ACADEMIC AND STUDENT AFFAIRS COMMITTEE
APRIL 20, 2010
12:00 P.M.

WELLS FARGO PLACE
30 7TH STREET EAST
SAINT PAUL, MN

Please note: Committee/Board meeting times are tentative. Committee/Board meetings may begin up to 45 minutes earlier than the times listed below if the previous committee meeting concludes its business before the end of its allotted time slot.

Committee Chair McElroy calls the meeting to order.

(1) Minutes of March 17, 2010
(2) Academic and Student Affairs Update (pp. 1-13)
(3) Proposed Amendments to Board Policy 3.24 System and Institutional Missions (Second Reading) (pp. 14-17)
(4) Proposed Amendment to Board Policy 3.29 College and University Transcripts (Second Reading) (pp. 18-20)
(5) Proposed Amendment to Board Policy 3.26, Intellectual Property (First Reading) (pp. 21-31)
(6) Proposed Amendment to Board Policy 3.27, Reproduction and Use of Copyrighted Materials (First Reading) (pp. 32-35)
(7) Proposed Amendment to Board Policy 3.21 Undergraduate Course Credit Transfer (First Reading) (pp. 36-39)
(8) Follow-up to OLA Evaluation of the System Office (pp. 40-45)
- Impact of Cost-effectiveness of Online Instruction
- Customized Training and Continuing Education
- Specialized Training in Firefighting and Emergency Medical Services

(9) Centers of Excellence, Wilder Evaluation (pp. 46-99)

Members
Dan McElroy, Chair
Christine Rice, Vice Chair
Duane Benson
Cheryl Dickson
Jacob Englund
Louise Sundin
James Van Houten

Bolded items indicate action required.

MINNESOTA STATE COLLEGES AND UNIVERSITIES
BOARD OF TRUSTEES
ACADEMIC AND STUDENT AFFAIRS COMMITTEE
MARCH 17, 2010

Academic and Student Affairs Committee Members Present: *Chair Dan McElroy; Trustees Christine Rice, Duane Benson, Cheryl Dickson, Jacob Englund, James Van Houten and Louise Sundin.*

Other Board Members Present: *Trustees David Paskach, Ruth Grendahl, Scott Thiss, Thomas Renier and Christopher Frederick.*

Leadership Council Committee Co-Chairs Present: *Senior Vice Chancellor Linda Baer and President Patrick Johns.*

The Minnesota State Colleges and Universities Academic and Student Affairs Committee held a meeting on March 17, 2010, at Wells Fargo Place, 4th Floor, Board Room, 30 East 7th Street in St. Paul. Chair McElroy called the meeting to order at 8:03 am.

1. **Minutes of January 20, 2010**

   The minutes from the January 20, 2010 Academic and Student Affairs Committee Meeting were approved as written.

2. **Academic and Student Affairs Update – Senior Vice Chancellor Baer**

   - The Minnesota Student Engagement Institute (MSEI) in early March was attended by 135 people from all state colleges and the Office of the Chancellor. Colleges sent five-person teams to the institute. Teams included the college president, chief academic officer, student affairs officer, faculty leader, student success coordinator or institutional researcher.

     The institute was conducted by staff from the Center for Community College Student Engagement at the University of Texas, Austin. Center staff worked with the teams on interpreting the results of the Community College Survey of Student Engagement (CCSSE).

     The institute was one step in preparing colleges to seek resources for postsecondary success from the Federal "American Graduation Initiative" or other funding sources. Colleges are developing short-term action plans based on at least three "promising practices" such as learning communities; student success courses; supplemental instruction; and intrusive advising.

     Ultimately, these efforts by campus leaders will help leverage opportunities and support continued partnerships and collaborative activities in support of student success strategies and individual college work plans.

Trustee Van Houten asked how the college student engagement survey data is gathered and if online students are surveyed.

Associate Vice Chancellor Leslie Mercer said data is obtained by surveying a random sampling of students in the classroom. The questions require students to indicate a degree of student satisfaction and engagement. Results from the most recent survey soon will be put on the system's accountability dashboard.

While this survey tool gathers data from students in the classroom, there is another student survey instrument which is used to gather data from online students, she said. She also noted that CCSSE plans to add an online student component to the survey.

3. Proposed Amendments to Board Policy 2.6, Intercollegiate Athletics (Second Reading)

This was the second reading of this policy which clarifies that Board of Trustees' approval, following a recommendation by the Chancellor, is required for a state college or university to add a sport at the Division 1 level. The amendment also requires student athletes to have adequate health insurance.

Trustee Van Houten noted that this amendment is not meant to discourage colleges or universities from participating in Division 1 athletics. Rather, this is a way to ensure schools are aware of the added costs associated with that level of competition prior to membership.

A motion was made by Trustee Dickson, seconded by Trustee Benson and carried that the Academic and Student Affairs Committee recommend that the Board of Trustees approve the following motion:

The Board of Trustees approves the proposed amendment to Policy 2.6 Intercollegiate Athletics.

4. Proposed Amendment to Board Policy 3.30, College Program Advisory Committees (Second Reading)

This was a second reading of this policy pertaining to colleges' use of advisory committees. Policy changes are being made in response to the Office of Legislative Auditor's (OLA) report on occupational programs which recommended that colleges provide better oversight of program advisory committees and take steps to improve those that are not fulfilling their potential.

Associate Vice Chancellor Mike López said since the first reading of the policy, language was added which more clearly defines the duties of advisory committees. New language also clarifies that credit-based academic programs determined by a college to be preparation for initial or continued employment

shall have an advisory committee and that one advisory committee may serve more than one program provided that committee members possess requisite knowledge and skills relevant to the programs.

Also added to the policy is language indicating that the Chancellor shall assess compliance with this policy and post this information on the web. Findings will be considered in presidential evaluations conducted by the Chancellor.

A motion was made by Trustee Van Houten, seconded by Trustee Englund and carried that the Academic and Student Affairs Committee recommend that the Board of Trustees approve the following motion:

The Board of Trustees approves the proposed amendment to Policy 3.0 College Advisory Program Committees.

5. Normandale Community College Mission Statement Approval

Presenter:
Joe Opatz, President, Normandale Community College

President Opatz said Normandale Community College's mission and vision were last reviewed by the Board of Trustees in 1997. An intensive review of the previous mission began in January 2008 at a campus development day, he said. General feedback at that time included dissatisfaction with the absence of teaching and learning in the mission statement, with the "urban" designation and with vagueness of key phrases.

The review and consultation process used to revamp the mission and value statements involved college administrators, faculty, staff, students and advisory committee members. Also involved were community members and college stakeholders, including K-12 partners and business leaders. He said the new mission and vision statements adhere to the college's strategic goals and values, as well as those in the system's strategic mission.

The proposed new mission statement is: "Normandale Community College advances individuals' intellectual, career and personal development by providing outstanding teaching and support."

The proposed new vision statement is: "Normandale Community College will be a recognized leader in academic excellence, student support, and community and workforce development."

A motion was made by Trustee Rice, seconded by Trustee Benson and carried that the Academic and Student Affairs Committee recommends that the Board of Trustees approve the Normandale Community College vision, mission, purposes and array of awards as listed in the executive summary.

6. Proposed Amendment to Board Policy 3.24, System and Institutional Missions (First Reading)

This was a first reading of an amendment to the policy pertaining to system and institutional missions. This amendment is in response to the OLA Study findings related to the frequency of mission approvals and alignment of college mission statements with system and industry needs.

The amendment would require a first and second reading of requests for a change in mission allowing the authority to offer a new award. The amendment also would give the Chancellor the authority to approve minor revisions to an approved mission and vision statement.

The Trustees had a discussion pertaining to the frequency of mission reviews for colleges and universities, as well as for the system. Trustee Benson said some accreditation cycles are 10 years and that is too long of a time span between reviews.

The consensus of the committee was that mission and vision reviews for the system, as well as its colleges and universities, should take place every five years.

Trustee Van Houten suggested that if the Chancellor approves a minor revision to a mission or vision that it be reported to the Board.

Trustee Dickson asked for a word change in the amendment pertaining to review of the system's mission. Rather than stating that the mission and vision shall align with state needs, she suggested the wording be changed to "meet the needs of the people."

Trustee Dickson said when mission and vision statement changes are submitted for consideration, she would like to see a side-by-side comparison of the old and new statements. She added that she considers reviewing mission and vision changes as one of the most important things Trustees do since it updates them on the changing focus and goals of each college and university.

7. Proposed New Board Policy 3.28, Career Information (First Reading)

This is a first reading of a policy on career information. This policy was prompted by a recommendation in the OLA Study that the Board of Trustees should, by policy, require colleges to ensure that career and job information is getting to students in occupational programs.

Associate Vice Chancellor Mike López said career and occupational information already exists in various forms, including a variety of websites. This policy would require that occupational program students receive information as to where this career information is located.

Trustee Van Houten said this is a solid policy since it is proactive in ensuring students receive information.

Trustee Frederick asked why four-year universities are not included in the policy.

Associate Vice Chancellor Mike López said the policy council's consensus was to remove this requirement for universities since the OLA report recommendations were aimed at colleges, not universities. He added it may be difficult to provide specific job data or career information to some students, such as those in liberal arts programs, since their future occupation may not be as clearly defined as it is for students in technical programs.

Trustees agreed that the policy language should be altered so that it also applies to students in occupational or professional programs at state universities.

8. Proposed Amendment to Board Policy 3.29, College and University Transcripts (First Reading)

This was the first reading of this policy amendment which would designate the eTranscript within the Integrated Statewide Records System (ISRS) as an official transcript for students transferring within the system.

The eTranscript was developed as a way of streamlining the transfer process. Transcript information will be transferred automatically, so students will not have to request a transcript or pay a fee. The e-Transcript will be considered an "official" transcript in the system.

Associate Vice Chancellor López said the eTranscript cannot be shared with colleges or universities outside the system since that would require access to the system's database. They are looking at other ways to electronically transfer transcript data to non-system institutions, he said.

9. Follow-up to OLA Evaluation of the System Office

The recent OLA review of the Office of the Chancellor identified six "areas of concern" related to the system's Academic and Student Affairs (ASA) activities. Senior Vice Chancellor Baer offered an overview of those areas and said that in-depth discussions of each area will occur at committee meetings in April, May and June.
Areas indentified were:

- Impact and cost-effectiveness of online education
- Oversight of customized training and continuing education
- Oversight of specialized training in firefighting and emergency medical services
- System-wide academic planning and curriculum development
- Approvals of campus proposals to begin, revise or close programs
- Faculty professional development.

Senior Vice Chancellor Baer said the report is being seen as a way to achieve continuous improvement and that all ASA units and projects benefit from presidential feedback. She said the report indicates mixed opinions about services provided by ASA, which may be caused by the diversity of institutions, their history prior to merger and their mission. There continues to be tension between centralization and autonomy, she said.

Trustee Benson said he would prefer to see a focused response to the report. Staff should review and prioritize the findings, bringing those of the biggest concern back to the Board and initiating a commentary with the OLA on the others.

Trustee Rice said it would be difficult to offer opinions on the oversight of customized training or firefighting and emergency services without more specific information pertaining to costs and staff numbers in those areas.

The finance or audit division should be involved in the study of online education cost-effectiveness, Trustee Thiss said.

Noting that there have been concerns expressed pertaining to the size and operational costs of the system office, Trustee Sundin asked which committee will be considering these areas. Chair McElroy said he would check with the Chair regarding committee assignments.

Chair McElroy said while the expectation is that the Academic and Student Affairs Committee address the six issues assigned to it, the time and emphasis given to each should vary.

10. Centers of Excellence Update

Presenters:
Ron Bennett, Executive Director of the Minnesota Center for Engineering and Manufacturing Excellence
Nicholas Dawek, computer forensics major at Metropolitan State University
Laura Beeth, System Director of Talent Management, Fairview Health Services
Dennis Siemer, Chief Executive Officer, V-Tek, Incorporated
James Wendorff, Vice President of Human Relations, Viracon, Inc.

In 2005, Minnesota State Colleges and Universities established Centers of Excellence at four state universities and 21 community and technical colleges.

The four centers area:

- HealthForce Minnesota, Winona State University
- Advance IT Minnesota, Metropolitan State University
- 360° Manufacturing and Applied Engineering Center of Excellence, Bemidji State University

- Minnesota Center for Engineering and Manufacturing Excellence, Minnesota State University, Mankato

Wilder Research will provide an evaluation of the Centers of Excellence to the Board of Trustees in April. This presentation was to provide background information on the work and accomplishments of the four centers.

Over the past four years, the centers have focused on investments to recruit and retain students, improve the skills of workers, upgrade equipment, support faculty development, link programs and develop new curriculum. They have built connections among K-12 schools, community and technical colleges, state universities and leading employers.

Presenters offered comments on their experiences with the Centers of Excellence:

- Dennis Siemer is Chief Executive Officer at V-Tek, Inc, an international pioneer in the development and manufacturing of electronic components in packaging and processing. He said the state needs a skilled workforce which has lifelong access to technical education in order to be a viable player in the global marketplace.

  He said it is remarkable what the centers of excellence have accomplished and if they don't move forward, the state will risk not only the loss of future jobs, but industry commitment as well. Business leaders recognize the importance of careful allocation of funds, but they also know it is important to invest in projects and activities that prepare workers and the state for the future in this global economy, he said.

- Computer forensics student Nicholas Dawek said he was introduced to the Advance IT Minnesota Center of Excellence early in his student life at Metropolitan State University. He attended workshops on resume building and networking and that helped him land an internship at Blue Cross Blue Shield working in Information Technology (IT) security. He now is employed at the Minnesota Department of Revenue and he said he owes a great deal to the center for providing career guidance and direction.

- James Wendorff, Vice President of Human Resources at Viracon, an Owatonna-based producer of high-performance architectural glass products available worldwide, said one of the biggest challenges in the manufacturing industry is finding qualified workers. He said he has worked primarily with the 360° Manufacturing and Applied Engineering Center of Excellence and has been impressed with the coordination and focus it provides.

  He said his business is hiring more qualified people than before the centers existed. The centers of excellence were a needed investment in the economy of the state and are having an impact, he said. If they were to go away, that would send a negative message to business and industry.

- Laura Beeth, system director of Talent Management at Fairview Health Services, said the HealthForce Minnesota Center of Excellence is helping the health care industry in the state recruit and employ talented people. A central platform where educators and industry players can come together to plan and implement workforce strategies is essential, she said.

  An example of a successful center initiative is scrub camps for high school students, which introduce young people to various opportunities in the health care field, she said. A similar camp aimed at adult, unemployed people is planned for this summer.

  The partnerships fostered by the center are real, active and valuable to the state since they are helping to produce needed skilled workers in the health care industry, she said.

- Ronald Bennett, Executive Director of the Minnesota Center for Engineering and Manufacturing Excellence, said the centers have built an integral infrastructure of people and institutions across industry, higher education and government. This infrastructure will put the state at the leading edge of change and will have a significant impact on the economy of Minnesota, he said.

11. Campus Profile – North Hennepin Community College

Presenter:
Ann Wynia, President

Strategic Campus Profiles are presented to showcase each institution in the system. The profiles include information on integrated planning, institutional programming and collaboration, futures planning, facilities projects and other data.

North Hennepin Community College has been a leading provider of education in the northwest metropolitan area of the Twin Cities since 1966. It is located in Brooklyn Park and classes are also offered at Buffalo High School, area workforce centers and business locations.

Enrollment
North Hennepin serves more than 9,944 students with credit offerings (a 37 percent increase in the last decade) and an additional 6,000 people from over 300 organizations with non-credit offerings.

