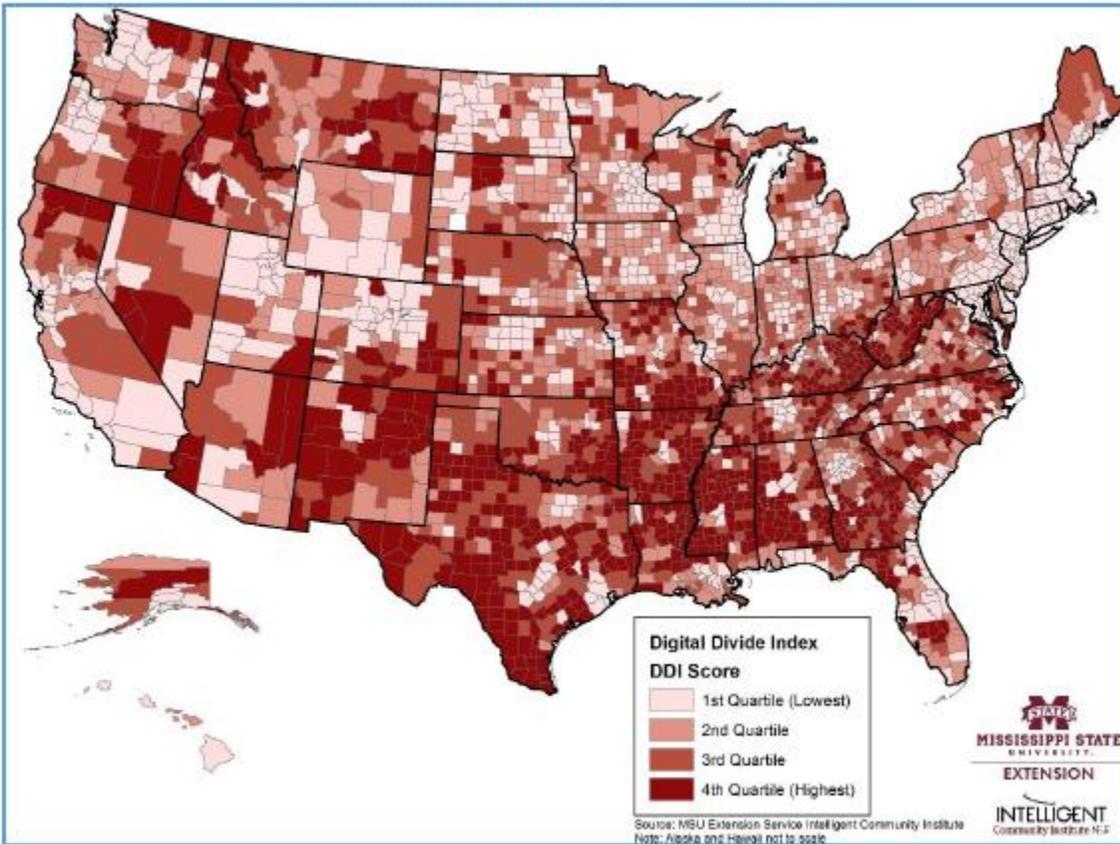
In general, metropolitan counties scored better (lowest) than very rural, sparsely populated counties. The following ten counties in Nebraska had the lowest (or best) scores:

FIPS	NAME	STATE	OMB	SE	INFA	DDI
31153	Sarpy	Nebraska	Metropolitan	4.72	30.85	4.23
31055	Douglas	Nebraska	Metropolitan	23.65	35.54	19.94
31109	Lancaster	Nebraska	Metropolitan	19.74	42.98	22.49
31019	Buffalo	Nebraska	Micropolitan	20.12	43.92	23.39
31013	Box Butte	Nebraska	Noncore	25.89	40.32	24.71
31111	Lincoln	Nebraska	Micropolitan	31.42	37.03	26.09
31001	Adams	Nebraska	Micropolitan	28.25	42.70	27.91
31033	Cheyenne	Nebraska	Noncore	20.57	53.87	30.54
31179	Wayne	Nebraska	Noncore	21.98	57.02	33.64
31137	Phelps	Nebraska	Noncore	26.99	52.69	33.96

Four rural counties—Box Butte, Cheyenne, Wayne and Phelps Counties—scored better than several metropolitan counties. The Community Council will be looking at these “bright spot” counties to see what can be learned from them.

The map below shows the digital divide rankings for counties by quartile, with the counties in lighter shades scoring the best (or lowest).

Figure 3. Digital Divide Index Score by Quartiles.



The report also found that counties scoring highest (or worst) in the Digital Divide Index were more likely to lose population than counties scoring better.

The complete report is available at <http://ici.msucare.com/ddi>.

NITC Strategic Initiatives Status Report			
Strategic Initiative, Action Item and Deliverable/Target			
Community IT Development		Status	Notes
1	Support the efforts of communities to address broadband-related development by recognizing outstanding programs and developing a series of best practices and case studies.		
1.1	First Nebraska Community Broadband Awards awarded Oct. 21, 2015	Completed	First Community Broadband Awards awarded Oct. 21, 2015
1.2	At least 6 best practices/case studies developed by Oct. 2016	In progress	Featured projects include: <ul style="list-style-type: none"> • Rural Nebraska Health Care Network Broadband Fiber Project • Interface: The Web School • Nebraska 4-H Robotics FIRST Lego League were profiled. • NebraskaLink-PSC-Lincoln City Libraries project • Morton-James Public Library • NeHII • Nebraska's Prescription Drug Monitoring Program • Interview with Roberto Gallardo, author of Responsive Countryside
2	Support the Network Nebraska Advisory Group's efforts serve as a communication hub for new and existing Network Nebraska participants.		
2.1	Develop and implement a communications strategy	In progress	A recent grant from the Institute of Museum and Library Sciences to Internet 2 will support efforts to bring libraries onto Network Nebraska.
3	Support the Education Council's efforts to expand awareness and address the need for equity of access as it relates to digital education.		

3.1	Work with other stakeholders to find equitable Internet solutions	In progress	Community and Education Councils have met to discuss this issue. Tom Rolfes has drafted a position paper on this issue. He has also researched TV White Space and how it may be used provide access to students. Norfolk Public Library's WiFi hot spot lending program offers another model for addressing this issue. The PSC's broadband adoption grants are also addressing this issue.
-----	---	-------------	---

Attachment 6-b

Oct. 31, 2016

To: NITC Commissioners
From: Anne Byers
Subject: eHealth Council Report

New Members and Co-Chair. The eHealth Council has recommended the nominations of two new members:

- Kevin Borchert, NeHII
- Brian Sterud, Faith Regional Hospital

Their bios are included on the following page. The approval of these nominations is an action item.