The college's increasing diverse student body includes 31 percent students of color (4th highest in MnSCU) and more than 1,000 students originally from other countries and 84 international students with F-1 visas. Seventy-one percent of students are first-generation. Forty-three percent of the students are classified as

low income by federal standards and 40 percent of the students receive financial aid.

The average class size is 25. Fifty-seven percent of NHCC students are female and the average age is 26. During the 2009 academic year, 70 percent of our students were part-time, while 21 percent attended college full time. Online education is growing with approximately 3,400 students taking at least one online course.

There are 475 Post Secondary Enrollment Option (PSEO) students taking college classes from area high schools and 246 students taking classes at the Buffalo site. The college's unique Every-Other-Weekend College program accommodates more than 1,350 working adults.

Educational Offerings

North Hennepin Community College is an open enrollment institution which grants associate's degrees and certificates in liberal arts and career programs. The college also provides non-credit continuing education and customized training for business and industry. A number of baccalaureate and master's degrees are offered on campus through university partnerships.

NHCC offers more than 70 majors of study with 13 degree and certificate programs fully online. The majority of classes are offered in the classroom, during the day, on a traditional16-week semester schedule.

- **Degrees offered:** Associate in Arts (A.A.) degree, Associate in Arts (A.A.) degree with an emphasis in History, Associate in Fine Arts (A.F.A.) degree, Associate in Science (A.S.) degrees, and Associate in Applied Science (A.A.S.) degrees.
- **Largest programs:** Liberal arts and general studies, nursing, business, law enforcement/criminal justice, paralegal.
- **Unique programs:** A.S. degree programs in Chemistry, Biology, Math, Nursing, business and Individualized Studies, Every-Other-Weekend College, Business ASAP (Associate in Science Accelerate Program); Chemical Technology; and Medical Laboratory Technology.

Budget

NHCC's General Fund operating budget in FY09 was $35,290,289. Tuition receipts at $20,181,176 were the largest source of operating revenue. Based upon the 2008 Instructional Cost Study, the College's indirect cost per student FYI ranked fifth lowest at $3848 making it one of the most efficiently operating colleges in the system.

Facilities

NHCC is tied with Century for third highest space utilization of all MnSCU institutions at 110.8%.

The college shows good stewardship of state dollars with significant reductions in deferred maintenance over the past few years. Spending on repair and replacement averages to $1.54 per gross sq. ft. over the past five years. NHCC has two projects in the current bonding bill, including the renovation of and the additional to the existing Center for Business and Technology and construction of a new BioScience and Health Careers Center. Hennepin County is interested in constructing a new public library on the college's vacant property just north of 85th Avenue North.

Success

NHCC has a strong focus on student success. Retention has improved with the adoption of First Year Experience strategies such as Leaning Communities, the GPS Lifeplan, Student Success Day and Success Workshops. Approximately 50% of NHCC students graduate or transfer to another institution. Of 2003 transfer students, 88 percent transferred to Minnesota institutions with 23 percent continuing their education at the University of Minnesota.

NHCC Nursing students had the highest pass rate in the state of Minnesota in 2008 with 97.4 percent.

Fundraising

The NHCC Foundation sponsors college events and fund raising initiatives – such as the annual fund drive – to support students scholarships at the college. Recent events include Breakfasts with the President, the Annual Dinner Auction, and a Faculty Golf Tournament.

Collaboration

NHCC regularly communicates with other higher education institutions to develop joint programs and transfer opportunities for students.

- Articulation agreements exist with more than 17 colleges and universities for more than 24 programs, degrees, and certificates, including a new honors program;
- Through partnership with Minnesota State University Moorhead, bachelor's degrees in Biotechnology, Operation Management and Construction Management are offered;
- Through partnership with Metropolitan State University and the University of Wisconsin - Green Bay, a bachelor's degree in nursing (AD to BSN) program are offered;
- NHCC has clinical sites with hospitals in the Twin Cities, Buffalo, Cambridge, St. Cloud and Shakopee for the Nursing, and MLT programs;
- Medical Laboratory Technology (MLT) and Histotechnology are joint programs with Allina Hospital and Clinics;

Institutional Distinction

North Hennepin Community College is located in Brooklyn Park, Minnesota – the rapidly growing Northwest metropolitan area including the communities of

Brooklyn Park, Maple Grove, Osseo, Champlin, Brooklyn Center, New Hope, Robbinsdale, Crystal, Plymouth, Minneapolis, Fridley, Blaine, Spring Lake Park, Coon Rapids, Corcoran, Rogers, St. Michael, Buffalo, Rogers, Elk River, Monticello, Dayton and other surrounding communities.

- **Qualified highly-credentialed faculty and staff** who are eager to help students succeed. In 2008, NHCC chemistry faculty, Dr. Eugenia Paulus was the first and only recipient of the Carnegie Foundation U.S. Professor of the Year award in any category from the State of Minnesota
- **Solid Liberal Arts focus** including a wide variety of class offerings that meet the Minnesota Transfer Curriculum goal areas and assist students in easy transferability to the university of their choice
- **Flexible class delivery options**, including traditional, accelerated, web-enhanced, online and off-campus classes in the morning, afternoon, evening, and on weekends;
- Thirty-four students participating in **Undergraduate Research** projects in the past two years - presenting 37 times at 12 research conferences in 5 states. Our students have received awards from the American Chemical Society and have been placed in prestigious undergraduate research internships. North Hennepin is one of the only community colleges in the country to offer undergraduate research and will be the first community college ever to host the Minnesota Academy of Sciences Winchell Undergraduate Research Symposium in 2011.
- **Specialized Program Accreditation** for Business, Medical Laboratory Technician, Nursing, Paralegal, and Peer Tutoring Programs set NHCC apart from other competitive programs in the state
- **University partnerships** that allow students to complete a number of 4-year degrees on the NHCC campus, eliminating the need for them to either pay higher tuition at a local private institution or re-locate to an outstate MnSCU university to complete their educational goals.
- **New Technology** (such as D2L, Right Now, Sharepoint, Sitecore CMS, Hobson's, Lumens, Higher One, EARS - Early Alert Reporting System, Email, Texting, Instant Messaging, Phone systems, Facebook, etc.) is constantly considered and implemented for improved service and communication to students and increased efficiency for faculty and staff
- **K-12 partnerships** such as Upward Bound, High School Transitions, Cornerstones, and STARS programs, provide an opportunity for area high school students to prepare for college through academic and advising activities on and off-campus
- **TRiO** utilizes a national grant to provide additional support and services to approximately 250 under-represented students who meet program requirements
- **Adult Education and Training** provides flexible training delivery options for learners, businesses, and communities to develop and maximize professional skills and personal growth, emphasizing IT and professional development. Eighty percent of all AET classes are offered onsite at NHCC, at an area workforce center or at a client's site. NHCC

has a partnership with a 3rd party provider (ed2go) for delivery of non-credit online classes and programs.

Institutional Profile

NHCC partners with business, education and community organizations. These relationships are cultivated and supported through a variety of means including Campus Outreach, Academics, Adult Education and Training, Foundation, Service Learning, Special Programming and Advisory Boards.

According to an Economic Impact Study conducted in 2007, North Hennepin Community College adds an estimated $121,740,682 per year in activity to the local economy and adds an estimated 1,603 jobs in the area.

Integrated Planning

NHCC aligns its strategic planning with MnSCU's strategic plan, makes use of staff at the system office to ensure that the College's policies and procedures align with Board Policy, participates in the state audit of business and budgetary practices, and uses reporting processes to benchmark its outcomes against the accountability measures of the system.

Futures Planning – 2015

North Hennepin Community College is committed and focused on institutional strategic goals and continuous improvement initiatives through AQIP action projects.

Much future planning depends on the current bonding bill approval of two new buildings that would allow North Hennepin to continue to expand its facilities to meet the growing needs of the communities we serve.

Resource Deployment

North Hennepin Community College's budget strategy for the future includes maintaining a structurally balanced budget, reallocation of resources to highest priority activities.

The college will continue to conduct regular academic program and service review and use data to make the best possible decisions. Cost analyses of class scheduling, faculty/student classroom ratios, services, early retirement packages, hours of operations, and other major college functions will be performed with the intention of increasing efficiency and discontinuing programs as needed. NHCC will:

- Maintain a structurally-balanced budget
- Hold tuition rates at metro system average increases
- Designate a 7% reserve-to-operating revenue ratio
- Support system strategies and college action plans
- Invest in fewer new ongoing obligations
- Provide high quality academic programming
- Use various funding sources in student success initiatives

- Provide students the newest technology
- Invest in continuous improvement, utilizing AQIP model
- Manage increasing enrollment with minimal staff increases
- Utilize available resources to continue supporting capital projects, facilities upgrades maintenance

To combat decreasing state support, the college will continue to use creative pricing strategies, flexible programming and services that meet the changing needs of our students, enrollment management techniques, increased effort in seeking external funding and partnerships, shared business operations when possible, cost-effective employment strategies and revised academic calendar and scheduling.

Trustee Dickson asked President Wynia to pass along her praise and admiration to faculty who mentor research students while carrying a full teaching load. That shows an outstanding dedication to higher education, she said.

Trustee Rice complimented the leadership of President Wynia, who will be retiring this summer. She said the president has done an amazing job transforming North Hennepin Community College into a first-rate college that caters to its students and reaches out to its community.

President Wynia has been an outstanding leader, advisor and contributor on the leadership team, Chancellor McCormick said.

Anoka-Ramsey Community College President Johns said President Wynia has been an exceptional peer who has offered wise advice to fellow presidents.

The meeting adjourned at 11:03 am
Respectfully submitted,
Margie Takash, Recorder

MINNESOTA STATE COLLEGES AND UNIVERSITIES
BOARD OF TRUSTEES

Agenda Item Summary Sheet

Committee: Academic and Student Affairs **Date of Meeting:** April 20, 2010

Agenda Item: Proposed Amendment to Board Policy 3.24 System and Institutional Missions (Second Reading)

[X] Proposed Policy Change	[ ] Approvals Required by Policy	[ ] Other Approvals	[ ] Monitoring

[ ] Information

Cite policy requirement, or explain why item is on the Board agenda:

Amendments to Board Policy require approval of the Board.

Scheduled Presenter(s):

Linda L. Baer, Senior Vice Chancellor for Academic and Student Affairs
Leslie K. Mercer, Associate Vice Chancellor for Research, Planning, and Effectiveness

Outline of Key Points/Policy Issues:

- The Board of Trustees conveyed interest in better articulating expectations for a change in mission leading to new award authority including a first and second reading of such a request.
- The Office of Legislative Auditor Study of MnSCU Occupational Programs conducted in 2009 included findings related to the frequency of mission approvals and alignment of college mission statements with system and industry needs.

Background Information:

The proposed policy is a second reading to amend policy 3.24 System and Institutional Missions. Development of the proposed policy followed standard policy revision processes. After approval of the amended policy by the Board of Trustees, procedure 3.24.1 – System and Institutional Missions will be submitted to the Chancellor for approval.

Second Reading

MINNESOTA STATE COLLEGES AND UNIVERSITIES
Board Action Item

Proposed Amendment to Policy 3.24 System and College and University Missions

The Office of the Chancellor is submitting a proposed amendment to Policy 3.24 System and Institutional Missions.

BACKGROUND
The proposed policy amendment and a related proposed system procedure primarily respond to the following interests of the Board of Trustees:

1. The Board of Trustees Academic and Student Affairs Committee suggested that institutional requests for a change in mission for new award authority require a first and second reading of the Board of Trustees.
2. The 2009 Office of the Legislative Auditor's report titled MnSCU Occupational Programs addressed the consistency of mission reviews was an area of potential improvement and recommended that: "All MnSCU college statements of mission, vision, and purpose, as well as their high-level planning documents, should clearly reflect the priorities set in state law and decisions of the Board of Trustees."

CONSULTATION
Consultation for the policy and procedure has occurred as follows:
Reviewed by Academic & Student Affairs Policy Council – 1/21/10
Reviewed at Academic and Student Affairs Leadership Council – 01/05/10
Mailed out for review and comment – 2/26/10
Review and comment at IFO Meet and Confer – 2/5/10
Review and comment at MSUAASF Meet and Confer – 2/12/10
Review and comment at MSCF Meet and Confer – 02/25/10

RECOMMENDED COMMITTEE ACTION
The Academic and Student Affairs Committee recommend that the Board of Trustees adopt the following motion:

RECOMMENDED MOTION
The Board of Trustees approves the proposed amendment to Policy 3.24 System and Institutional Missions.

Second Reading

BOARD POLICY		3.24
Chapter	3.	Educational Policies
Section	24.	System and Institutional Missions

3.24 System and ~~Institutional~~ College and University Missions

Part 1. Purpose. The purpose of this policy is to establish conditions and processes for the review of system and college and university missions.

Part 2. Definitions. The following definitions apply to this policy and related procedure.

Mission: Mission means the distinct purpose of the college or university, the constituents served and the expected outcomes, values and goals, and aspects such as institution culture, decision making processes, and the principles and behaviors to reach aspirational outcomes.

Vision: Vision means the aspirations of the college or university, the primary products or services, the distinctive or unique attributes of the college or university, and assumptions about the college and university and its environment in the future.

Part 3~~1~~. Review and Approval of the ~~MnSCU~~ System Mission and Vision. The Board of Trustees shall review, revise as appropriate, and approve the system mission and vision at least once every five years. The mission and vision shall advance the higher education needs of the state. The Board of Trustees shall assure there is consultation with faculty, students, employers and other essential stakeholders. The Chancellor shall promulgate procedures for the development of the system mission and vision.

Part 4~~2~~. Review and Approval of ~~MnSCU Institutional~~College and University Mission and Vision Statements. ~~The Board of Trustees shall approve each~~ College or university~~institution's~~ mission and vision statements require Board of Trustees approval at least once every five years.~~and purposes.~~ The Chancellor shall have authority to approve minor revisions to an approved mission and vision statement. A college's or university's~~n institution's~~ mission and vision~~, and purposes~~ shall support achievement of the ~~MnSCU~~ system mission and vision and shall provide a foundation for evaluation, accountability, and regional accreditation. The Chancellor shall promulgate procedures to guide the Board of Trustees' review and approval of ~~institutional~~ a college or university mission~~s~~ and vision~~s, and purposes~~. Each ~~institution~~college or university, with consultation from faculty, students, employers and other essential stakeholders, shall be given considerable latitude to express its mission and vision~~, and purposes~~.

Part 5. Academic Award. A change in authority to confer an academic award is subject to approval by the Board, following a first and second reading in accordance with Policy 1A.1 Part 6, Subpart A.

Part 6~~3~~. Alignment of ~~Between MnSCU Institutional~~College and University Missions And ~~Higher Education Needs in Minnesota~~ Visions. The Chancellor shall report to the Board of

Trustees on the alignment of ~~institutional~~ college and university missions and visions with the system mission and vision and with Minnesota's higher education needs, statutory authority, structure and resources at least once every five years. Based on this review, which shall include consultation with faculty and staff, students, employers and other essential stakeholders, the Board may redirect a college's or university's ~~n institution's~~ mission and vision to advance regional and statewide higher education interests.

Date of Implementation: 07/01/99
Date of Adoption: 06/16/99
Date and Subject of Revision:

POLICY CONTENT FORMAT:
Single underlining represents proposed new language.
~~Strikeouts~~ represent existing language proposed to be eliminated.
Words not underlined represent existing language that is proposed to remain in policy.

MINNESOTA STATE COLLEGES AND UNIVERSITIES
BOARD OF TRUSTEES

Agenda Item Summary Sheet

Committee: Academic and Student Affairs **Date of Meeting:** April 20, 2010

Agenda Item: Proposed Amendment to Board Policy 3.29 College and University Transcripts (Second Reading)

[X] Proposed Policy Change [ ] Approvals Required by Policy [ ] Other Approvals [ ] Monitoring

[ ] Information

Cite policy requirement, or explain why item is on the Board agenda:

Amendments to Board Policy require approval of the Board.

Scheduled Presenter(s):

Linda L. Baer, Senior Vice Chancellor for Academic and Student Affairs
Mike López, Associate Vice Chancellor for Student Affairs

Outline of Key Points/Policy Issues:

The proposed amendment designates the eTranscript within the Integrated Statewide Record System (ISRS) as an official transcript for students transferring within the system.

Background Information:

The eTranscript was developed as a way of streamlining the transfer process for students transferring within the system. With the eTranscript a student does not have to request that a transcript be sent from the original college or university; the transfer of information is done automatically. Moreover, the student does not have to pay a fee to have a transcript sent. Because this is a new technology, questions about its status as an "official" transcript have been raised. The amendment is intended to resolve any issues about the status of the eTranscript.

Second Reading

BOARD OF TRUSTEES
MINNESOTA STATE COLLEGES AND UNIVERSITIES

BOARD ACTION
Proposed Amendment to Policy 3.29 College and University Transcripts

The Office of the Chancellor is submitting a proposed amendment to Policy 3.29 College and University Transcripts.

BACKGROUND

The eTranscript was fully deployed within Minnesota State Colleges and Universities during fall semester of 2009. Students, as well as staff in Admissions and Registrars offices have welcomed this new technology. However, because this new technology lacks the usual indicators of "official" transcripts, such as an embossed seal, the proposed amendment is intended to settle any questions about the official nature of the eTranscript.

CONSULTATION

Consultation for the policy and procedure is planned or has occurred as follows:

- Reviewed by combined Single Registration and Single Application Subject Matter Expert Working Groups of Students First- January 12, 2010
- Reviewed by Academic & Student Affairs Policy Council – January 21, 2010
- Reviewed at Academic and Student Affairs Leadership Council – March 2, 2010
- Mailed out for review and comment – February 26, 2010
- Reviewed at MSCF Meet and Confer – February 25, 2010
- Reviewed at IFO Meet and Confer- February 5, 2010
- Reviewed at MSUAASF Meet and Confer- February 12, 2010

RECOMMENDED COMMITTEE ACTION

The Academic and Student Affairs Policy Committee recommend that the Board of Trustees adopt the following motion:

RECOMMENDED MOTION

The Board of Trustees approves the proposed amendment to Policy 3.29 College and University Transcripts.

Second Reading

BOARD OF TRUSTEES
MINNESOTA STATE COLLEGES AND UNIVERSITIES

Board Policy	**3.29**
Chapter 3. Educational Policies	
Section 29. College and University Transcripts	

3.29 COLLEGE AND UNIVERSITY TRANSCRIPTS.

Part 1. Uniform Paper Transcript. In furtherance of a common system identification, Minnesota State Colleges and Universities shall use a uniform format for their official paper transcripts.

Part 2. Paper Transcript Format. The Chancellor shall establish a procedure for a uniform paper transcript format for Minnesota State Colleges and Universities.

Part 3. Electronic Transcript (eTranscript). In lieu of an official paper transcript, system colleges and universities shall use the eTranscript within the Integrated Statewide Record System to document previous academic work completed by students transferring between system colleges and universities. The Chancellor shall establish a procedure to guide the implementation and use of the eTranscript.

Date of Implementation: 7/1/05
Date of Adoption: 1/20/05

POLICY CONTENT FORMAT:
Single underlining represents proposed new language.
~~Strikeouts~~ represent existing policy language proposed to be eliminated.
Words not underlined represent existing policy language that is proposed to remain in policy.

MINNESOTA STATE COLLEGES AND UNIVERSITIES
BOARD OF TRUSTEES

Agenda Item Summary Sheet

Committee: Academic and Student Affairs **Date of Meeting:** April 20, 2010

Agenda Item: Proposed amendment to Board Policy 3.26 Intellectual Property (First Reading)

[X] Proposed Policy Change
[ ] Approvals Required by Policy
[ ] Other Approvals
[ ] Monitoring
[ ] Information

Cite policy requirement, or explain why item is on the Board agenda:

Amendments to Board Policy require approval of the Board.

Scheduled Presenter(s):

Linda L. Baer, Senior Vice Chancellor for Academic and Student Affairs
Gary Hunter, System Director for Intellectual Property

Outline of Key Points/Policy Issues:

Board Policy 3.26 Intellectual Property addresses the ownership of intellectual property within the System and the current amendment seeks to clarify the policy.

1. Adding the definition of "Faculty" in order to identify the employees who are entitled to own their scholarly works.
2. Deleting the term "Professional Staff" throughout the policy to reflect the "work made for hire" language in federal copyright law.

Background Information:

The review of Board Policy 3.26 Intellectual Property was undertaken as part of the normal policy review process. The proposed amendment was developed from input by a policy review committee comprised of representatives from technical and community colleges, universities, labor unions, and the Office of the Chancellor along with input from other constituents within the System.

First Reading

BOARD OF TRUSTEES
MINNESOTA STATE COLLEGES AND UNIVERSITIES

BOARD ACTION

Proposed Amendment to Board Policy 3.26 Intellectual Property

The Office of the Chancellor is submitting a proposed amendment to Policy 3.26 Intellectual Property.

BACKGROUND

A policy review committee was convened in September and met in October, November and December of 2009. A fourth meeting was added in January of 2010 to allow further opportunity for constituent groups to provide input on the proposed amendment. Various stakeholders throughout the System have been consulted with during the past six months.

CONSULTATION

Consultation has occurred as follows:

- Reviewed by the Academic and Student Affairs Policy Council- 1/21/2010 and 3/19/2010.
- Reviewed at Minnesota State College Faculty (MSCF) meet and confer- 2/25/2010.
- Mailed out for review and comment – 3/25/2010.
- Review and comment at Inter Faculty Organization (IFO) meet and confer – 3/26/2010.
- Reviewed at Leadership Council- 4/6/2010.
- Reviewed and comment at Minnesota State University Association of Administrative and Service Faculty (MSUAASF) meet and confer- 4/9/2010.
- Planned for review and comment at IFO meet and confer- 4/26/2010.
- Planned for review and comment at MSCF meet and confer- 5/6/2010.

RECOMMENDED COMMITTEE ACTION

The Academic and Student Affairs Policy Committee recommends that the Board of Trustees adopt the following motion:

RECOMMENDED MOTION

The Board of Trustees approves the proposed amendment to Policy 3.26 Intellectual Property.

First Reading

BOARD OF TRUSTEES
MINNESOTA STATE COLLEGES AND UNIVERSITIES

BOARD POLICY		**3.26**
Chapter	3.	Educational Policies
Section	26.	Intellectual Property

3.26 Intellectual Property

Part 1. Policy Statement. The ~~Minnesota State Colleges and Universities~~ Board of Trustees endeavors to develop and maintain a post-secondary educational system marked by academic excellence. Research and development of original works and inventions that require intellectual property protection are a vital part of the academic community. The Board ~~of Trustees~~ recognizes and acknowledges that system colleges and universities~~MnSCU institutions~~ may create or commission the creation of such works on its behalf and incorporates in~~adopts as~~ Board~~its~~ policy the traditional commitment to faculty and student ownership in scholarly work.

Part 2. Applicability. This policy applies to ~~agreements between~~ colleges, universities, the Office of the Chancellor and their respective employees, student employees and students.

Part 3. Definitions. For the purposes of this policy, the following words and terms shall have the meanings given them:

Subpart A. Agreement. Agreement when used in this policy means a signed written contract between or among a corporation, business, ~~an~~ individual(s) ~~or individuals~~ and a college~~, or~~ university or the System, but does not mean a sponsorship agreement or a collective bargaining agreement between the ~~Minnesota State Colleges and Universities~~ Board ~~of Trustees~~ and an exclusive bargaining representative.

Subpart B. Collective ~~B~~bargaining ~~A~~agreement. A collective bargaining agreement means a negotiated contract between the ~~Minnesota State Colleges and Universities~~ Board ~~of Trustees~~ and a specific bargaining unit.

Subpart C. College or ~~U~~university. College or university, except where specifically defined otherwise, means a ~~MnSCU~~system college or ~~,~~ university~~., Office of the Chancellor or system~~.

Subpart D. College, ~~U~~university or Office of the Chancellor ~~R~~resources. College, university or Office of the Chancellor resources means services and all tangible resources including buildings, equipment, facilities, computers, software, personnel, research assistance, and funding.

Subpart E. Course ~~O~~outline. The course outline is the document approved by the college or university curriculum committee and shall include the course title, course description, prerequisites, total credits, lecture/lab breakdown, and student learning outcomes. (As referenced in **Board Policy 3.22** Course Syllabi.)

Subpart F. Course ~~S~~syllabus. The course syllabus is a document that contains the elements of the corresponding course outline, standards for evaluation of student learning~~,~~ and additional information ~~which~~ that reflects the creative work of the faculty member. (As referenced in **Board Policy 3.22** Course Syllabi.)

Subpart G. Creator/inventor. A creator is an individual or group of individuals who invent, author, discover, or are otherwise responsible for the creation of intellectual property. An inventor refers to the creator of an invention that may be patentable.

Subpart H. Employee. An employee is any person employed by the State of Minnesota as defined by Public Employees Labor Relations Act [PELRA].

Subpart I. Faculty. The term "Faculty" refers to full-time and part-time employees performing work in bargaining units 209 and 210 and employees who create works in their capacity as instructors when teaching courses to students for credits at system colleges and universities.

Subpart J. Intellectual ~~P~~property. Intellectual property is any work of authorship, invention, discovery, or other original creation that may be protected by copyright, patent, trademark, or other category of law.

Subpart K. Intellectual ~~P~~property ~~R~~rights. Intellectual Property Rights means all the protections afforded the owner or owners of an original work under law, including all rights associated with patent, copyright, and trademark registration.

Subpart L. Jointly ~~C~~created ~~W~~work. A jointly created work is one where two or more creators ~~authors~~ contribute to the work and intend that it result in a unified, single work.

Subpart M. ~~MnSCU or MnSCU~~ Minnesota State Colleges and Universities System. ~~MnSCU System, MnSCU, or System is t~~The public higher education system established at **Minnesota Statutes Chapter 136F**. ~~For purposes of this policy, MnSCU~~ The System includes the Board of Trustees, the Office of the Chancellor, the state colleges and universities, and any part or combination thereof.

Subpart N. Office of the Chancellor. Office of the Chancellor means the central administrative office under the direction and supervision of the chancellor and which is part of the Minnesota State Colleges and Universities System.

~~**Subpart N. Professional Staff**. Professional staff includes but is not limited to administrative staff (such as deans, directors, and vice-presidents) and technical staff, non-faculty researchers, teaching assistants and others not covered by a collective bargaining agreement.~~

Subpart O. Sponsor. A sponsor is a person, private sector company, organization, or governmental entity, other than the System~~MnSCU~~, that provides funding, equipment, or other support for a college, ~~or~~ university, or the Office of the Chancellor to carry out a specified project in research, training, or public service.

Subpart P. Sponsorship ~~A~~agreement. A sponsorship agreement is a written agreement between the sponsor and a college, university, and/or the Office of the Chancellor and may include other parties including the creator of the work.

Subpart Q. Student. A student is an individual who was or is enrolled in a class or program at any ~~MnSCU~~ system college or university at the time the intellectual property was created.

Subpart R. Student ~~E~~employee. A student employee is a student who is paid by any ~~MnSCU~~ system college, university, or the Office of the Chancellor for services performed. Graduate assistants and work-study students are student-employees.

Subpart S. Substantial ~~U~~use of ~~R~~resources. Substantial use exists when resources are provided beyond the normal professional, technology, and technical support supplied by the college, university, and/or Office of the Chancellor ~~and extended~~ to an individual or individuals for development of a project or program.

Subpart T. System. See Minnesota State Colleges and Universities System definition in Part 3. Definitions, Subpart N of this policy.

Subpart U. Works made for hire. Works made for hire means all work done by an employee within the scope of his or her employment or specially commissioned work.

Part 4. Ownership of Intellectual Property Rights.

Subpart A. Basic ~~O~~ownership ~~R~~rights of the ~~V~~various ~~T~~types of ~~C~~creative ~~W~~works. The ownership rights to a creation shall be determined generally by the provisions in Subpart A below, but ownership may be modified by an agreement, sponsorship agreement, or other condition described in Subpart B or Subpart C below.

1. **Institutional Works**. Intellectual property rights in institutional works belong to the college or university. Institutional works are works made for hire in the course and scope of employment by employees or by any person with the use of college or university resources, unless the resources were available to the public without charge or the creator had paid the requisite fee to utilize the resources. A course outline is an institutional work. A college, university or the Office of the Chancellor may enter into a written agreement with a non-faculty employee granting the employee ownership of a work that the parties agree is of a scholarly nature as described in Subpart A.2. Scholarly works ~~and encoded works~~ are not ~~included within the definition of~~ considered institutional works in accordance with applicable collective bargaining agreements.

2. **Scholarly Works**. Intellectual property rights in scholarly works belong to the faculty member~~,~~ or student ~~or professional staff~~ who created the work, unless an agreement, sponsorship agreement, or other condition described in Subpart B or C below provides otherwise. Scholarly works are creations that reflect research, creativity, and/or academic effort. Scholarly works include course syllabi, instructional materials (such as textbooks and course materials), distance learning works, journal articles, research bulletins, lectures, monographs, plays, poems, literary works, works of art (whether pictorial, graphic, sculptural, or other artistic creation), computer software/programs, electronic works, sound recordings, musical compositions, and similar creations.

~~3. **Encoded Works**. Intellectual property rights in encoded works belong to the faculty member or student who created the work, unless an agreement, sponsorship agreement, or other condition described in Subpart B or C below provides otherwise. Intellectual property rights in encoded works created by a professional staff member belong to the college or university unless an agreement, sponsorship agreement, or other condition described in Subpart B or C below provides otherwise.~~

~~4.~~3. **Personal Works**. Intellectual property rights in personal works belong to the creator of the work. A personal work is a work created by an employee or student outside his or her scope of employment and without the use of college or university resources other than resources that are available to the public or resources for which the creator has paid the requisite fee to utilize.

~~5.~~4. **Student Works**. a) Intellectual property rights in student works belong to the student who created the work. b) A creative work by a student to meet course requirements using college or university resources for which the student has paid tuition and fees to access courses/programs or using resources available to the public, is the property of the student. c) A work created by a student employee during the course and scope of employment is an institutional work and intellectual property rights to such creation belong to the college or university unless an agreement, sponsorship agreement, or other condition described in Subpart B or C below provides otherwise.

Subpart B. Modification of ~~B~~basic ~~O~~ownership ~~R~~rights. The general provisions for ownership of intellectual property rights set forth in Subpart A may ~~shall~~ be modified by the entering into a signed written agreement as provided in this subpart, following collaborative discussion among the affected parties.~~following provisions if any of these provisions is applicable to the situation.~~

1. **Sponsorship Agreement**. The ownership of intellectual property rights in a work created under a sponsorship agreement shall be determined by the terms of the sponsorship agreement. If the sponsorship agreement is silent on the issue of ownership of intellectual property rights, ownership will be determined under applicable law.