As an informational item, Dr. Delane Wycoff has stepped down as co-chair of the eHealth Council. The Council presented him with an Admiralship from the Nebraska Navy to thank him for his contributions to the eHealth Council. Marty Fattig, CEO of Nemaha County Hospital, is the new co-chair. Mr. Fattig and Nemaha County Hospital have been recognized nationally for their use of health IT.

Nebraska Advance Interoperable Health IT Services to Advance Health Information Exchange Cooperative Agreement. On July 27, 2015, the NITC/Office of the CIO was awarded a \$2.7 million cooperative agreement from the U.S. Office of the National Coordinator for Health IT to advance health information exchange in Nebraska.

The NITC is partnering with the Nebraska Health Information Initiative (NeHII) and the University of Nebraska Medical Center (UNMC) on the grant. NeHII is one of the largest health information exchanges (HIEs) in the country with data on over 3 million individuals and over 7,000 users. This two-year grant builds upon NeHII's successful track record by adding additional Critical Access Hospitals, long-term care facilities, and other providers to NeHII; increasing utilization by providing additional value-added functionality and workflow integration training; and increasing interoperability and integration with a focus on public health and research. Implementations are gearing up again now that NeHII is nearing the completion of a migration to a new platform which will enable NeHII to provide additional services.

UNMC is providing assistance in workflow integration to facilities in two Nebraska communities. Initial use cases for health information have been identified. Work on implementing the technologies identified and incorporating the new technologies into the provider workflow will begin soon. Lessons learned will be shared through use case-based training modules.

An update on grant milestones is included in the strategic initiative status report at the end of this report.

Kevin C. Borchert, Pharm.D.



Kevin Borchert is the Prescription Drug Monitoring Program Director for NeHII (Nebraska Health Information Initiative). Kevin is responsible for the implementation of the Nebraska Prescription Drug Monitoring Program. Prior to his current position, Dr. Borchert was the Pharmacy Informatics Coordinator at Nebraska Methodist Hospital for over 19 years. He has had experience in implementing and maintaining automated dispensing systems, barcode medication administration (BCMA), computerized provider order entry (CPOE), and most recently the first implementation of one of the largest EHR systems in the country with electronic prescribing of controlled substances (EPCS). Dr. Borchert is a 1986 UNMC graduate. He has served on the Nebraska Board of Pharmacy and several committees on the National Association of Boards of Pharmacy for 10 years, and currently is the pharmacist member on the Board of Health, serving as chair of the Rules and Regulations Committee. Kevin has been involved with several Nebraska Pharmacist Association legislative initiatives, including co-chair of the NPA Legislative Committee to help pass LB37, the Prescription Drug Safety Act and LB471, the most recent update to the PDMP.

**Brian Sterud, M.B.A., C.H.C.I.O.
Chief Information Officer**



Brian Sterud received his Bachelor of Science degree in Mathematics from South Dakota State University in Brookings, SD in 2001. In 2011, he graduated from CIO Boot Camp at the College of Healthcare Information Management Executives. Sterud is a Certified Healthcare CIO and Certified Professional in Healthcare Information and Management Systems. He received his Masters of Business Administration degree (MBA) with specialization in Health Services Administration in 2014 from the University of South Dakota, in Vermillion, SD.

Since 2001, Sterud has built a strong knowledge of the technology needs and initiatives within the healthcare industry, including the position of Network Analyst, Remote Systems Engineer and Consultant and Data Systems Engineer. In 2008, Mr. Sterud became the Director of Information Management at Brookings Health Systems. In 2012, Sterud accepted his current role as Vice President of Information Systems at Faith Regional Health Services.

Mr. Sterud is married and has two children.

NITC Strategic Initiatives Status Report

Strategic Initiative, Action Item and Deliverable/Target			
eHealth		Status	Notes
1	Work with NeHII and UNMC to Support HIE through ONC grant.		
1.1	18 Critical Access Hospitals, labs and other facilities implemented.	18 facilities recruited. 3 completed. 5 in progress	Physicians Lab, Community Memorial Hospital (Syracuse) and Auburn Family Health Center are complete. Community Medical Center – Falls City is scheduled to go live on November 29. CHI Nebraska Heart Institute Clinics, The Provider Network Clinics, Antelope Memorial Hospital, and Pender Community Hospital are in progress. Oakland Mercy Hospital, Colglazier Medical Clinic, Perkins County Hospital, and Think WholePerson Healthcare are getting started. Thayer County Hospital, Cherry County Hospital, and Ogallala Community Hospital are working to complete the administrative details to start before the end of 2016.
1.2	5 ambulatory clinics and long-term care facilities implemented	Starting soon	This functionality will be available when NeHII migrates to a new platform and pricing has been established. Statements of Work have been requested from Optum to implement Grand Island Clinic, Think Whole Person Healthcare, and CHI Health TPN Clinics.
1.3	50 long-term care and other facilities implemented for Direct	In progress	40 facilities recruited; 11 facilities implemented; 53 user accounts set up.
1.4	5 HIE to HIE gateways developed	Not started	6 HIEs recruited. This functionality will be available when NeHII migrates to a new platform.
1.5	40 providers implemented for mobile ADT alerts	Not started	5 providers recruited; Recruitment for ADT alerts via mobile messaging is just starting.
1.6	8 Critical Access Hospitals to send syndromic surveillance data	In progress	8 facilities recruited; Community Hospital (McCook) is live. NeHII is exploring a reduced pricing model for facilities implementing ADT and syndromic surveillance.
1.7	5 facilities implemented for population health	Not started	5 health systems confirmed. Scheduling implementation of first two facilities.

1.8	Assistance with workflow analysis and integration provided	In progress	Use cases have been identified. Work is beginning on implementing technologies and integrating them into the provider workflow.
1.9	6 training modules developed	In progress	The first training module will be done by the end of this year.
1.10	2 demonstration projects which integrate HIE data developed	Just starting	

NITC Strategic Initiatives Status Report (11/03/2016)			
Strategic Initiative, Action Item and Deliverable/Target			
Network Nebraska (Education Council)		Status	Notes
1	Prepare for the future of Network Nebraska		
1.1	Develop strategy to accommodate community affiliate connections	Completed	Participant-hosted entity criteria has been approved by the Network Nebraska Advisory Group and State CIO. Virtual Field Trip content provider presentation on 11/8/2016.
1.2	Use automated tools to monitor network uptime and web depiction	In progress	First demonstration of the new automated software was given at the 10/12/2016 CAP meeting. Further development in progress.
1.3	Implement incident management and change control frameworks	In progress	Working with UNCSN to improve external communication to affected entities on an event by event basis.
1.4	NNAG & CAP to guide OCIO decisions about network growth/reliability	In progress	CAP and NNAG continue to collaborate and recommend infrastructure options.
1.5	Review and update security services and practices and strategize future services	In progress	Most recent activity is research of an enterprise solution to prevent and mitigate Distributed Denial of Service (DDoS) attacks.
2	Serve as the communication hub for new and existing Participants		
2.1	Develop and implement a communications strategy	In progress	NNAG, CAP, UNCSN and OCIO have stepped up the level and frequency of outbound communication.
2.2	Conduct an annual services survey of all Participants to guide service development	In progress	Work Group Volunteers named, 10/19/2016

NITC Strategic Initiatives Status Report (11/03/2016)

Strategic Initiative, Action Item and Deliverable/Target

Digital Education (Education Council)		Status	Notes
1	Create professional development opportunities for Nebraska educators		
1.1	Establish a multimodal, virtual communities of practice for all levels of educators	In progress	Initial inventory of professional development opportunities was gathered on 8/17/2016.
2	Address students' technical challenges in high school to college transition		
2.1	Conduct a research project to identify existing infrastructure and pedagogy efforts	In progress	EC subcommittee met with EDUCAUSE researcher in May 2016 to explore a joint research project.
2.2	Identify opportunities for collaboration to ease student transition to college	In progress	Work Group Volunteers named, 10/19/2016
2.3	Identify key challenges for transitioning students and mitigate the challenges	In progress	Work Group Volunteers named, 10/19/2016
2.4	Create an effective practices guide for using flexible learning technologies	In progress	Work Group Volunteers named, 10/19/2016
2.5	Develop a strategy to encourage vendors to implement data exchange standards	In progress	NDE I.T. Project Proposal 13-01 addresses this action item.
3	Address the need for equity of access as it relates to digital education		
3.1	Form a joint study group to identify opportunities/actions to ensure equitable access	In progress	Community Council and Education Council study group have met twice to consider options to achieve equity of access.
3.2	Work with other stakeholders to ensure equitable Internet access for all students	In progress	Equity of Access briefing paper drafted.
3.3	Identify and promote accessible products and services to achieve equitable access	In progress	Dr. Christy Horn, NU accessibility expert, invited to present at 12/21/2016 EC meeting.

Attachment 6-d

November 10, 2016

To: NITC Commissioners

From: Nathan Watermeier, State GIS Coordinator
Tim Cielocha, Chair, GIS Council
Jon Kraai, Vice-Chair, GIS Council
Bill Wehling, Past-Chair, GIS Council

Subject: GIS Council Report

OCIO Geospatial/GIS Enterprise

An assessment was conducted to examine costs savings by centralizing GIS infrastructure across state agencies. The initial estimates are showing potential savings of up to \$400,000 annually to move towards a centralized GIS enterprise system. Much of these savings are related to consolidating servers, applications, human resource capital, reducing data duplication and moving towards other alternatives to data hosting.

The OCIO IT Roadmap and consolidation effort is moving forward on Phase 3. This includes moving forward on specific enterprise level applications, such as GIS. Ed Toner has created the Geographic Information Office within the Office of the CIO. Nathan Watermeier will be leading GIS consolidation efforts across state agencies. He will be establishing meetings with agencies over the next few months to start the process and identify timelines. In addition, this office will support some of the tasks outlined by the GIS Council on important data initiatives.

Nebraska Spatial Data Infrastructure (NESDI) Updates

Geodetic and Survey Control

A low distortion projection (LDP) project began earlier this year through the State Surveyors office. The project is intended to provide GIS users access to updated accurate survey control data and section corner positions. It helps land surveyors locate existing monuments prior to commencing field survey work. Several online resources have been created to support the data collection and distribution of this type of data.

LDP Project <https://nebldpproject.blogspot.com/>

Nebraska PLSS Database <http://www.sso.nebraska.gov/nescdb/nesc.html>

Nebraska Public Land Survey System (PLSS) Map Viewer -<http://maps.nebraska.gov/nemap/PLSS>

Nebraska Statewide Elevation Program

Partnerships and financial resources have been finalized to begin implementation of LiDAR (elevation) coverage for the remaining parts of the state. The remaining projects include the Sandhills region involving 18,111 square miles and the Omaha Metro area at 4,500 square miles. These projects are planning to start in the fall of 2016 and commence through spring of 2017. The South Platte Basin project data has been acquired and will be delivered once data has completed its quality control process.

Nebraska Statewide Imagery Program

A draft business plan for a Nebraska Statewide Imagery Program was presented to the GIS Council on November 2. This program is designed to produce a sustainable statewide imagery program for the state

that facilitates the acquisition, historical preservation, maintenance, and distribution of high quality digital imagery products to be utilized through various governmental uses and for public consumption. The core product involves a statewide orthoimage with a minimum spatial resolution of 12 inches meeting state imagery standards. The program involves the opportunity for all local and state governments and political subdivisions to purchase on the contract. Additional buy-ups will be included on the contract for other imagery products such as higher resolution imagery (i.e., three to six inch pixel resolutions), oblique imagery, and planimetric layers such as building footprints. The business plan will be completed in January 2017.

Administrative and Political Boundaries

A new Administrative and Political Boundary Working Group was initiated at the last GIS Council meeting. The working group will combine current projects involving the U.S. Census 2020 projects, geospatial preparedness and emergency service boundary project, and a regional boundary project coordinated through the MidAmerican GIS Consortium involving 9 mid-western states.

This new program sets out to assess and make recommendations to enhance the current composition of governmental, administrative, statistical, and other unit type boundaries across Nebraska. This Working Group will take the lead to research and develop recommendations for standards, policies, infrastructure, and funding to support improvements to boundary layers led by state, local and federal agencies. These findings will assist in developing best practices and minimum set of requirements so data stewards can use towards standardization of data schema/models and data aggregation workflows. These efforts will help develop boundary agreements to be used for geometric placement of boundaries to support emergency service dispatch boundaries and other administrative and political boundaries.

Street Centerline and Address Databases

The assembly of the Nebraska Address Database (NAD) has begun within the OCIO Geographic Information Office. More than six counties and other state datasets have started to be compiled and incorporated into the standardized geodatabase.

NebraskaMAP – Data Sharing and Web Services Network

On July 26, a special recognition was held for the core group who were involved in developing NebraskaMAP (<http://www.NebraskaMAP.gov>). Additional media efforts to market and advertise the web site will be conducted through November. Metadata standards have been approved at the last NITC meeting on July 14. Web traffic logging started in August for the web site. Most of the page requests for information are related to Nebraska broadband, parks, floodplain management, and bridge information.