2. **Collaborative Agreement.~~ons/Partnerships.~~** A college, university or the System~~MnSCU and/or its colleges, universities~~ may participate in projects with persons, corporations, ~~organizations~~ and businesses to meet identified student, citizen, community and industry needs. Ownership rights pursuant to any collaboration ~~or partnership~~ shall be addressed pursuant to this policy.

~~3. **Equity Distributions**. In any instance in which MnSCU and/or its colleges or universities execute an agreement with an individual, corporation or other entity for economic gain using intellectual property owned by the colleges or university, the colleges or university is entitled to receive an equity distribution. The proceeds of the equity distribution shall be shared among the creators of the work as determined by this policy.~~

~~4.~~3.**Specially Commissioned Work Agreements**. Intellectual property rights to a work specially ordered or commissioned by the college or university from a faculty member~~, professional staff,~~ or other employee, and identified by the college or university, as a specially commissioned work at the time the work was commissioned, is a work made for hire and shall belong to the college or university. The college or university, and the employee shall enter into a written agreement for creation of the specially commissioned work.

~~5.~~4.**Substantial Use of ~~Substantial~~ Resources**. In the event a college~~, or~~ university or the Office of the Chancellor provides substantial resources to a faculty member ~~or professional staff member~~ for creation of a work that is ~~and the work was~~ not an institutional work created under a sponsorship agreement, individual agreement, or special commission, the college~~, or~~ university~~,~~ and/or the Office of the Chancellor and the creator shall own the intellectual property rights jointly in proportion to the respective contributions made. ~~Substantial circumstances exist when resources provided are beyond the normal support services extended individuals for development of work products.~~ Use of resources is considered substantial when the additional support received is beyond the normal support level made available by a college, university and/or the Office of the Chancellor to the individual in his or her position.

~~6. **Certain Encoded Works**. In the event a college or university hires a professional staff person to develop software or other encoded works, in the works. the encoded works created by such person shall be considered institutional works for which the college or university maintains ownership of the intellectual property rights.~~

Subpart C. Other ownership factors.

1. **Collective Bargaining Agreement**. In the event the provisions of this Policy and the provisions of any effective collective bargaining agreement conflict, the collective bargaining agreement shall take precedence.

2. **Jointly Created Works**. Ownership of jointly created works shall be determined by separately assessing which of the above categories applies to each creator, respectively. Jointly created works involving the ~~work and~~ contributions of students and/or student employees must be assessed considering this and other relevant categories of ownership rights as set forth above.

3. **Sabbatical Works.** Intellectual property created during a sabbatical is defined as a scholarly work. Typical sabbatical plans do not require the use of substantial college/university resources as defined in Part 2. Subpart S. of this policy. If the work created as part of an approved sabbatical plan requires resources beyond those normal for a sabbatical, the parties may enter into one of the applicable arrangements as set forth in Part 4. Subparts B. and C. of this policy.

4. **System, College or University Name.** Intellectual property rights ~~arising from~~associated with the ~~MnSCU~~System's identity, the identities of its colleges and universities, logos, and other indices of identity belong to the respective entity. Such rights may be licensed pursuant to reasonable terms and conditions approved by the Chancellor, presidents or their designees, respectively. System ~~MnSCU~~ employees may identify themselves with such title of their position as is usual and customary in the academic community; but any user of ~~MnSCU~~the System's or ~~its~~ a college's ~~and~~or university~~ie~~'s name, logo, or indicia of identity shall take reasonable steps to avoid any confusing, misleading, or false impression of particular sponsorship or endorsement by the System~~MnSCU~~, its colleges~~,~~ or universities. When necessary, specific disclaimers shall be included.

5. Works Owned Jointly by Colleges, Universities and the System. Colleges, universities and system ownership interests in jointly owned intellectual property shall be determined by the relative contributions made by each contributor - unless otherwise provided in a written agreement. The ownership interests may be expressed in percentages of ownership or an unbundling of the rights associated with the work, whatever the parties agree to. This paragraph applies only to allocation of ownership interests among a college, university or the System. The ownership of any other joint owner shall be determined in accordance with applicable policy, collective bargaining agreement, or personnel plan provisions, or as negotiated among the parties.

6. **Equitable~~y~~ Distributions.** In any instance in which the System and/or its colleges or universities execute an agreement with an individual, corporation, business or other entity for economic gain using intellectual property in which the colleges, universities, or the System has an ownership interest, the colleges, universities or the System shall receive an equitable distribution. The proceeds of the equitable distribution shall be shared among the creators of the work as determined by agreement in accordance with this policy.

Part 5. Coordination Function.

Subpart A. Appointment of c~~C~~oordinator. The president or Chancellor, or his/her designee at each college, university, or Office of the Chancellor shall appoint an employee to be the local Intellectual Property Coordinator. The coordinator has responsibility to administer provisions of this policy to include dissemination of the college or university's procedures regarding implementation of **Board Policy 3.26** Intellectual Property and **Board Policy 3.27** Copyrights~~Reproduction and Use of Copyrighted Materials~~ and any related procedures.

Subpart B. Record-~~K~~keeping. Each college and university shall establish a record-keeping system to monitor the development and use of its intellectual property. Any questions relating to the applicability of this policy should be directed to the Intellectual Property Coordinator.

Subpart C. Conflicts of ~~I~~interest and ~~E~~ethics. ~~MnSCU~~ System employees are responsible for adhering to all legal and ethical requirements in accordance with State law, Board Policy and system procedure.

Part 6. Preservation of Intellectual Property Rights.

Subpart A. Protection of ~~R~~rights. ~~The~~ A college~~, or~~ university of the Office of the Chancellor shall undertake such efforts, as it deems necessary to preserve its rights in original works ~~for which the college or university is~~ when it is a~~the~~ sole or joint owner of the intellectual property rights. ~~The~~ A college~~, or~~ university or the Office of the Chancellor may apply for a patent, ~~for~~ trademark registration, ~~for~~ copyright registration, or ~~for~~ other protection available by law on any new work in which the college~~, or~~ university or the Office of the Chancellor maintains intellectual property rights.

Subpart B. Payment of ~~C~~costs. ~~The~~ A college~~, or~~ university or the Office of the Chancellor may pay some or all costs required for obtaining a patent, trademark, copyright, or other classification on original works for which the college~~, or~~ university or the Office of the Chancellor ~~exclusively~~ owns or jointly owns the intellectual property rights. If a~~the~~ college~~, or~~ university or the Office of the Chancellor has intellectual property rights in a jointly owned work, the college~~, or~~ university or the Office of the Chancellor may enter into an agreement with joint owners relating to the payment of such costs.

Part 7. Commercialization of Intellectual Property.

Subpart A. Right of ~~C~~commercialization. The college~~, or~~ university or the Office of the Chancellor that owns or has shared intellectual property rights to a work may commercialize the work using its own resources or may enter into agreements with others to commercialize the work as authorized by law. Upon request of a creator who retains intellectual property rights in a work, the college~~, or~~ university or the Office of the Chancellor shall advise the creator of progress in commercializing the work.

Subpart B. Sharing of ~~P~~proceeds. An employee who creates a work and retains an intellectual property interest in such work in which the college, ~~or~~ university or Office of the Chancellor maintains intellectual property rights is entitled to share in royalties, licenses, and any other payments from commercialization of the work in accordance with applicable collective bargaining agreements, individual agreements, and applicable laws. All expenses incurred by the college or university in protecting and promoting the work, including costs incurred in seeking patent or copyright protection and reasonable costs of marketing the work, shall be deducted and reimbursed to the college, ~~or~~ university or the Office of the Chancellor before the creator is entitled to share in the proceeds.

If a college, university or the Office of the Chancellor decides not to pursue patent or copyright protection in a jointly owned work and the creator/inventor decides to pursue such protection, all expenses incurred by the creator/inventor in protecting and promoting the work including costs incurred in seeking patent or copyright protection and reasonable costs of marketing the work, shall be deducted and reimbursed to the creator/inventor before the college, university or the Office of the Chancellor is entitled to share in the proceeds.

Net proceeds generated from the commercialization of works owned jointly by colleges, universities or the Office of the Chancellor (not creators/inventors) will be distributed in accord with the terms of a written agreement, or absent an agreement, in amounts equal to the relative contributions made by the colleges, universities or the Office of the Chancellor.

Subpart C. Intellectual ~~P~~property ~~A~~account. Each college, university, ~~or~~and the Office of the Chancellor shall deposit all net proceeds from commercialization of intellectual property in its own general intellectual property account. The President/Chancellor (or designee) may use the account to reimburse expenses related to creating or preserving the intellectual property rights of the college, university, or Office of the Chancellor ~~intellectual property rights~~ or for any other purpose authorized by law and ~~MnSCU~~Board policy, including the development of intellectual property.

Subpart D. Trademarks. Income earned from the licensing of college, ~~and~~ university or System trademarks and logos is not subject to the requirements of Subpart C~~.~~ for distribution of funds.

Part 8. Assignment of Rights.

Subpart A. College, ~~or~~ University or Office of the Chancellor ~~A~~assignment. ~~If it is in the best interest of the college or university, the~~ A college, ~~or~~ university or the Office of the Chancellor may assign all or a portion of its rights in a work to the creator, corporation, business or to any other person in accordance with the law and when in the best interests of the college, university or the System. As a condition of the assignment, the college, ~~or~~ university or the Office of the Chancellor, may preserve rights, such as a royalty-free, perpetual, irrevocable, non-exclusive license to use and copy the work in accordance with the preservation and the right to share in any proceeds from commercialization of the work.

Subpart B. Creator ~~A~~assignment. Any person may agree to assign some or all of his or her intellectual property rights to the college, university or ~~s~~System. The creator may preserve any rights available to the creator as part of the assignment.

Subpart C. Assignment in ~~W~~writing. Any assignment of intellectual property rights shall be in writing and signed by the assignor and assignee.

Part 9. Dispute Resolution Process. The Office of the Chancellor may develop procedures to resolve disputes relating to this policy.

Part 10. Notification of Policy. The Intellectual Property Coordinator at each college, university, and the Office of the Chancellor shall provide a copy of this Intellectual Property Policy and any other forms developed to implement this Policy to persons upon request. The college, university, or Office of the Chancellor shall arrange training on a periodic basis for faculty, staff and/or other persons who are covered by this Intellectual Property Policy.

Related Documents:	Policy 3.22 Course Syllabi
	Procedure 3.26.1 Patent Inquiry Process
	Policy 3.27 Copyrights
	Procedure 3.27.1 Copyright Clearance
	Minnesota State Statute 136F
	Minnesota State Statute 16B.483

Date of Implementation: 1/01/03
Date of Adoption: 6/19/02
Date and Subject of Revision:

POLICY CONTENT FORMAT
Single underlining represents proposed new language
~~Strikeouts~~ represent existing language proposed to be eliminated.

MINNESOTA STATE COLLEGES AND UNIVERSITIES
BOARD OF TRUSTEES

Agenda Item Summary Sheet

Committee: Academic and Student Affairs **Date of Meeting:** April 20, 2010

Agenda Item: Proposed Amendment to Board Policy 3.27 Reproduction and Use of Copyrighted Materials (First Reading)

[X] Proposed Policy Change	[ ] Approvals Required by Policy	[ ] Other Approvals	[ ] Monitoring

[ ] Information

Cite policy requirement, or explain why item is on the Board agenda:

Amendments to Board Policy require approval of the Board.

Scheduled Presenter(s):

Linda L. Baer, Senior Vice Chancellor for Academic and Student Affairs
Gary Hunter, System Director for Intellectual Property

Outline of Key Points/Policy Issues:

Board Policy 3.27 Reproduction and Use of Copyrighted Materials addresses the copyright issues that arise within the System. The current amendment seeks to provide guidance to help system colleges, universities and their respective students and employees comply with federal copyright laws.

Background Information:
The review of Board Policy 3.27 Reproduction and Use of Copyrighted Materials was undertaken as part of the normal policy review process. The proposed amendment was developed from input by a policy review committee comprised of representatives from technical and community colleges, universities, labor unions, and the Office of the Chancellor along with input from other constituents within the system.

First Reading

BOARD OF TRUSTEES
MINNESOTA STATE COLLEGES AND UNIVERSITIES

BOARD ACTION
Proposed Amendment to Board Policy 3.27 Reproduction and Use of Copyrighted Materials

The Office of the Chancellor is submitting a proposed amendment to Policy 3.27 Reproduction and Use of Copyrighted Materials.

BACKGROUND

A policy review committee was convened in September and met in October, November and December of 2009. A fourth meeting was added in January of 2010 to allow further opportunity for constituent groups to provide input on the proposed amendment. Various stakeholders throughout the System have been consulted with during the past six months.

CONSULTATION

Consultation has occurred as follows:

- Reviewed by the Academic and Student Affairs Policy Council- 1/21/2010 and 3/19/2010.
- Reviewed at Minnesota State College Faculty (MSCF) meet and confer- 2/25/2010.
- Mailed out for review and comment – 3/25/2010.
- Review and comment at Inter Faculty Organization (IFO) meet and confer – 3/26/2010.
- Reviewed at Leadership Council- 4/6/2010.
- Reviewed and comment at Minnesota State University Association of Administrative and Service Faculty (MSUAASF) meet and confer- 4/9/2010.
- Planned for review and comment at IFO meet and confer- 4/26/2010.
- Planned for review and comment at MSCF meet and confer- 5/6/2010.

RECOMMENDED COMMITTEE ACTION

The Academic and Student Affairs Policy Committee recommends that the Board of Trustees adopt the following motion:

RECOMMENDED MOTION

The Board of Trustees approves the proposed amendment to Policy 3.27 Reproduction and Use of Copyrighted Materials.

First Reading

BOARD OF TRUSTEES
MINNESOTA STATE COLLEGES AND UNIVERSITIES

Board Policy	**3.27**
Chapter 3. Educational Policies	
Section 27. Reproduction and Use of Copyrighted Materials	

3.27 Copyrights~~Reproduction and Use of Copyrighted Materials~~

Part 1. General Statement. Copyright owners of original works, regardless of the format of the work, have exclusive rights with respect to their creations. The Minnesota State Colleges and Universities ~~(MnSCU)~~ ~~s~~System (System) promotes the recognition and protection of these rights, including the rights of reproduction, preparation of derivative works, distribution, and performance. ~~Minnesota State Colleges and Universities~~ The System also recognizes that reproduction and use of original works in accordance with fair use limitations can further teaching, research, and public service at its colleges and universities. Consistent with the mission of the Board and the distinct missions of system colleges and universities, the Board supports the creation and sharing of new knowledge for course development and to improve student learning, such as through creative commons licenses.

Part 2. Applicability. This policy applies to system colleges, universities, the Office of the Chancellor and their respective employees and students, and to works in which colleges, universities or the System has a legally recognized interest.

Part 3. Definitions. The following definitions apply to this Policy and to Procedure 3.27.1 Copyright Clearance.

Subpart A. Copyright. Copyright is a form of protection granted by federal law for original works of authorship that are fixed in a tangible medium of expression. Copyright covers both published and unpublished works.

Subpart B. Copyright compliance. The actions of colleges, universities, the Office of the Chancellor and their respective employees and students that ensure proposed uses of materials comply with copyright laws and do not infringe on the intellectual property rights of the copyright owners.

Subpart C. Intellectual property coordinator. The Intellectual Property Coordinator is the person appointed at each college, university and the Office of the Chancellor who administers Board Policies 3.26 Intellectual Property, 3.27 Copyrights and any related procedures.

Part 4. Copyright Notice. A copyright notice shall be placed on college, university and System owned materials that will be made available to the public. The date in the notice shall be the

year in which the materials are first published, i.e. distributed or made available to the public or any sizable audience.

Part 5. Copyright Registration. Prior to commercialization of works in which a college, university or the Office of the Chancellor has an ownership interest, such works shall be registered with the U.S. Copyright Office in the name(s) of the copyright owner(s).

Part 6. Copyright Compliance. Colleges, universities and the Office of the Chancellor shall develop and implement policies, procedures, processes and practices to be in compliance with federal copyright laws.

Part 7~~2~~. Intellectual Property Coordinator and Administration. The Intellectual Property Coordinator as designated in **Board Policy 3.26** Intellectual Property at each college, university ~~or~~and the Office of the Chancellor has the responsibility for implementation of this policy and any related procedures.

Related Documents: Policy 3.26 Intellectual Property
Procedure 3.26.1 Patent Inquiry Process
Procedure 3.27.1 Copyright Clearance

Date of Implementation:
Date of Adoption: July 1, 2010
Date and Subject of Revision: N/A

PROCEDURE CONTENT FORMAT
Single underlining represents proposed new language.
~~Strikeouts~~ represent existing language proposed to be deleted.

MINNESOTA STATE COLLEGES AND UNIVERSITIES
BOARD OF TRUSTEES

Agenda Item Summary Sheet

Committee: Academic and Student Affairs **Date of Meeting:** April 20, 2010

Agenda Item: Proposed Amendment to Board Policy 3.21 Undergraduate Course Credit Transfer (First Reading)

[X] Proposed Policy Change [ ] Approvals Required by Policy [ ] Other Approvals [ ] Monitoring

[ ] Information

Cite policy requirement, or explain why item is on the Board agenda:

Amendments to Board Policy require approval of the Board.

Scheduled Presenter(s):

Linda L. Baer, Senior Vice Chancellor for Academic and Student Affairs
Mike López, Associate Vice Chancellor for Student Affairs

Outline of Key Points/Policy Issues:

The proposed amendment makes several improvements that will improve transfer for students, including a requirement that course outlines be posted on college and university websites, a requirement that colleges and universities maintain course equivalencies on the u.select database, and requirements for providing information to students about appealing transfer decisions and providing links to transfer information websites.

Background Information:

The audit of the system office conducted by the Legislative Auditor noted a number of problems with credit transfer that were cited by students. The proposed amendments to the transfer policy address these problems.

First Reading

BOARD OF TRUSTEES
MINNESOTA STATE COLLEGES AND UNIVERSITIES

BOARD ACTION

Proposed Amendment to Board Policy 3.21 Undergraduate Course Credit Transfer

The Office of the Chancellor is submitting a proposed amendment to Policy 3.21 Undergraduate Course Credit Transfer.

BACKGROUND

The initial impetus for the amendment came from the Students First project in order to assure that students have access to accurate information about transfer course equivalencies. Subsequent revisions were based on the findings cited in the audit of the system office conducted by the Legislative Auditor.

CONSULTATION

Consultation has occurred as follows:

- Reviewed at joint meetings of the Students First Single Application and Single Registration workgroups- 1/12/10 and 1/29/10
- Reviewed by the Academic and Student Affairs Policy Council- 3/19/10
- Mailed out for review and comment- 3/22/10
- Reviewed at IFO meet and confer 3/26/10
- Planned for Review at MSCF meet and confer- 5/6/10
- Reviewed at MSUAASF meet and confer- 4/9/10
- Reviewed at Leadership Council- 4/5/10

RECOMMENDED COMMITTEE ACTION

The Academic and Student Affairs Committee recommends that the Board of Trustees adopt the following motion:

RECOMMENDED MOTION

The Board of Trustees approves the proposed amendment to Policy 3.21 Undergraduate Course Credit Transfer.

First Reading

BOARD OF TRUSTEES
MINNESOTA STATE COLLEGES AND UNIVERSITIES

BOARD POLICY	**3.21**
Chapter 3. Educational Policies	
Section 21. Undergraduate Course Credit Transfer	

3.21 Undergraduate Course Credit Transfer

Part 1. Purpose. The purpose of this policy is to establish consistent practices for accepting credit for undergraduate college-level courses transferred into a system college or university, except for courses that apply to the Minnesota Transfer Curriculum as per Policy 3.37 Minnesota Transfer Curriculum.

Part 2. Definition. For purposes of this policy the following definition applies:

> **Comparable or equivalent course.** A comparable or equivalent course is one that is similar in nature, content and level of expected student performance on course outcomes to a course offered by the receiving institution.

Part 3. Transfer of Undergraduate Credits. Once a student has been admitted to a system college or university, each college or university shall evaluate college-level course credits completed, as submitted by the student on an official transcript, to determine if they shall be accepted in transfer. Once the credits are accepted in transfer, each college or university shall determine how the course credits will apply to program and graduation requirements Transfer of credit from one college or university to another shall involve at least three considerations:

1. Educational quality of the learning experience which the student transfers,
2. Comparability of the nature, content and level of the learning experience offered by the receiving college or university, and
3. Appropriateness and applicability of the learning experience to the programs offered by the receiving higher education entity in light of the student's educational goals.

Subpart A. Transfer of courses that are comparable or equivalent. A receiving system college or university **s**hall accept courses in transfer that it determines to be comparable or equivalent to specific courses it offers.

Subpart B. Transfer of courses that are not comparable or not equivalent. College-level courses accepted in transfer by a system college or university that are determined to be not comparable or not equivalent to specific courses taught at the receiving college or university shall be accepted as electives.

Part 4. Course Outlines. In order to facilitate the evaluation of courses for transfer credit as described in Part 3 of this policy, each system college and university shall post course outlines, as defined in Board Policy 3.22, for all courses on its institutional website. The links for current course outlines shall be submitted to the Office of the Chancellor for publication on the MinnesotaTransfer.org Web site.

Part 5. Official Repository of Course Equivalents. The Degree Audit and Reporting System (DARS) and u.select database (and successor databases) housed within the Office of the Chancellor shall be the official repository of course equivalencies between system colleges and universities. Each system college and university shall be responsible for ensuring the accuracy and completeness of course equivalencies listed for courses offered by that college or university. A course offered by a system college or university that is listed as the equivalent of a course at the receiving system college or university shall be accepted in transfer as that course by the receiving system college or university with no additional documentation required from the student.

Part ~~4~~6. System College or University Transfer Policy. Each system college or university shall implement a policy to address transfer of course credit consistent with the requirements of this policy and Procedure 3.21.1 Undergraduate Course Credit Transfer.

Part ~~5~~ 7. Disseminating Information. Each system college or university shall publish its transfer policy and shall make information about credit transfer and course equivalencies, including links to MinnesotaTransfer.org and u.select, readily available on its website.

Part ~~6~~ 8. Student Appeals. Each system college or university shall establish a policy for student petition and appeal of credit transfer decisions. The Chancellor shall establish a procedure for system-level appeal of system college or university credit transfer decisions. When providing students with a transfer evaluation, colleges and universities shall also provide information about a student's right to appeal, the appeal process, and links to the system and college or university appeal policies. This information shall also be made available on each college and university website, course catalog and transfer-related publications.

Date of Implementation: 08/01/07
Date of Adoption: 04/29/98
Date and Subject of Revision:
6/20/07 - moves transfer of credit related to the Minnesota Transfer Curriculum to Policy 3.37, expands existing language to address course credit transfer from any higher education institution, limits the policy to transfer of formal credit courses, moves academic program requirements and transfer to Policy 3.36, and moves process and procedural items to the chancellor's procedure
03/17/04 – added Subpart 4C to describe the transfer of the Associate in Fine Arts degree.
Repealed carry forward policies CC III.01.10, Transfer Standards; CC III.01.11, Transfer of Technical Credits; SU Policy 4.5, Policy Regarding Transfer of Lower Division Credit from Two-Year Colleges; and T.C. 2.3.2.0, Credit Transfer

MINNESOTA STATE COLLEGES AND UNIVERSITIES
BOARD OF TRUSTEES

Agenda Item Summary Sheet

Committee: Academic and Student Affairs **Date of Meeting:** April 20, 2010

Agenda Item: Follow-up to OLA Evaluation of the System Office

☐ Proposed Policy Change	☐ Approvals Required by Policy	☐ Other Approvals	☐ Monitoring

☒ Information

Cite Policy Requirement, or explain why item is on the Board Agenda

The Chair of the Board of Trustees requested that each Committee review Office of the Legislative Auditor (OLA) areas of concern under their purview.

Scheduled Presenters:

Linda L. Baer, Senior Vice Chancellor for Academic and Student Affairs

Background Information:

- The evaluation was requested by the Chancellor and the Board of Trustees Chair, and it was authorized by the Legislative Audit Commission.
- The OLA report was presented to the Board of Trustees Audit Committee and a subsequent memo from Board Chair David Olson charged each committee with a review and possible actions in the respective areas of concern, six of which are under the purview of this committee.
- The OLA areas of concern for Academic and Student Affairs were reviewed by the committee in March with agreement to address the following three areas of concern at the April meeting.
    - Impact and cost-effectiveness of online instruction
    - Oversight of customized training and continuing education
    - Oversight of specialized training in firefighting and emergency medical services
- The primary focus of the presentation and discussion will be online learning which has the most extensive policy and practice implications among the three areas of concern.

BOARD OF TRUSTEES
MINNESOTA STATE COLLEGES AND UNIVERSITIES

INFORMATION ITEM

Follow-up to OLA Evaluation of the System Office

BACKGROUND

The Academic and Student Affairs work plan for responding to the OLA evaluation includes consideration of the following three areas at the April meeting:

- Impact and cost-effectiveness of online instruction
- Oversight of customized training and continuing education
- Oversight of specialized training in firefighting and emergency medical services

The OLA evaluation includes a number of findings in these three areas primarily emanating from a survey of system presidents. The survey feedback provides opportunities for continuous improvement in the services provided to system institutions. It also highlights significant issues related to the value and appropriateness of centralizing some functions and services. The April meeting of the Academic and Student Affairs Committee will include an overview of the three areas and action steps that are or will be undertaken to address each area of concern.

Overview of Areas of Concern for Academic and Student Affairs

Impact and cost-effectiveness of online instruction		
Issues Raised and Related Quotes from OLA Report	**Background Information and Activities in the Area of Concern**	**Recommended Activities for ASA Workplan**
• "A majority of MnSCU presidents are satisfied with the system office's activities supporting online education, but the overall impact of Minnesota Online has not yet been systematically assessed." (p. 63) • "MnSCU's online education services have expanded significantly but with little information on educational outcomes. It is important to consider whether online courses and services are providing a high-quality educational experience for students." (p. 64) • "So far, the system office has not developed performance benchmarks or conducted impact studies. The system office has contracted in recent years for an annual survey of MnSCU's online learners. Past surveys have suggested that MnSCU's online users have lower levels of satisfaction with online services than online users nationally.[36] (p. 64) • "Some campus officials commented that they do not perceive a strong return on investment for Minnesota Online's per-credit fees, and others said they would like additional assistance in developing online courses. " (p. 64)	• Measuring performance is integrated into the FY2010-FY2012 Online Action Plan. Several key success measures are being developed with Research and Planning. This includes a dashboard of student success measures for online courses. • Minnesota Online continues to support the campus surveys of online learners. As noted, surveys have suggested that MnSCU's online users have lower levels of satisfaction. However, results also suggest that satisfaction of MnSCU online learners is higher than classroom learners nationally. • General oversight of Minnesota Online is provided by the Minnesota Online Council, an advisory group to the Sr. Vice Chancellor of Academic Affairs comprised of college, university, student and faculty representatives.	• Measure developed for online course success rates (sharing with campuses by June 2010) • Begun development of measure on longitudinal success rates of online students (complete fall 2010) • Conducting additional analysis on the survey results in relation to other measures. Integrating survey results into online dashboard. Pursuing large scale pilot test of the new online version of the Community College Survey of Student Engagement in 2011. • Assess current approach to delivering and supporting online in the system, including the impact of Minnesota Online. (August 2010)

Other Key Questions		
1. How do we know we are getting good results?	• See responses above	
2. Why reinvent online courses on every campus?	• Services and courses already exist on campuses: online courses and programs have been created as an extension of programs and services for classroom students; online services are also used by classroom students.	• Assess impact of adjusting the Allocation Framework to provide incentives for course sharing between institutions as a way to increase efficiencies.
	• Collaboration is part of the Online Action Plan; Minnesota Online funds high demand programs developed jointly by institutions.	• Continue current practice of open RFPs for developing high demand collaborative online programs.
3. Why does it cost more?	• A biennial cost analysis was conducted for FY2009, results include: 1) Instructional costs for online courses appear to be comparable to costs for classroom courses; 2) Costs for activities other than instruction appear to be slightly higher for online courses/students than for classroom; 3) Determining the actual cost differences for activities other than instruction is difficult; 4) Additional tuition revenue is invested in critical technology and student support services required to deliver online education.	• Continue biennial cost analysis.

Oversight of customized training and continuing education

Issues Raised and Related Quotes from OLA Report	Background Information and Activities on the Area of Concern	Recommended Activities for ASA Workplan
• "The system office plays a limited role in oversight of customized training, and many institution presidents question the value of this system-level oversight." (p.65) • "Customized training is an important MnSCU service to employers, but the role of the system office in this activity is not well defined." (p. 65) • "...the Board of Trustees has not specifically mandated regulation or coordination of customized training programs, and it is unclear to us that the system office should employ staff to advocate on behalf of campuses' customized training activities." (p. 66)	The Office of the Chancellor provides the following system-level services: • Allocates Fund 120: 98 percent is distributed to colleges and universities by formula or through grants and 2% is retained for systemwide coordination. • Serves on the Minnesota Jobs Skills Partnership board to advocate for competitive grant applications from system institutions. • Manages system-level communications with statewide business and industry associations and organizations. • Develops and coordinates marketing and public relations regarding services to business, including Web, print and telephone access. • Manages innovation grants to build curriculum to support collaboration and to create services for dislocated and underemployed workers.	• Continue to provide system leadership in partnership with Continuing Education and Customized Training administrators through the newly appointed Business and Industry Outreach Council. • Strategic goals for continuing education and customized training include: ▪ Continue outreach efforts, develop additional external resources and support innovation. ▪ Manage selection of a vendor for a system-wide online registration and payment service by June 2010. ▪ Produce report on proposed performance measures to improve accountability and to benchmark services. ▪ Increase the number of on-line, non credit courses available to meet the needs of employers and workers through grant incentives from the CT/CE innovations fund.
Key Questions 1. How can the system office provide value-added services for outreach and access to large state employers? 2. Does the system support ongoing and future development of collaboration across institutions in this area?		