Nebraska Spatial Data Infrastructure (NESDI) Status Report

Report Date: November 10, 2016

NITC Strategic Initiatives Status Report			
Strategic Initiative, Action Item and Deliverable Target		Status	Notes
Nebraska Spatial Data Infrastructure (NESDI)			
1	Formalize the definition of the Nebraska Spatial Data Infrastructure (NESDI) and data stewardship		
1.1	Establish an ad hoc committee of GIS Council representatives	Completed	
1.2	Develop a document that defines the NESDI and the role of data stewardship	In Progress	The definition for the NESDI and data stewardship has drafted. Priority is on developing and implementing other NESDI business plans and then provide resource information back to this document.
2	Geodetic and Survey Control Inventory and Assessment		
2.1	Establish an ad hoc committee involving stakeholders from government, private industry and the survey community	Completed	
2.2	Develop a current inventory and assessment report of geodetic and survey control	In Progress	An interactive map viewer has been created to support geodetic and survey control data for the Public Land Survey System (PLSS) – http://maps.nebraska.gov/nemap/PLSS This map viewer provides access to data submitted on behalf of the Low Distortion Projection Project. The project is intended to provide GIS users more accurate section corner positions and to help land surveyors locate existing monuments prior to commencing field work. The information is not intended to replace established field procedures for boundary surveying. The National Geodetic Survey (NGS) data points are also provided as a reference
3	Nebraska Statewide Elevation Program		
3.1	Establish an Elevation Working Group	Completed	
3.2	Identify standard elevation product(s) and develop a set of standards	Completed	Developed and adopted on October 28, 2014
3.3	Develop a business plan	Completed	Developed and approved on March 26, 2015
3.4	Implement the program	In Progress	The Sandhills LiDAR project has just entered into an agreement to begin flight plans for data collection in the fall of 2016. This project rounds out the remainder of the state for LiDAR data collection. The South Platte Basin is finalizing quality control of data that was acquired earlier this year. This data is expected to arrive early 2017. The Omaha Metro area is

			preparing task orders and flight plans for acquisition of data either fall of 2016 or spring of 2017.
4	Nebraska Statewide Imagery Program		
4.1	Establish an Imagery Working Group	Completed	
4.2	Identify standard imagery product(s) and develop a set of standards	Completed	Developed and adopted on October 28, 2014
4.3	Develop a business plan	In Progress	The first draft of the business plan has been completed and presented to the GIS Council on November 2, 2016.
4.4	Implement the program	Not Started	
5	Street Centerline-Address Database		
5.1	Establish a Street Centerline and Address Working Group	Completed	The slate of working group members will be extended to involve additional stakeholders involved with public safety and enhance/next generation 9-1-1 efforts.
5.2	Identify standard street centerline and address product(s) and develop a set of standards	Completed	Developed and adopted on March 27, 2015
5.3	Develop a business plan	In Progress	Specific business plan themes have been developed and shared with the GIS Council for comment. Additional criteria has been incorporated into the business plan draft that include data stewardship, data processing and workflows, costs, and plans with current E-911 and future NG9-1-1 coordination efforts.
5.4	Implement the program	In Progress	The OCIO Geographic Information Office has begun to accumulate address points to populate the Nebraska Address Database (NAD). The Nebraska Department of Roads is continuing to evaluate existing road network data for inclusion into the statewide street centerline database.
6	Statewide Land Record Information System		
6.1	Establish a Land Records Working Group	Completed	
6.2	Update the current NITC 3-202 Land Record and Information Mapping Standards	In Progress	Original standards adopted on January 27, 2006 and amended on March 1, 2011.
6.3	Develop a Nebraska Statewide Parcel Geodatabase Development and Maintenance Plan	Completed	Developed and approved on May 27, 2015
6.4	Implement the program	In Progress	An online parcel map viewer has been created specifically for assessors to use. This aids in communication with assessors and the data they submit to the state. The Department of Revenue staff has taken lead to be liaisons between assessors and the Geographic Information Office for

			future data collection and addressing issues with the data. Plans are underway to begin acquiring parcel data in December 2016.
7	NebraskaMAP - A Geospatial Data Sharing and Web Services Network		
7.1	Establish a NebraskaMAP Working Group	Completed	
7.2	Develop NebraskaMAP Geospatial Data Sharing and Web Services Network Business Plan	In Progress	The business plan has been modified for inclusion within the State of Nebraska Geospatial/GIS Enterprise and OCIO Roadmap initiatives.
7.3	Develop and implement NebraskaMAP data clearinghouse enterprise platform	In Progress	Phase 2 of the program is in development. This involves cataloging imagery and LiDAR data across the State. An updated version of the data sharing platform is also in development and planned for release in November. The next phase of the project is to partner with other data stewards who share public data through local and county governments and other political subdivisions. Metadata standards were modified and approved.

Attachment 6-e

NITC Strategic Initiatives Status Report			
Strategic Initiative, Action Item and Deliverable/Target			
State Government IT Strategy		Status	Notes
1	Single Help Desk Solution - Incident Management Implementation		
1.1	Implement solution and migrate initial group of agencies.	Completed	
1.2	Migrate remaining agencies in phases.	In progress	
2	Service Catalog Implementation		
2.1	Create service catalog for OCIO.	Completed	
3	Change Management Solution Implementation		
3.1	Implement new change management process for OCIO.	In progress	Scheduled for December 2016
3.2	Add other cabinet agencies.	Not started	
4	Enhance Information Security		See IT Security Initiative.
5	Enhanced Operations Center		
5.1	Develop system performance reports and dashboards.	In progress	
5.2	Combine Operations and Help Desk.	In progress	
5.3	Implement fully functional 24/7 Operations Center.	Completed	
5.4	Migrate from Help Desk to Service Desk.	Completed	
5.5	Establish Problem Management process.	In progress	
5.6	Establish Service Manager Program.	Completed	
6	IT Cost Efficiencies		
6.1	Review process in support of the State's IT spending.		See State IT Spending Analysis Initiative.
6.2	Assess environment, including existing infrastructure and applications, through Agency IT Plans.	Completed	
6.3	Enhance server virtualization and optimization.	In progress	
6.4	Implement a configuration management database (CMDB) and full asset management processes.	In progress	
6.5	Develop a Cloud Strategy		See Cloud Strategy Initiative.
6.6	Develop a Mobile Application Platform Strategy.	In progress	
7	Operationalize IT and Project Governance		

7.1	Enterprise Application governance (i.e., Service Desk tool)	Completed	
7.2	Enterprise Project Governance through the Project Management Office	Completed	
7.3	Enterprise Infrastructure Governance	Not started	
8	Consolidate on STN Domain		
8.1	Implement phased migration.	In progress	
9	Data Center Consolidation - Agency Server Migration		
9.1	Implement phased migration.	In progress	
10	Initiate Active/Hot Standby Solution - Enterprise Apps		
10.1	Install core network equipment at both locations.	Completed	
10.2	Implement phased migration.	In progress	
Cloud Strategy		Status	Notes
1	Develop a strategy for the use of cloud-based services by Nebraska state government.		
1.1	Cloud Strategy Document	In progress	Work Group recommended changes to draft document; to be reviewed by the SGC and Technical Panel.
State IT Spending Analysis		Status	Notes
1	Create new accounting codes to better capture IT-related spending.		
1.1	Develop new accounting codes and definitions.	Completed	
1.2	Pilot test new codes.	Completed	
1.3	Roll-out new codes to cabinet agencies.	Completed	
2	Develop reporting tools using the new accounting codes.		
2.1	Design reports to be generated by the accounting system using the new codes.	In progress	
3	Prepare an analysis of information technology spending by Nebraska state government.		
3.1	IT Spending Analysis Document	Not started	
IT Security		Status	Notes
1	Complete Mobile Device Management solution implementation (MaaS360 from Fiberlink / IBM).		

1.1	MaaS360 will be installed on all mobile devices authenticating to the State of Nebraska network.	In progress	An alternative solution has been selected.
2	Complete transition to Security Mentor Security Awareness videos for all State employees.		
2.1	Security Awareness videos will be delivered to all State employees through the Learning Management System on a semi-monthly basis.	Completed	
2.2	Emails that re-inforce the video will be sent to all State employees on the off months.	Completed	
3	Perform a complete IT hardware inventory of all State agencies.		
3.1	Itemized list of IT-related hardware used within the State of Nebraska network	In progress	
4	Perform a complete IT application inventory of all State agencies.		
4.1	Itemized list of applications used within the State of Nebraska network	In progress	
5	Complete Nebraska Security Operation Center.		
5.1	Enterprise Security Information and Event Management (SIEM) system	In progress	
5.2	Enterprise Security Operations Centers in multiple locations 24 x 7 for redundancy	Not started	
5.3	Service Level Agreements with all participants	Not started	
5.4	Written Charter	Not started	
6	Complete update of NITC Standards and guidelines according to gap analysis		
6.1	Updated NITC 8-101 Information Security Policy	In progress	Under review by the Security Architecture Workgroup.
6.2	Updated NITC 8-102 Data Security Standard	Not started	
6.3	Updated NITC 8-103 Minimum Server Configuration Standard	Not started	
6.4	Updated NITC 8-201 Information Technology Disaster Recovery Plan	Not started	
6.5	Updated NITC 8-301 Password Standard	Not started	
6.6	Updated NITC 8-303 Remote Access Standard	Not started	
6.7	Updated 8-304 Remote Administration of Internal Devices Standard	Not started	

Nebraska Information Technology Commission
Enterprise Project Status Dashboard – as of October, 2016

Project: Network Nebraska Education		Contact: Tom Rolfes				
Start Date	05/01/2006	Orig. Completion Date	06/30/2012	Revised Completion Date	08/10/2016	
	June	April	February	January	December	November
Overall Status						
Schedule						
Budget						
Scope						
Quality						
Project Description						
<p>Network Nebraska-Education is a statewide consortium of over 260 K-12 and higher education entities working together to provide a statewide backbone, commodity Internet, distance education, and other value-added services to its participants. Network Nebraska-Education is managed by the State Office of the CIO partnering with the University of Nebraska Computing Services Network (UNCSN).</p> <p>Project Budget (2015-16): \$702,894 (\$759,244 has been expended, \$56,738 over budget (108%))</p>						
Status Report						
<p>August update: Six new entities joined Network Nebraska-Education on July 1, 2016. Request to close project for NITC reporting.</p> <p>June update: Six (6) new entities are expected to join Network Nebraska-Education prior to 8/10/2016. Minor risks and issues are addressed by the executive sponsors at the monthly CAP meetings.</p> <p>State of Nebraska RFP 5153 was released on 10/23/2015 as the largest telecommunications RFP in the history of the State of Nebraska. Bid opening occurred on 12/18/2015 and included 226 circuits for K-12, 20 circuits for higher education, 98 circuits for UNL Extension, and 3 circuits for the Nebraska Game & Parks Commission. Intents to Award Contract were issued on January 13, 2016 (delayed 20 days). As of May 25, all 13 provider contracts had been posted, a delay of over 60 days from expected. A separate RFI and RFP for the statewide backbone will follow the WAN circuit upgrade in late summer, early fall, 2016. The RFP will include the four segments of the leased backbone. For 2016-17, existing backbone contracts will be renewed/extended. Lincoln City Libraries went live with fiber access to Network Nebraska in late March and their Internet purchase was initially 500Mbps. Commodity Internet orders for 2016-17 were collected from K-12 and higher education entities and total orders increased by 44% over 2015-16.</p> <p>The delay in finalizing and posting the 13 provider contracts related to RFP 5153 caused angst among many K-12 school districts as they prepared to do their federal E-rate filing before the May 26, 2016 extended deadline. The Office of the CIO will want to review RFP terms and conditions and whether alternate language can be constructed to make future years' procurements and contracting more expedient.</p> <p>Additional Comments/Concerns: Even though the Chief Information Officer fulfilled the Legislative benchmark of "providing access (the ability to connect) to every public K-12 and public higher education entity at the earliest date and no later than July 1, 2012" [Neb. Rev. Stat. 86-5,100], the NITC Technical Panel has extended the enterprise project designation for Network Nebraska-Education until 8/1/2016 so that all public school districts that want to participate have actually connected.</p>						

Nebraska Information Technology Commission
Enterprise Project Status Dashboard – as of October, 2016

Project:	Nebraska State Accountability (NeSA)			Contact:	John Moon	
Start Date	07/01/2010	Orig. Completion Date	06/30/2011	Revised Completion Date	6/30/2017	
	October	August	June	April	February	January
Overall Status						
Schedule						
Budget						
Scope						
Quality						

Project Description

Legislative Bill 1157 passed by the 2008 Nebraska Legislature required a single statewide assessment of the Nebraska academic content standards for reading, mathematics, science, and writing in Nebraska’s K-12 public schools. The new assessment system was named Nebraska State Accountability (NeSA), with NeSA-R for reading assessments, NeSA-M for mathematics, NeSA-S for science, and NeSA-W for writing. The assessments in reading and mathematics were administered in grades 3-8 and 11; science was administered in grades 5, 8, and 11; and writing was administered in grades 4, 8, and 11.

Project Estimate: \$4,329,379 (\$0.00 has been expended for FY 2017)

Status Report

October update:

Technical reports for NeSA will be delivered this month.

Tests forms for ELA, math, and science were completed on September 13, 2016. The enrollment window for NeSA materials will be open from October 3rd through October 14th. Districts will need to order the number of materials for paper (students with documented need), Large Print, Contracted English Braille, Uncontracted English Braille, and paper Spanish Translation assessments in eDIRECT. NeSA-Alternate assessments will be based on the number of students identified as requiring an Alternate Assessment in the Nebraska Student and Staff Record System (NSSRS). The Alternate Assessment Flag is an entry in the Special Education Snapshot with information noted on page 51 of the Student Template.