Oversight of specialized training in firefighting and emergency medical services

Issues Raised and Related Quotes from OLA Report	Background Information and Activities on the Area of Concern	Recommended Activities for ASA Workplan
• "The Fire/EMS Center is a less essential part of the MnSCU system office than it once was, and the need for specialized oversight of firefighting and EMS training by the system office is unclear." (p. 69) • "MnSCU's use of the system office specialists to oversee firefighter training is an approach different for the one it uses in most academic program areas….some officials told us the Fire Center has little impact on training programs…" (p.69) • "The Fire/EMS Center serves as Minnesota's official "point of contact" with the federal government for firefighter training. However, most states' points of contact are in state fire marshal offices or other state agencies." (p. 70)	The Fire/EMS/Safety Center provides the following system-level services: • Oversees 12 fire and 17 emergency management programs statewide to ensure compliance with federal and state standards. Manages 9 train-the-trainer courses. • Provides oversight to ensure compliance with Governor's Executive Order 07-14 that assigns emergency responsibilities to State agencies. • Provides training oversight and services to 3,000 first aid/CPR instructors across the state. • The system's fire specialists assist local fire departments in securing federal grants. Since 2001, these specialists assisted 1,400 departments in securing $100 million. • A Management Analysis Division (MAD) report in 2006 concluded that firefighter and EMS training oversight is an essential service provided by the Center, and it is appropriately located in the Office of the Chancellor. • Sixty percent of the federal points of contact in the U.S. are part of a higher education institution or system.	• Evaluation of center services to campuses will be completed by June, 2010 (including surveys of external and internal customers and evaluation meetings with program managers and campus administrators). • Agree upon the future role of the centralized fire service and emergency management education and determine if elements can be transferred to institution programs or discontinued. • Provide recommendations to senior vice chancellor of Academic and Student Affairs for review and implementation by June 2010.
Key Questions		
1. What additional value is created by providing system oversight of fire, emergency and safety education and services in conjunction with current compliance efforts out of the Office of the Chancellor? 2. Is the knowledge of fire specialists of greater benefit to the system if the Center is located in the Office of the Chancellor or at a campus?		*04.08.10*

MINNESOTA STATE COLLEGES AND UNIVERSITIES
BOARD OF TRUSTEES
Agenda Item Summary Sheet

Committee: Academic and Student Affairs **Date of Meeting:** April 20, 2010

Agenda Item: Centers of Excellence, Wilder Evaluation

☐ Proposed Policy Change	☐ Approvals Required by Policy	☐ Other Approvals	☐ Monitoring

☒ Information

Explain reason for item to go before the Board:

The Board of Trustees requested an opportunity to discuss the 2010 program evaluation and the ongoing financial commitment for the Centers of Excellence.

Presenter:

Greg Owen, Wilder Research
Ellen Shelton, Wilder Research
Linda L. Baer, Senior Vice Chancellor for Academic and Student Affairs

Purpose:

The session will provide an overview of the Wilder Research program evaluation and an opportunity to discuss ongoing sustainability of the Centers of Excellence initiative.

Outline of Key Policy Issues:

The Centers of Excellence, a system initiative created and funded by the governor and legislature, have been in operation for four and a half years. The $4.3 million allocated to the four Centers of Excellence has supported significant positive results and continued improvement and evolution of the Centers as noted in the current (as well as previous) evaluations conducted by Wilder Research.

As part of the current evaluation, Wilder Research was asked to assess the value of the Centers as demonstrated in the engagement of and responsiveness to industry and the support for innovation across Center partner institutions. The April meeting presentation will include information on the roles and successes of the Centers and suggestions for advancement of this initiative to support Board discussion.

BOARD OF TRUSTEES
MINNESOTA STATE COLLEGES AND UNIVERSITIES

INFORMATION ITEM

Centers of Excellence, Wilder Evaluation

BACKGROUND

The Board of Trustees requested an opportunity to have a session in April on the Centers of Excellence initiative. Wilder Research, the Center Directors, and Office of the Chancellor staff expedited a program evaluation that focuses on industry and institutional observations on Center activities related to the primary objectives of this initiative. The executive summary and full report from that evaluation follow.

The four Centers of Excellence designated by the Board of Trustees in October 2005 are:

- HealthForce Minnesota
  Lead Institution: Winona State University
- Advance IT Minnesota
  Lead Institution: Metropolitan State University
- *360°* Manufacturing and Applied Engineering Center of Excellence
  Lead Institution: Bemidji State University
- Minnesota Center for Engineering and Manufacturing Excellence
  Lead Institution: Minnesota State University, Mankato

The April Board of Trustees Meeting will provide an opportunity to hear from Wilder Research staff on the progress and activities of the Centers of Excellence and to consider recommendations and provide guidance on the role of the Centers of Excellence in achieving the system strategic plan.

Wilder Research

Executive Summary

2010 Evaluation of the Centers of Excellence

Entities established within the Minnesota State Colleges and Universities system

In 2005 the Minnesota State Legislature passed legislation and appropriated funding to create Centers of Excellence as part of the Minnesota State Colleges and University System (MnSCU). The MnSCU Board of Trustees designated the following Centers:

- Minnesota Center for Engineering and Manufacturing Excellence (MNCEME)
- HealthForce Minnesota
- Advance IT Minnesota
- 360° Manufacturing and Applied Engineering Center of Excellence

Evaluation during the first three years indicated a strong start for the Centers. This evaluation focuses on their fourth year .In particular, it examines six objectives of the Centers that reflect their unique, innovative, and interrelated set of functions that advance the mission of the system and its institutions:

1. Create new pathways for communication among all partners including industry, education, and learners
2. Identify industry opportunities and the related workforce preparation these opportunities require
3. Help learners discover and prepare for careers in center-aligned fields
4. Encourage cross-campus activity to strengthen courses, programs, and learning opportunities
5. Champion changes in the content and delivery of educational services
6. Produce revenue and leverage additional resources

Summary and conclusions

The Centers are showing a level of impact consistent with the time they have had to develop

The Centers provide a unique capacity in the system for meeting an interrelated set of six important goals. They provide added value to support system innovation and responsiveness to flagship economic sectors in the state. In each of the six objectives, we find strong evidence that they are creating impact at a level that is consistent with their four-and-a-half year time frame of existence.

In meeting these six objectives, Centers are also advancing the priorities of the overall system's current strategic plan. Examples include **increasing access, opportunity, and success** for students through their help for diverse learners to discover and prepare for careers. By identifying industry workforce needs – and championing the courses and programs needed to meet them – they are **enhancing the state's economic competitiveness** while also **promoting high quality programs and services**. Through cross-campus coordination, leveraging system capacities, and championing new delivery options, they are spearheading **innovation to meet educational needs**.

Centers are adapting with different strengths to meet different situations and priorities

From the outset, the Centers were designed with differences that fit unique industry sector needs and institutional capacities. The same considerations continue to shape varying developmental paths. For example, we see more new program development in the two Centers (360° and HealthForce) that have more academic partners. MNCEME, whose four-year programs have national accreditation whose standards limit transferability of first- and second-year credits, has focused the most on strengthening pre-college STEM training that can articulate into the front end of either two-year or four-year programs.

Advance IT works in a sector that itself serves a wide range of industries as well as nonprofits and government agencies. This sector began with the least well-developed industry associations. This Center, fittingly, has put the most effort into developing and convening industry networks and developing supports for Center alumni.

We would not expect equal successes across the board. By its nature, innovation presumes a readiness to embrace some less successful efforts as the price of discovering better methods. Both kinds of results produce valuable learning.

The Centers' position within the overall system still needs fine-tuning

The Centers are currently held accountable to create innovation in the system, but lack authority to make the changes to implement that innovation. They have been tasked to encourage cooperation in a basically competitive environment, and to develop new rules of engagement while existing policies and incentives still stand. It will be important to consider options to better align institutional and Center incentives, and give Centers more tools for creating and measuring the changes they are expected to produce.

In the current configuration, Centers are promoting ways of doing business that do not necessarily fit with current institutional practices. This is one likely reason why administrators gave Centers lower ratings than did faculty (and sometimes industry partners) on performance of some objectives. For example, the work to better align curriculum and develop new programs is time-consuming, often requires significant added administrative effort, and may not – especially not yet – show a corresponding benefit for the institution. Faculty, however, have a more direct view of the gains in student access, learning, and career readiness, and industry stakeholders are in a position to reap the most significant benefits when additional and better-prepared students complete their programs.

The role of administrators, however, is vital to the success and growth of the Centers. The accomplishments we observe to date are evidence of considerable willingness to discern, and work for, the larger good. To help extend a similar level of collaboration beyond the initial circle of Center supporters, the overall system should provide structures and processes to support and sustain this kind of collaboration.

Future considerations

The level of impact observed to date leads to a conclusion that continued funding of the Centers is merited. The same amount of money spread among institutions would be unlikely to achieve the same goals. The Centers focus funds on common purposes and provide convening and facilitation to craft a shared work plan and help partners maintain accountability to each other for working together. Additional decision-making authority or system incentives to back up these purposes should be considered.

Given the current challenges inherent in Centers' structure, the system should not assume that the current configuration of the Centers is the best for the long term. Different options should be considered. Is it necessary to identify a single lead institution? If so, should there be limits on the kind of institution that is so designated? Could more than one university be included? Should the unit of affiliation continue to be entire institutions, or could individual programs be considered Center partners? The system will be best served if a wide variety of options are considered.

Evaluation methods and data sources

Data for this report come from three main sources. First, each Center provided reports on their industry involvement, outreach and marketing activities, and leveraged funding. Second, Wilder surveyed leaders of major statewide industry associations, agencies, and peer organizations to assess Center visibility and reputation. Third, Wilder surveyed 80 faculty and administrators in associated institutions, and industry and K-12 partners, who are most knowledgeable about the Centers' activities and the effects these have had to date on students, programs, institutions, and industry. The survey went beyond obtaining opinions and focused on concrete examples of the ways in which the Centers were meeting their objectives.

Data on programs and program graduates were also obtained from system administrative records. This information was not available for this report, but will be provided subsequently.

Findings: Outreach and engagement

Centers' work to engage partners and raise awareness and support for their work shows continuing growth in:

- The number of businesses and other organizations participating in and informing the work
- The number of K-12 students, schools, and dislocated workers and other adults who receive activities and support for career awareness and preparation
- The number and type of connections made through web pages and other social media to raise awareness of the Centers' fields and their career opportunities, and their associated academic programs that prepare students for those careers.

Findings: Visibility and recognition

The reputation survey found widespread awareness of the Centers' existence and one or more aspects of their activities. Responses suggest an encouraging view of the purposes and activities of the Centers, including their observations that the Centers help the system and its institutions respond more nimbly to industry needs, develop and align curriculum to support student transfer, offer new learning options, and meet industry needs for a highly skilled workforce.

Findings: Evidence of impact

Of the six objective areas, the first three are initial steps that help to lay the groundwork for the latter three. Not surprisingly, these earlier steps show the greatest evidence of impact by the Centers of Excellence. However, for the length of time they have been in existence, the Centers also show sound accomplishments on the remaining objectives.

1. Create new pathways for communication and collaboration among industry leaders, education and learners

Over 90 percent of stakeholders reported evidence that the Center had ***"helped to increase communication among colleagues in different programs or institutions,"*** including two-thirds of stakeholders who said it helped "a lot." In follow-up questions, large majorities of respondents reported that Center involvement put them in touch with new colleagues; introduced new ideas or resources to industry firms or to the sector; introduced new ideas and resources to programs and institutions; and helped position institutions with key industry or related partners. Examples of impacts include:

> Industry is so much more aware of what is being offered. And MnSCU is more aware of our needs. Before HealthForce, I had never been asked about our needs. *(Industry partner)*
>
> There is a better understanding of how to align outcomes in courses with separate educational goals and a better understanding of the alignment of courses as related to articulation agreements. *(Advance IT administrator)*

2. Identify industry opportunities and innovations, and the workforce preparation they require

Over 90 percent of stakeholders reported that the Center helped ***"increase communication between educators and people in industry,"*** including 60 percent who reported it helped "a lot." In follow-up questions, majorities reported that Center activities had caused educators to become more aware of current innovation or challenges in industry, and that students were being better prepared for careers as a result of Center activities. Examples of impacts they described include:

> Educators are coming with more information now to industry functions and are much better equipped to ask appropriate questions to ascertain industry needs. *(360° industry partner)*
>
> The regular interaction between college leadership and the industry advisory board have made it obvious that those interactions are needed regularly, and that education representatives need to listen more than they speak. *(MNCEME administrator)*

3. Help learners of all ages discover and prepare for careers within Center focused industries

Over 90 percent of stakeholders reported that the Center ***"helped learners become more aware of careers in the field,"*** including 65 percent who reported it helped "a lot." In addition, 89 percent of stake-holders reported that the Center ***"helped learners become better prepared*** for careers in the field," including 61 percent who reported it helped "a lot."

In follow-up questions, large majorities reported that the Centers' work had led to more student interest in the field, and more realistic ideas about careers in the field. Examples of impact include:

> Internships and job opportunities are posted [on the web site]; students can go there any time. Also, there are opportunities for students to go to conferences where they can make connections and learn about job opportunities. *(Advance IT administrator)*
>
> MNCEME institutions are validating it [Project Lead the Way] with articulation agreements and put their money where their mouth is. Opportunity for admission is tangible from you to us. *(MNCEME K-12 Project Lead the Way partner)*

In a survey of Project Lead the Way (PLTW) contacts across the state, 88 percent of respondents (mainly K-12 teachers and administrators) rated the support they received from MNCEME's PLTW coordinator as "extremely effective" (50%) or "very effective" (38%). Over half (53%) report their programs would suffer major changes if this support were no longer available, and 11 percent more report that their programs would cease to exist without the support.

4. Encourage cross-campus activity that strengthens learner opportunities and creates premiere course offerings

Three-quarters (75%) of respondents reported that the Center ***"helped to increase cross-campus cooperation to strengthen learning opportunities,"*** including 39 percent who reported that it helped "a lot." Over half of faculty and administrators reported at least one example of cross-campus activity that was not in place prior to the Centers, including shared positions and courses, articulation agreements, and other intercampus agreements. Respondents offer the following examples of advantages of the activity:

> Individuals can pick the correct courses for their goals, rather than only the ones offered locally, with no need to repeat courses. There is more cooperation between colleges. *(360° industry partner)*
>
> [The advantage is a] lack of redundancy, and very few gaps in the curriculum, because we talk a lot. *(HealthForce faculty)*

5. Champion changes in content and delivery to meet the workforce needs of tomorrow

Three-quarters (75%) of respondents reported that the Center ***"contributed to changes in content or delivery of educational services,"*** including 36 percent who said it contributed "a lot." High proportions of all respondents were able to ***"name a process or product developed with the help of the Center that addresses an industry or workplace need better than before."*** In addition, the great majority of faculty and administrators were able to ***"name a process or product developed with the help of the Center that addresses an educational need better than before."*** These innovations include articulation agreements and educational pathways, novel course delivery mechanisms, new and strengthened curricula, internships, activities for engaging students and enhancing their learning, and many others.

6. Produce revenue and leverage resources to power these objectives

Two-thirds (67%) of respondents reported that the Center ***"helped departments or programs acquire other funding or resources,"*** including 34 percent who said it helped "a lot." Two-thirds also reported the Centers had helped departments or programs partner with or leverage capacities elsewhere in the system to strengthen their work (or, in the case of industry respondents, serve industry better). Examples include:

> Regional conversations allow for leveraging and cooperation among individual campuses that we would otherwise not have access to. *(HealthForce faculty)*
>
> Just being part of MNCEME and its name recognition helps to open doors with business, and when looking at grant monies. *(MNCEME administrator)*
>
> The Center helped us provide a third-party service/ entity to bring resources together - we couldn't do it by ourselves. *(Advance IT administrator)*

Faculty and administrators believe their association with the Centers, and their partnership with others through the Centers, are factors that strengthen the grant proposals they submit for outside funding. During 2009, they documented a total of just over $9.7 million in such funding leveraged by the Centers, an increase over prior years. This includes approximately $5.7 million from public sources and just over $4 million from private sources. Most of these funds support the work of associated departments and programs, while 6 percent was available directly to the Centers to support their own operations.

Wilder Research
Information. Insight. Impact.