NeSA practice tests are available. The NeSA Practice Tests Online Administration Manual and the practice test video training are available on the Assessment page. The NeSA-ELA practice test includes technology enhanced items and a practice Text-Dependent Analysis at each grade. Technology enhanced items became available on September 30th for Check4Learning.

NeSA-Math Transition workshops are scheduled for the following dates at the various locations across the state. The workshops are:

- Gering, Gering Civic Center, Oct. 11
- Kearney, Younes Center, Oct. 12
- Norfolk, Lifelong Learning Center, Northeast Com College, Oct. 13
- Lincoln, Holiday Inn Downtown, Oct. 18
- Omaha, DC Centre, Oct. 19

DRC has not billed the Department of Education for 2016-17.

August update:

The 2015-2016 contract will close with the delivery of the reports for district, school and student during August. The final task will be accomplished when the NeSA and NeSA-AA technical reports are delivered.

For 2016-2017 there will likely be no NeSA grade 11 testing, likewise no writing tests for grades 4, 8, and 11 will be

Nebraska Information Technology Commission

Enterprise Project Status Dashboard – as of October, 2016

administered this year. The final year of the current contract started July 1, 2016. Item writing including Technical Enhanced items (TE) for both the NeSA English Language Arts (ELA) and Math assessments have been written and reviewed. These TE items will be uploaded into the item bank for field testing in the spring of 2017. The 2016-2017 Check4Learning (C4L) will be available on July 22, 2016. Forms construction for NeSA and NeSA-AA will begin in September 12 and be completed by September 23.

Key Accomplishments since Last Report:

- The State Board approved the 2016-2017 contract with DRC which started July 1, 2016.
- Scores have been reviewed to eliminate errors such as duplicates, wrong IDs, etc. during June and July based on feedback from Nebraska school districts.
- The final score resolutions will be sent to DRC on August 10, 2016.
- New items were developed with Nebraska teachers including Technically Enhanced items (TE) for math and ELA.
- NDE has released an RFP for a college entrance exam (see website for RFP).

Upcoming Activities this reporting period:

- NDE will send updated list of districts and schools to DRC for 2016-2017 assessment cycles.
- NDE staff will approve math sampler items for the math and alternate assessments practice tests.
- Along with DRC's support NDE staff will develop the test forms for the 2017 NeSA tests based on item parameters and test criteria for large scale assessments.
- NDE will approve NeSA test manuals and training for the 2017 test cycle.
- In October NDE and DRC will provide one day professional development sessions for district/school math staff members at five locations throughout the state of Nebraska on the 2018 college and career standards and the new item types to measure the more rigorous standards.

Additional Comments/Concerns:

July 2016 - Nebraska State Accountability (NeSA) is a statewide assessment system mandated by Nebraska Statute. Nebraska Department of Education has contracted with Data Recognition Corporation (DRC) to continue the development of the assessment system including management, development, delivery, administration, scanning/imaging, scoring, analysis, reporting, and standard setting for the online and pencil/paper reading, science and mathematics tests (NeSA-RMS) for July 1, 2016 through June 30, 2017. DRC will facilitate the delivery, administration, scanning/imaging, scoring, analysis, and reporting for the alternate pencil/paper reading, science, and mathematics tests during the same assessment window. The testing window for NeSA-RMS and NeSA-AA will start on March 2016 and end on May 5, 2016.

Nebraska Information Technology Commission
Enterprise Project Status Dashboard – as of October, 2016

Project: Nebraska Regional Interoperability Network (NRIN)		Contact: Sue Krogman				
Start Date	10/01/2010	Orig. Completion Date	06/01/2013	Revised Completion Date	09/30/2016	
	October	August	June	April	February	January
Overall Status						
Schedule						
Budget						
Scope						
Quality						
Project Description						
<p>The Nebraska Regional Interoperability Network (NRIN) is a project that will connect a majority of the Public Safety Access Points (PSAP) across the State by means of a point to point microwave system. The network will be a true, secure means of transferring data, video and voice. Speed and stability are major expectations; therefore there is a required redundant technology base of no less than 100 mbps with 99.999% availability for each site. It is hoped that the network will be used as the main transfer mechanism for currently in-place items, thus imposing a cost-saving to local government. All equipment purchased for this project is compatible with the networking equipment of the OCIO.</p> <p>Project Estimate: \$10,024,084 (\$8,745,330.26 has been expended)</p>						
Status Report						
<p>October update: Work is being completed between Gibbon and Kearney to finalize the linear connection of the West to the East. Other areas being worked on are from Albion to Platte Center, Bruning to Gladstone and all of Cass County. Beatrice dispatch is in the process of connecting the network for their dispatching.</p> <p>August update: Continued work on the line from Grand Island to Lexington. New structural analysis is being performed on Atlanta NET as well as towers that will also host the SRS system. Small funding allocations will be a cause for schedule delays. The allocations are a result of the SHGP grant amounts and the distribution of State and Local agreed upon funds.</p> <p><u>Key Accomplishments since Last Report:</u></p> <ul style="list-style-type: none"> • The installation of 3 sites along the I-80 corridor. <p><u>Upcoming Activities this reporting period:</u></p> <ul style="list-style-type: none"> • To complete the installation from Grand Island to Lexington and then up to Oconto. • Turn it on and get it tested. <p>Additional Comments/Concerns: It's possible that upcoming target dates might be missed. Based on the uncertainty of the infrastructure needed for the project and the time involved in obtaining the environmental approvals to proceed with the project, any target dates are fluid. Delays are inevitable due to the weather over the winter months and the difficulty in locating adequate tower sites and negotiating leasing agreements and/or MOU's. Additional delays will be caused by small funding allocations. FCC filings are taking 30-45 days and some materials are 4-6 weeks out. New grant dollars are in effect until August of 2018.</p>						

Nebraska Information Technology Commission
Enterprise Project Status Dashboard – as of October, 2016