451 Lexington Parkway North
Saint Paul, Minnesota 55104
651-280-2700
www.wilderresearch.org

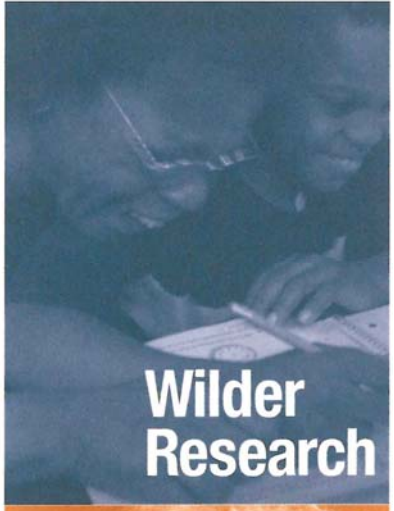
WILDER FOUNDATION

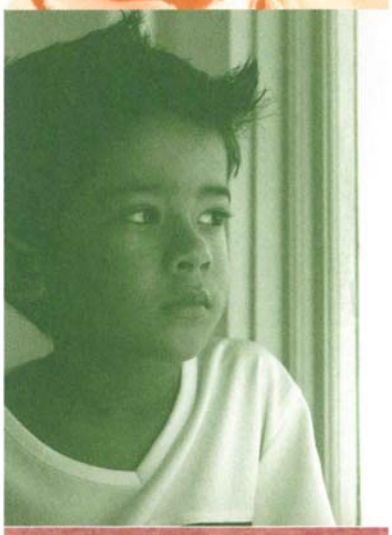
For more information

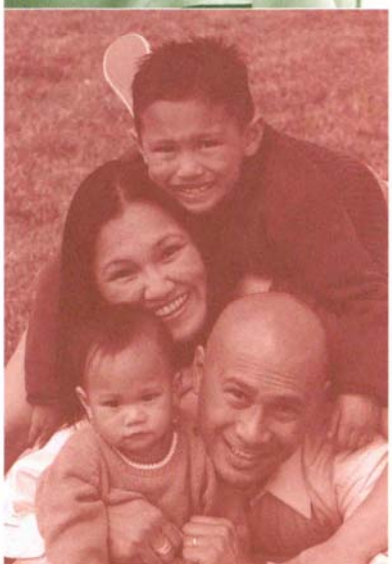
This summary presents highlights of the full report of the same title. For more information about this report, contact Ellen Shelton at Wilder Research, 651-280-2700 or Todd Harmening at the Office of the Chancellor, Minnesota State Colleges and Universities, 651-201-1856.

Authors: Ellen Shelton, Greg Owen, and Brian Pittman.

April 2010







2010 Evaluation of the Centers of Excellence

Entities established within the Minnesota State Colleges and Universities system

APRIL 2010

2010 Evaluation of the Centers of Excellence

Entities established within the Minnesota State Colleges and Universities system

April 2010

Prepared by:
Wilder Research

Wilder Research
451 Lexington Parkway North
Saint Paul, Minnesota 55104
651-280-2700
www.wilderresearch.org

Contents

Introduction and background 1
The strategic directions of the system and overall Center goals 2
Key activities of the Centers 3
Evaluation methods and data sources 4
Findings 7
Scope of effort and activity 7
Evidence of impact 14
Summary of impacts 28
Accomplishments made possible by the Centers 31
Discussion and conclusions 32
The Centers are showing a level of impact consistent with the time they have had to develop 32
Centers are adapting with different strengths to meet different situations and priorities 33
The Centers' position within the overall system still needs fine-tuning 33
Future considerations 34
Appendix 35
1. Detail of follow-up responses for Objectives 1, 2, and 3 37
2. Key activities, by Center, showing areas of impact 39

Figures

1. Number and affiliation of respondents to the stakeholder survey, by Center 5
2. Organizations directly involved with the Centers of Excellence, 2006-2009 8
3. Organizations involved with Center advisory and other work groups, by Center, 2009 8
4. K-12 outreach activities by type of outreach and Center, 2009 calendar year 9
5. Number of PLTW certifications of people and school districts in Minnesota, 2006-2009 10
6. Leveraged funds, 2008-2009, by type of source and year 26
7. Leveraged and matched funds received in 2009, by Center and whether funds flow through Center budgets or not 27
8. Overview of findings, by objective and Center 29
9. Overview of findings, by objective and respondent group 30

Acknowledgments

We wish to thank many people in the Office of the Chancellor for their help in the course of this evaluation: Leslie Mercer, Todd Harmening, Michael Murphy, Mary Rothchild, and Craig Schoenecker and others on the research staff. We also thank the Center Directors Bruce Lindberg, Jane Foote, Karen White, and Ron Bennett, as well as other Center staff members, for their answers to many questions and their assistance in identifying a wide range of Center stakeholders and participants. The authors appreciate their enthusiasm for their work and engagement with the evaluation process.

The Wilder Research team included:

Co-Principal Investigators: Greg Owen, Consulting Scientist
Ellen Shelton, Research Scientist

Research associate: Brian Pittman

Stakeholder survey team: Karen Ulstad, Coordinator

Other Wilder Research staff who contributed to this report were:

Natalie Alizaga
Jacqueline Campeau
Marilyn Conrad
Phil Cooper
Thalia Cooper
Louann Graham
Ron Mortenson
Linda Sjostrom
Abby Struck
Mary Ann Thoma

Introduction and background

In 2005 the Minnesota State Legislature passed legislation and appropriated funding to create Centers of Excellence as part of the Minnesota State Colleges and University System (MNSCU). The MnSCU Board of Trustees designated the following Centers:

- Minnesota Center for Engineering and Manufacturing Excellence (MNCEME)
- HealthForce Minnesota
- Advance IT Minnesota
- 360° Manufacturing and Applied Engineering Center of Excellence

Each Center was expected to become a regional or national leader within a specific area of education and training, demonstrate strong ties to employers, and offer a continuum of academic content, a variety of student engagement strategies and entry points, and strong partnerships between four-year and two-year institutions. The authorizing legislation also specified that each Center would be built on strong existing programs, improve performance in related programs, strengthen the quality and numbers of graduates, and integrate academic and training outcomes with business interests and opportunities.

During the first three years of Center operations, Wilder Research conducted a wide range of evaluation activities including site visits, meetings with institutional partners, baseline assessments, analysis of centralized data sources, key informant interviews and document analysis. Overall results from the first three years of evaluation indicate a strong start for each Center, including evidence of the use of innovative strategies for engaging business and academic partners, as well as the successful implementation of new or enhanced methods for reaching students with a diversity of ages and program needs.

During 2009 and 2010, Wilder Research was again selected to conduct further evaluation to examine Center progress in each of the following six core goal areas:

1. Create new pathways for communication among all partners including industry, education, and learners
2. Identify industry opportunities and the related workforce preparation these opportunities require
3. Help learners discover and prepare for careers in center aligned fields

4. Encourage cross-campus activity to strengthen courses, programs, and learning opportunities

5. Champion changes in the content and delivery of educational services

6. Produce revenue and leverage additional resources

These goal areas are based on the original legislative mandate by which the Centers were created; guidance from the Office of the Chancellor; and in-depth conversations with trustees, institutional administrators, faculty, K-12 and industry partners, and Center directors regarding the common goals to which all Centers should aspire. It is noteworthy that this set of goals is unique to the Centers of Excellence and is based on a core set of innovative ways in which Centers seek to add value for students, institutions, and industry. No other component of the Minnesota State Colleges and Universities system is explicitly mandated or similarly positioned to advance this combination of goals.

The strategic directions of the system and overall Center goals

The common goals of the Centers of Excellence appear to be closely aligned with the strategic priorities identified in the system's most up-to-date strategic plan document. Specifically, according to the draft plan currently under consideration (as of March 17, 2010) the Minnesota State Colleges and Universities are expected to thrive during the next decade if supported by "… heightened leadership, support for our students, recognition in pursuit of our collaborative and innovative capacity, and new levels of cooperation with and accountability to our internal and external stakeholders."

The specific strategic directions embodied in the final system-wide plan will likely include the following elements:

1. Increased access, opportunity, and success

   This priority is advanced by the Centers' work to help learners to discover and prepare for center-aligned careers, as well as by their work to create new pathways for communication among all partners including learners.

2. Ensure high quality programs and services through a commitment to academic excellence and accountability

   This priority is advanced by the Centers' work in the areas of championing changes in the content and delivery of educational services, and encouraging cross-campus activity to strengthen courses, programs, and learning opportunities.

3. Provide programs and services to enhance the global economic competitiveness of the state, its regions, and its people

   This priority is advanced by the Centers' work to identify industry opportunities and the related workforce preparation these opportunities require.

4. Innovate to meet current and future educational needs

   This priority is advanced by the Centers' work in the areas of creating new pathways for communication among all partners including industry and education, as well as the in producing changes in the content and delivery of educational services.

5. Ensure the long-term viability of public higher education in Minnesota

   This priority is advanced by the Centers' work to produce revenue and leverage additional resources.

One element that is emphasized as part of the overall system strategic plan but is less visible in the goals of the Centers of Excellence is the "…accountability to both internal and external stakeholders." It may be important for the Centers to consider adding similar language to their goal statements to more explicitly reflect what has already become a strong commitment to measurement, evaluation, and external review.

Collaboration and innovation are challenging goals to evaluate. The evaluation of the Centers in the past four years has included a variety of methods for assessing the work in these areas. The learning from these efforts is likely to be useful to the system as a whole as well as to the Centers.

Key activities of the Centers

Based on Center documents and interviews with Center directors, Wilder Research identified 8 to 12 activities of each Center that reflect the most significant investment of energy and resources and are most likely to contribute to accomplishing the goals of the Centers. These are listed in the Appendix to this report.

For each Center, key activities include a mix of the following:

Outreach, marketing and public relations, such as coordination and financial support for the west central Minnesota Dream It. Do It. campaign (360°); promotion of public visibility for manufacturing and engineering through web site functionality including social networking, updates, etc. (MNCEME); a comprehensive IT career awareness and success program that includes online resources and campus-based events (Advance IT);

and camps such as the "Scrubs Camp" for career awareness and other hands-on career preparation activities for high school students and adults (HealthForce).

Coordination of academic activities across partners, such as each Center's RFP process for funding innovation, course and program upgrades, outreach activities, and other activities to promote a coordinated approach to career development and preparation.

Industry coordination and support, such as the "IDEA competition" for potential entrepreneurs (360°, in partnership with the Northwest Minnesota Ingenuity Frontier); "Maximize Minnesota" events on energy management for business and industry (MNCEME); management of the Secure360 conference (Advance IT, as one of four organizational members of the Upper Midwest Security Alliance); and participation in the Coalition for Continuous Improvement in Healthcare (HealthForce).

Support for efforts to strengthen education and training opportunities for learners, such as development of the new online certificates (360°), a Bachelor of Science in Engineering opportunity on the Iron Range (MNCEME), updating of course curriculum and conversion to online delivery in multiple fields in IT and security (Advance IT), and support for the development of the Clinical Lab Science and Doctorate of Nursing Practice programs (HealthForce).

Evaluation methods and data sources

The current evaluation seeks to describe and assess the key activities of the Centers of Excellence during the 2009-2010 academic year with a focus on the visibility and reputation of Centers, industry involvement and integration, outreach and service to learners, cross-campus activity and cooperation, and overall viability and long-term value to the state of Minnesota. To conduct this evaluation, Wilder Research identified the key activities through which Centers seek to accomplish their goals, then collected information about implementation and impacts through the following strategies:

Reports from each Center

Using common definitions and data reporting templates, each Center provided information to Wilder Research on:

- The involvement of industry partners
- Outreach efforts to reach K-12 students and their teachers and counselors
- Outreach efforts to reach other potential higher education students

- Funding leveraged from sources other than the initiative funding from the system

In addition, each Center provided description of their efforts to market the Center's fields, associated programs, and the Centers and their activities.

Reputational survey

With the assistance of the Chancellor's Office, a range of industry association and state agency representatives were identified, including leaders in workforce development, manufacturing, technology, engineering, and health and aging services. In addition, Center directors helped to identify a small number of peer organizations and their leaders. Questions in the survey asked about the extent to which respondents were aware of the Centers of Excellence, and their perceptions of the Centers if they are aware of them.

Stakeholder survey

To assess outcomes of Center activities, Wilder Research surveyed individuals most familiar with those activities. An overall list of potential respondents – actively involved stakeholders, able to report knowledgeably on the Centers' work – was submitted by Center directors. To avoid bias, Wilder Research made the final selection of those to be interviewed. In the limited time available, 76 interviews were completed for this report with college and university administrative staff and faculty and industry partners. These included:

1. Number and affiliation of respondents to the stakeholder survey, by Center

	360°	MNCEME	Advance IT	HealthForce	Total
Industry partners	11	8	10	8	37
Faculty	5	1	4	4	14
Administrators	4	7	4	10	25
Total	20	16	18	22	76

To obtain the most knowledgeable perspective on certain key activities, we also surveyed four representatives of K-12 partners who were significantly involved in the Centers' work with K-12 outreach and support in strengthening secondary STEM (science, technology, engineering, and mathematics) education. Two of these were affiliated with MNCEME and two with HealthForce.

Most stakeholders are aware of some but not all of the activities of the Center with which they are affiliated. Similarly, most are able to report knowledgeably on outcomes only for those activities with which they are most directly involved. Moreover, each stakeholder

group (faculty, administrator, industry representative, or K-12 representative) has a different perspective on outcomes. To ensure that respondents were only asked to answer questions about matters with which they were well-informed, each interview was individually tailored to include only those questions relevant for their stakeholder group.

To learn more about how stakeholders engaged with Centers of Excellence, the survey included detailed questions about the nature of participation for each stakeholder. When a respondent's initial answers demonstrated a clear and more in-depth knowledge of a particular activity's impacts, more detailed follow-up questions were asked about those impacts.

The stakeholder survey was designed to go beyond opinions and collect observable facts. It included a number of very specific yes or no questions about specific kinds of changes that the respondent might have observed (for example, increased collaboration among institutions, or shared courses or positions, or students better prepared for careers in the field). In most cases, a "yes" response was followed up by a request for a brief but specific instance of the change or changes. For example, if a respondent reported that they had observed increased collaboration among institutions, they were asked to provide a specific example or description of how collaboration had increased. Many of these follow-up questions were specifically worded to fit the different perspectives of industry and K-12 partners and college or university faculty and administrators.

Because of the individualization of interviews, the number of responses to an individual follow-up question could vary significantly based on subject matter knowledge and a respondent's group.

Respondents were asked to describe only outcomes that have already occurred. Results reported here thus do not include outcomes that are likely in the future, such as increased enrollments expected due to a new program that has already been developed but will not start until this coming fall.

Data on new programs and program graduates

Data on programs and program graduates were also obtained from system administrative records. This information was not available for this report, but will be provided subsequently.

Findings

Findings about the scope of effort and level of activity are derived from documentation maintained by the Centers, compiled and analyzed by Wilder Research. Findings about the impact of the Centers are derived mainly from Wilder's stakeholder survey, conducted in March 2010, with additional information based on Center records.

Scope of effort and activity

Outreach and engagement efforts

Reports provided from Center records show the extent of Centers' outreach efforts with a number of different key groups: industry partners, potential students currently in K-12 grades, potential students who are adults, and general marketing to the public at large.

Industry involvement

Information on industry involvement during 2008-09 shows a continuing trend of steady participation, with some increase in engagement with industry organizations and associations.

Firms whose involvement is documented by the Centers fit into three categories. The first category includes businesses, producers, or firms with which the Center has a commercial or consulting relationship. In the case of HealthForce, this category includes hospitals and clinics. Category two includes organizations and associations related to the industry, sector, or general economic or workforce development (such as the Minnesota High Tech Association, the non-profit Workforce Development, Inc., or a hospital foundation). The final category includes government (local, state, and federal) entities or departments, such as school districts or public health departments. This also includes public higher education institutions not in the state colleges and universities system.