Project: Medicaid Management Information System Replacement Project (MMIS)		Contact: Don Spaulding				
Start Date	7/01/2014	Orig. Completion Date	TBD	Revised Completion Date	N/A	
	October	August	June	April	February	January
Overall Status						
Schedule						
Budget						
Scope						
Quality						
Project Description						
<p>Nebraska’s current Medicaid Management Information System (MMIS) has supported DHHS Medicaid operations since 1977. Medicaid is an ever-changing environment where program updates occur quickly. The need for access to data is increasing and technological enhancements are necessary to keep pace with program changes. Recognizing the need to implement new technology, and with the support of the Legislature, DHHS embarked on the planning phase for replacement of MMIS functionality.</p> <p>Project Estimates: \$113,600,000* (\$4,571,755 have been expended) *Planning Expenditures include 7/01/2014 – 12/29/2016. Estimate is a rough order magnitude estimate based on information available. As the procurements are completed, categorical details will be available.</p>						
Status Report						
<p>October update: The Data Management and Analytics (DMA) RFP was released on June 1, 2016. Five (5) bidder proposals were received on September 20, 2016. Proposal evaluation will be completed on October 21, 2016.</p> <p>A Project Coordination Committee was established to address system integration across the MMIS Replacement Projects and related systems, such as Eligibility and Enrollment.</p> <p>The Independent Verification and Validation (IV&V) RFP was awarded to First Data Government Solutions, LP and is in process of contract finalization.</p> <p><u>Key Accomplishments since Last Report:</u></p> <ul style="list-style-type: none"> The DMA RFP proposal evaluation process including training and selection criteria was approved by all Stakeholders. Evaluation began September 27, 2016 and runs through October 21, 2016. The Project Coordination Committee was established, consisting of key individuals across the DHHS enterprise. IV&V RFP award was protested and resolved. Contract with First Data Government Solutions, LP is currently being finalized. An update to the PAPD was submitted to CMS. <p><u>Upcoming Activities this reporting period:</u></p> <ul style="list-style-type: none"> Stakeholder review of the DMA RFP took longer than planned. The amount of interest from the vendor community resulted in 519 questions that was much more than anticipated. <p>August update: The Data Management and Analytics (DMA) RFP was released on June 1, 2016 with bidder proposals due September 20, 2016. The Independent Verification and Validation (IV&V) RFP selection has been recommended to DAS with a published intent to award to First Data Government Solutions, LP. The funding request for implementation (IAPD) has received CMS approval. NOTE: Current planning activities are funded under an approved CMS PAPD.</p> <p>Stakeholder review of the DMA RFP took longer than planned. The amount of interest from the vendor community resulted</p>						

Nebraska Information Technology Commission
Enterprise Project Status Dashboard – as of October, 2016

in 519 questions that were much more than anticipated.

Key Accomplishments since Last Report:

- 519 DMA RFP vendor questions were received. The responses to the questions were posted on July 28, 2016.
- IV&V RFP proposals were received and scored. A Best and Final Offer (BAFO) resulted in an award recommendation with First Data Government Solutions, LP to DAS.

Upcoming Activities this reporting period:

- DMA evaluation process and materials are being developed. Evaluation team training is being scheduled.
- IV&V RFP will be awarded and contracted.

Additional Comments/Concerns:

Many state resources are not full-time on the project and have other duties including other Legislative mandates to implement which may have a higher priority than this project. Funding for the project is 90% federal funding and 10% state funding.

Nebraska Information Technology Commission
Enterprise Project Status Dashboard – as of October, 2016

Project: District Dashboards						Contact: Dean Folkers
Start Date	07/01/2013	Orig. Completion Date	06/30/2015	Revised Completion Date	06/30/2016	
	June	April	February	January	December	November
Overall Status						
Schedule						
Budget						
Scope						
Quality						
Project Description						
<p>Made possible by a Statewide Longitudinal Data System (SLDS) grant from the United States Department of Education in 2012, the focus of the Nebraska Ed-Fi Dashboard initiative is to provide readily available data to the Nebraska classrooms to facilitate informed decision-making. Potential users include teachers, counselors, and administrators. NDE intends to leverage the Ed-Fi dashboard solution made available by the Michael & Susan Dell Foundation to provide Nebraska with an advanced student performance dashboard system to be customized for Nebraska needs. The Ed-Fi data standard will serve to define the initial data elements powering the Nebraska Ed-Fi dashboard.</p> <p>Our Plan of Work for design, development, and piloting of the Nebraska Dashboards will commence in three phases, each to proceed subsequently upon successful completion of the previous phase, between the months of September 2013 and December 2014. The phases include: Phase I - Dashboard Readiness (September 2013-February 2014), Phase II – Dashboard Development (February 2014-June 2014), and Phase III – Dashboard Deployment (June 2014-December 2014).</p> <p>Project Estimate: \$466,623.75 has been expended, grant funds only</p>						
Status Report						
<p>August update: Successfully completed the pilot testing for the ADVISER dashboard. Request to close project for NITC reporting.</p> <p>June update: The contract end date was extended until 6/30/2016 to align with the end of the grant period. Currently we have six pilot districts and 12 Early Adapter Program (EAP) districts running in production. The Phase II Early Adopter Program has started and around 80 districts are participating. The team is wrapping up the dashboard pilot testing with the six PowerSchool pilot districts and 12 EAP districts. Certification testing of Infinite Campus Phase II development continues with NDE/DLP and McCook pilot district. NDE and DLP have been holding regular knowledge transfer sessions for the Accountability Data Mart (ADM) and pilot testing of the ADM implementation is in progress.</p> <p>Validation of data loaded to DWH and ADM will be delayed due to resource constraints. Creation of reports for accountability pilot testing is delayed. Pilot test of the dashboard will continue until the end of June. Pilot testing of the DWH/ADM continues until the end of June. Associated knowledge transfer for DWH/ADM continues thru June. NDE is still in the process of realigning staff responsibilities or hiring additional staff to provide the resource capacity for statewide rollout and long term maintenance. ESUCC staff is shared between multiple projects and therefore availability and allocation varies.</p> <p>Creating an NSSRS migration strategy and plan for statewide rollout. Target timeline has been identified. Team working on detailed migration plan.</p>						

Nebraska Information Technology Commission
Enterprise Project Status Dashboard – as of October, 2016

Project: Medicaid Eligibility & Enrollment System		Contact: Don Spaulding				
Start Date	10/28/2014	Orig. Completion Date	06/30/2016	Revised Completion Date	06/30/2017	
	October	August	June	April	February	January
Overall Status						
Schedule						
Budget						
Scope						
Quality						
Project Description						
<p>The Affordable Care Act (ACA) included numerous provisions with significant information systems impacts. One of the requirements was to change how Medicaid Eligibility was determined and implement the changes effective 10/1/2014. As a result of the lack of time available to implement a long-term solution, the Department of Health and Human Services implemented a short-term solution in the current environment to meet initial due dates and requirements. This solution did not meet all Federal technical requirements for enhanced Federal funding but was approved on the assumption that a long-term solution would be procured. An RFP was developed and procurement has been completed with Wipro selected as the Systems Integrator for an IBM/Curam software solution.</p> <p>Project Estimate: \$57,741,564 (\$21,301,064 has been expended)</p>						
Status Report						
<p>October update:</p> <p>The Nebraska Eligibility and Enrollment Solution (NE EES) project is in the design phase. Design activities are being executed per the integrated master schedule (IMS). The project team has identified 2 areas of the design that are pushing out the design completion dates. Those areas are Functional Delivery Units (FDUs) and data conversion. Members of the project team are working with the project board to mitigate. Key members of the project have resigned and are no longer with the project from both Wipro and the State. Resource allocation to impacted areas of work is being assessed and staffed.</p> <p>Major areas of design work for the business are packaged in Functional Delivery Units (FDU). Business design activities are In-progress for FDU 1 (MAGI), FDU 2 (Non-MAGI) and FDU 3 (case, appeals & notices). Major technical areas of the project include data conversion, data synchronization, interfaces, environments, audit/ logging, reporting, data warehouse and security / privacy. The project follows a rolling wave project methodology. The development phase approach and integrated master schedule (IMS) activities are starting.</p> <p><u>Key Accomplishments since Last Report:</u></p> <ul style="list-style-type: none"> • Data conversion mapping from the source system NFOCUS to the target system NTRAC is on schedule. The team has completed the initial mapping and gap analysis is underway. File formats are being created to prepare for extract design and development. • A comprehensive security matrix has been created and is getting incorporated into all aspects of the project work. The security matrix includes CMS standards. • 15 interface control documents have been delivered and the State is reviewing, provided feedback and moving toward acceptance. • The production class data conversion environment statement is being reviewed by the State. • Conducted multiple design sessions for FDU-1 (MAGI) and FDU-2 (Non-MAGI) to define the capability of the Curam OOTB solution to satisfy business requirements. • Completed final reviews for key sections of business rules - Curam Rate Tables, MAGI Chip Eligibility, MAGI Common 						

Nebraska Information Technology Commission

Enterprise Project Status Dashboard – as of October, 2016

- Financial and Non-MAGI ABD rules Group.

Upcoming Activities this reporting period:

- Data conversion mapping for entity group 3 and continued gap analysis. Extract file design and development will begin in October.
- Design JAD sessions for Audit and logging strategy - State review and provide feedback on application, middleware, database layers.
- Security and privacy operating assumptions – initial State review and feedback
- 11 Interface JAD sessions are planned for October. Continued review, feedback and acceptance of ICD documents.
- Development environment requirements and planning work sessions will be held with the State.
- Continue design activities for FDUs already in progress
- Kick-off design for FDU-4
- Commence definition of content to be included in FDU-5
- Continue work to conclude definition of additional Business Rules

August update:

The Nebraska Eligibility and Enrollment Solution (NE EES) project is executing the design phase of the project. Stakeholders from the state are participating in Joint Application Design (JAD) sessions. JAD sessions are collaborative working meetings that allow stakeholders to discuss how to incorporate Nebraska specific requirements into the design of Nebraska Timely, Responsive, Accurate, Customer Service (NTRAC). JAD sessions are held for both business and technical design.

Design activities are being executed per the integrated master schedule (IMS). Major areas of design work for the business are packaged in Functional Delivery Units (FDU). Technical areas of the project are underway including data conversion, data synchronization, interfaces, environments, audit/ logging and security/ privacy.

Additional Comments/Concerns:

Many state resources are not full-time on the project and have other duties including other Legislative mandates to implement. The vendor is having difficulty filling key roles on the project and does not have enough people on the project to support current work plan. The vendor is taking steps to hire additional resources.

Nebraska Information Technology Commission
Enterprise Project Status Dashboard – as of October, 2016

The project(s) listed below are reporting voluntarily and is not considered as an Enterprise Project by the NITC.

Project: AFIS Upgrade Project	Contact: Tony Loth					
Start Date	09/09/2015	Orig. Completion Date	11/30/2016	Revised Completion Date	TBD	
	October	August	June	April	February	January
Overall Status						
Schedule						
Budget						
Scope						
Quality						
Project Description						
<p>Nebraska’s AFIS (Automated Fingerprint Identification System) is the Nebraska fingerprint database. The system is used as a repository for all criminal and non-criminal fingerprint records for the state of Nebraska. For criminal purposes the system biometrically connects an individual’s criminal arrest record to a specific individual. For non-criminal purposes, the system is used for the purpose of conducting fingerprint-based background for employment or licensing purposes. Due to rapidly improving technology and hardware lifespan, it is necessary to upgrade AFIS approximately every 5-8 years.</p> <p>This upgrade will include the following major components:</p> <ol style="list-style-type: none"> 1. Upgrading the existing biometric identification software platform from Printrak 9.7 platform to the new and improved MorphoBIS platform. 2. Replacement of eight (8) existing tenprint workstations and seven (7) latent workstations that will not be compatible with the MorphoBIS software. 3. Replacement of backend servers that were not replaced during Phase I of the upgrade. <p>Project Estimate: \$2,020,500 (\$1,880,500 has been expended)</p>						
Status Report						
<p>October update:</p> <p>Project is nearing completion. Cutover to the new system started the afternoon of Friday, September 30. Final data migration from the old system to the new was completed over the weekend. Tenprint and latent workstations were installed at the NSP crime lab, NSP CID office, Lincoln Police Department, Omaha Police Department and Kearney Police Department. On Monday, October 3, applicant livescans were brought back on-line and applicant fingerprint submissions were allowed to be submitted to the new system.</p> <p><u>Key Accomplishments since Last Report:</u></p> <ul style="list-style-type: none"> • End user training was completed for all AFIS users. • Data clean-up projects were completed. • Work queues were zeroed out. • Work stations were installed. • Cutover to the new system was completed. <p><u>Upcoming Activities this reporting period:</u></p> <ul style="list-style-type: none"> • AFIS Administrator training will be completed in October. • Go-Live punch list items will continue to be resolved. • Final System Acceptance validation will occur. • Live RISC testing to be completed. 						

Nebraska Information Technology Commission Enterprise Project Status Dashboard – as of October, 2016

August update:

The decision has been made to add two change orders to the scope of the project contingent on securing funding. Combined cost for the change orders is \$23,000. NSP is seeking approval from the Bureau of Justice Statistics to change the scope of the 2015 NCHIP grant to include these two change orders within the grant project.

The project continues to be on track for an October 3 implementation.

Key Accomplishments since Last Report:

- All hardware has been shipped and received in Nebraska with no issues.

Upcoming Activities this reporting period:

- MorphoTrak employees are now on site to set up the new system and to begin testing connectivity with the FBI and interfaces with other NSP systems in preparation for Site Acceptance Testing (SAT).
- Site Acceptance Testing will be on August 15.

Color Legend		
	Red	Project has significant risk to baseline cost, schedule, or project deliverables. Current status requires immediate escalation and management involvement. Probable that item will NOT meet dates with acceptable quality without changes to schedule, resources, and/or scope.
	Yellow	Project has a current or potential risk to baseline cost, schedule, or project deliverables. Project Manager will manage risks based on risk mitigation planning. Good probability item will meet dates and acceptable quality. Schedule, resource, or scope changes may be needed.
	Green	Project has no significant risk to baseline cost, schedule, or project deliverables. Strong probability project will meet dates and acceptable quality.
	Gray	No report for the reporting period or the project has not yet been activated.