Centers have identified the direct involvement of 383 unique organizations from 2006 through 2009. This includes 132 firms who were identified in more than one year. It should be noted that due to leadership turnover at HealthForce during 2007, an industry involvement worksheet was not collected for that year, so the overall number and 2007 numbers under-represent the actual number of firms involved in the Centers. Figure 2 below summarizes the information. The column headed "any year" shows the unduplicated number of organizations that have been involved in at least one year. The final column, headed "multiple years," shows the number of organizations that have been involved with the Center over more than a single year.

2. Organizations directly involved with the Centers of Excellence, 2006-2009

	2006	2007	2008	2009	Any year	*Multiple years*
Businesses and producers	130	100	120	121	285	*102*
Organizations and associations	25	8	33	39	74	*22*
Government entities and departments	8	4	14	11	24	*8*
Total (unduplicated)	**163**	**112**	**167**	**171**	**383**	***132***

Note: 2007 does not include complete numbers for HealthForce.

The kinds of involvement tracked by the Centers include hosting student interns, requesting research or consultation, financial (including in-kind) support, and other types of involvement. However, across all years, the most significant type of involvement has been participation in advisory committees and other workgroups. See Figure 3 for the numbers of firms and hours of participation in Center groups.

3. Organizations involved with Center advisory and other work groups, by Center, 2009

	360°	Advance IT	HealthForce	MnCEME
Advisory group (firms)	10	20	11	30
Advisory group (hours)	95	200	69	320
Other workgroups (firms)	67	44	14	14
Other workgroups (hours)	2,282	981	117	760

The differences among Centers in hours of participation reflect different types of engagement and activity across the Centers. For example, the large number of workgroup hours at 360° reflects the involvement of Dream It. Do It. groups at each of the partner institutions, as well as the participation of advisory groups for different grants, and partnership with the Ingenuity Frontier on the IDEA competition.

K-12 outreach

To better illustrate the extent of the Centers' outreach activities among K-12 students, Center staff reported their 2009 (calendar year) activities, including the duration and number of participants for each. Not including Project Lead the Way, 44 Center-related outreach activities were documented. These reached 4,469 youth (ages 9 - 18) and accounted for approximately 35,000 participant-hours of outreach (Figure 4).

Advance IT had the most separate activities (20), and MNCEME had the most participants (2,796) and participant hours (17,400). MNCEME's large number of participants and hours reflects their work with four large multi-day summer camps and one large speaking event with Ann Bancroft (with a reported attendance of 2,050).

4. K-12 outreach activities by type of outreach and Center, 2009 calendar year

	360°	Advance IT	HealthForce	MNCEME	Total
Camps, workshops, or academies	7	8	2	8	25
Participants	431	183	485	296	1,395
Participant-hours	5,250	4,451	3,349	13,300	26,450
Events, presentations, or career days	6	12	0	1	19
Participants	554	370	-	2,050	2,974
Participant-hours	3,324	1,250	-	4,100	8,674
Total activities	**13**	**20**	**2**	**9**	**44**
Participants	**985**	**553**	**485**	**2,796**	**4,469**
Participant-hours	**8,574**	**5,701**	**3,349**	**17,400**	**35,124**

Note: Numbers for participant hours are estimates computed by Wilder Research based on Center documentation of participation and hours of duration.

In addition, HealthForce reported activities in support of regular full-year academic programs in two high schools:

- **Bloomington Public Schools:** Help support the creation of a "college in the schools" Heath Sciences/Biomedical program for 4,126 high school students in a highly diverse community.
- **Minneapolis Community and Technical College:** Help create a bridge from high school to college for 297 students requiring remediation.

MNCEME and 360° also have significant involvement in the Project Lead the Way (PLTW) program in middle schools and high schools around the state. MNCEME supports a PLTW outreach coordinator as part of its main Center staff. MNCEME reporting shows that their PLTW efforts fully certified 38 teachers and administrators in seven independent school districts during the 2009 calendar year (Figure 5). All together, 130 teachers and administrators in 19 independent school districts have been fully certified (and are currently still certified) since 2006, through the outreach efforts by the

MNCEME PLTW coordinator. This certification allows students completing courses to be eligible for college credits.

5. Number of PLTW certifications of people and school districts in Minnesota, 2006-2009

	2006	2007	2008	2009
Newly certified teachers and administrators	27	56	9	38
Newly certified school districts	4	7	2	7
Total number of certified teachers and administrators	**27**	**82**	**91**	**130**
Total number of certified school districts	**4**	**11**	**13**	**19**

Source: Records maintained by Project Lead the Way (PLTW) / Minnesota Center for Engineering and Manufacturing Excellence (MNCEME); calculations by Wilder Research.

Adult outreach and noncredit activities

During 2009, 360° reported two main adult outreach activities serving 29 west central Minnesota guidance counselors and technical education teachers. The two single day workshops shared information regarding careers and technology in the industry and accounted for a total of 232 participant hours. The workshops were provided through Minnesota State Community and Technical College.

Advance IT reported a total of 935 participants and 12,952 participant hours in adult noncredit and outreach activities. These include:

- **Secure 360 Conference.** Two day industry gathering and conference. (518 total people)
- **Secure 360 Hacker Workshop.** Single day workshop on IT auditing from the hacker's perspective. (42 total people)
- **Check Point Encryption Training.** Five single day sessions with State of Minnesota employees and two single day sessions with Minnesota State Colleges and Universities ITS staff. (59 total people)
- **Application Development Security.** Three two-day sessions with Minnesota State Colleges and Universities ITS staff and two sessions with State of Minnesota employees. (166 total people)
- **Executive Briefing.** A single day session with State of Minnesota employees. (150 total people)

During 2009, MNCEME did adult outreach and noncredit activities with 215 participants totaling 1,368 participant hours. These include:

- **Maximize Minnesota on ISO 50001.** Event included people from industry, DEED, and the State Legislature. (38 total people)
- **Customized training.** Online training through Alexandria Technical College with incumbent workers from Douglas Machine. (68 total people)
- **Metal fabrication training.** Offered through the Minnesota Manufacturing Sector Initiative serving low-income and incumbent workers wanting to prepare for careers in manufacturing and metalworking. (9 total people)

During 2009, HealthForce adult outreach and noncredit activities included 1,814 participants. Examples include:

- **Adult Scrubs Camp.** With Winona State University. (89 total people)
- **Support diverse incumbent employees to advance in health care careers.** With Project for Pride in Living. (148 total people)
- **Support bilingual community residents to enter health care careers.** With Mankato Public Schools. (33 total people)
- **Educate teen parents about health care career options by redesigning STEM curriculum.** With Hired, Inc. (195 total people)
- **Health Support Specialist program development.** With Aging Services. (11 total people)
- **Integrate simulation in nursing curriculum.** With Winona State University. (1,000 total people)
- **CNA training for White Earth Indian Reservation.** With Northland College. (128 total people)
- **Further develop LEAD Collaborative for statewide implementation.** With Winona State University, Minnesota State University–Moorhead, Alexandria Technical College, and Northland College. (188 total people)
- **Support first doctoral cohort.** With Winona State University, Metropolitan State University, Minnesota State University–Moorhead, and Minnesota State University, Mankato. (17 total people)

Through these and other events and activities, the four Centers directly reached approximately 3,000 adults. These include incumbent workers, displaced workers and other potential learners, as well as a variety of others including teachers, guidance counselors, and workforce professionals. These non-credit activities add substantially to the impacts that are achieved through regular for-credit courses of affiliated departments and programs.

Web presences and social media

All four Centers have significant internet presences. Each has its own Center website and all also use social media for marketing and to reach potential audiences. Below are some of the highlights of the Centers' internet presences:

- **360°.** Between July 1, 2009 and December 31, 2009, the 360° website had 20,568 page views from 8,462 unique visitors. During the same time, the Dream It. Do It. website had 12,508 page views from 8,523 unique visitors. Facebook generates the largest amount of traffic to 360°'s websites. During those six months, two-thirds (68%) of traffic to the 360° website and 87 percent of traffic to the Dream It. Do It. website was generated through their presence (advertisements and the 360° group page) on Facebook. The numbers for the 360° website were up considerably in just the first six months of fiscal year 2010 over the entire 2009 fiscal year (12,749 page views from 2,899 unique visitors).

- **MNCEME.** Between May 1, 2009 and December 31, 2009, the MNCEME website had 63,783 page views during 5,807 visits from 3,624 unique visitors. Between October 1, 2009 and December 31, 2009, the Maximize Minnesota website had 2,997 page views during 756 visits from 428 unique visitors. MNCEME receives additional national exposure through the link to CareerMe, for which MNCEME is a regional center. CareerMe is part of the National Center for Manufacturing Education. Also, MNCEME has more than 400 followers on Twitter.

- **Advance IT.** From July 2009 through March 2010, the Advance IT website had 19,295 page views during 4,423 visits by 2,578 unique visitors. Between March 1, 2009 and March 1, 2010 the MnIT Careers website had 17,387 page views during 4,998 visits from 2,500 unique visitors.

- **HealthForce.** Over the 2009 calendar year, the HealthForce website had 7,143 visits from 4,316 unique visitors. The Scrubs camp page on the HealthForce website was viewed 3,210 times.

The available statistics are hard to combine, as they are from different service providers and for different time periods. However, making some conservative assumptions about overlap in visitors from related sites, we calculate that the annual number of visitors for all the Centers' sites combined is at least 24,000 unique individuals, or more than seven times as many as the students who graduate from Center-affiliated programs in a year. The numbers also appear to be growing as the sites become more established and the marketing efforts more mature.

Web presences of the Centers reflect differences in their environments and priorities. Both 360° and MNCEME are coordinating work to market the field of manufacturing with national efforts (Dream It. Do It. and CareerMe). In a field in which such coordinated efforts do not already exist, Advance IT has helped to form a new partnership for this purpose (Minnesota IT Careers) and developed its own career opportunities web site.

Reputational survey of industry leaders

In conducting the reputational survey, nearly one-third of the industry leaders in the list of intended respondents were found to be significantly engaged with one or more Centers. For findings about reputation, we restricted our analysis to the perceptions of only those 15 participants who did not have direct ties to any Center. The survey results are instructive.

Ninety-three percent of the respondents immediately recognized or identified one or more aspects of Center activities, and 87 percent were aware of the system-wide initiative to create industry-specific Centers of Excellence. While industry leaders were not uniformly knowledgeable about the activities in which Centers were engaged, taken together their responses suggest an encouraging view of the purpose and activities associated with Centers of Excellence. For example, when asked to describe what Centers of Excellence actually do, industry leaders said they…

- help organizations by supplying grants to support new, better, more efficient ways of training
- respond to industry in a way that is more nimble than the individual Minnesota State Colleges and Universities and the system office can respond
- help develop and align curriculum to help students transfer from one school to another
- bring in students interested in the industry and provide employers with highly skilled workers for that industry
- concentrate on developing a highly skilled workforce to address future workforce shortages

- coordinate curriculum between institutions
- help interest people and inform them about careers in manufacturing
- try to change the image of manufacturing
- offer new training options including online training
- provide hands-on learning experiences

A few industry association leaders felt that the Centers were not yet well recognized and could benefit from more outreach. One expressed frustration, saying that the Centers were "... more talk than action." Overall however, their comments indicate a growing reputation as a positive initiative, supporting visibility for manufacturing and technology, and providing advanced education and quality training opportunities.

In addition to these findings from industry leaders not directly involved in the Centers, the in-depth engagement of other industry and trade association leaders is itself evidence of the growing reach of the Centers. This level of involvement also shows that Centers' connections with the associations at the top levels in their fields have grown beyond mere awareness and into active participation. This is true for all four Centers.

Evidence of impact

The primary source of information about Center impacts is the survey of stakeholders. Results from the survey are summarized below in sections that correspond to each of the six core Center objectives. Where available, we also present evidence of impact from other sources.

1. Create new pathways for communication and collaboration among industry leaders, education and learners

Stakeholder survey results

Over 90 percent of stakeholders reported that the Center had "***helped to increase communication among colleagues in different programs or institutions,"*** including two-thirds of stakeholders who said it helped "a lot."

- Responses were about equally strong among all groups of stakeholders (faculty, administrators, industry partners, and K-12 partners).

- Responses were highest among 360° representatives (85% of whom reported "a lot" of impact) and HealthForce representatives (75% "a lot"), and lower among those at MNCEME (56%) and Advance IT (39%).

Examples they provided, and the impact on their organizations, include the following:

> It goes both ways. Industry is so much more aware of what is being offered. And MnSCU is more aware of our needs. Before HealthForce, I had never been asked about our needs. (HealthForce industry partner)
>
> There is a better understanding of how to align outcomes in courses with separate educational goals and a better understanding of the alignment of courses as related to articulation agreements. (Advance IT administrator)
>
> The regular deans meetings did not happen before MNCEME. Now they happen consistently, and have built a level of trust and cooperation which wouldn't exist otherwise. (MNCEME administrator)
>
> It's made faculty, staff, and administrators realize they are *not* [just] the regional centers – they can now deal with any place in the world. I've been able to place students at companies outstate – it will impact MN because a lot of what out-of-state companies are doing will come back to me – those companies have higher edge – they do come/look to MN because of our higher education. (360° faculty)
>
> Becoming aware of the programmatic offerings across all the collaboration [partner schools] helps us meet the needs of all our students. Without all those offerings, we wouldn't be able to help them all in directions they want to pursue. (360° administrator)
>
> From their conversations, I can tell that the academic leaders are definitely collaborating more than they were before. … It is *clear* there are closer partnerships, where there used to be only competition. They are much more cooperative now. (HealthForce industry partner)

More detailed follow-up questions were asked of respondents who identified general impacts related to communication and collaboration.

- Most (83%) of survey participants responding to this detailed portion of the survey reported that their Center involvement had put them in touch with new colleagues.

- Industry partners were asked whether or not Center related activities had introduced new ideas or resources to their firm or sector. All responded yes, and nearly 60 percent said this had happened "a lot."

- Similarly, faculty and administrators were asked if their Center involvement helped introduce new resources to their program or institution. Again, all responded yes, and two-thirds said this had happened "a lot."

- Finally, college and university administrators were asked about the extent to which Center work had helped to position their institution with key industry or related partners. All respondents said that it had, and more than one-third reported that this had happened "a lot."

Taken together, these results indicate a clear and consistent Center impact on communication among stakeholders.

2. Identify industry opportunities and innovations, and the workforce preparation they require

Stakeholder survey results

Over 90 percent of stakeholders reported that the Center helped ***"increase communication between educators and people in industry,"*** including 60 percent who reported it helped "a lot."

- Faculty gave slightly higher "yes" responses, and administrators slightly lower.

- A higher proportion of Advance IT respondents reported "a little" impact rather than "a lot" (33% "a lot"). The strongest responses were from HealthForce respondents (63% "a lot").

Examples of the evidence, and the impact of this increased communication, include the following:

> They have done a lot to open training programs to us. It used to be just telling us what they have to offer. Now they ask us what we need.
> (HealthForce industry partner)
>
> Educators are coming with more information now to industry functions and are much better equipped to ask appropriate questions to ascertain industry needs.
> (360° industry partner)
>
> At the beginning, there was disconnect between industry and education. Industry thought of us as necessary but not very relevant. Education saw industry as whiners. Now both see the other's competence and the challenges the other faces.
> (HealthForce faculty)

> The regular interaction between college leadership and the industry advisory board have made it obvious that those interactions are needed regularly, and that education representatives need to listen more than they speak. (MNCEME administrator)
>
> I see a deeper knowledge of IT transition and the impact on individual workers and how that gets people more quickly into better jobs. (Advance IT industry partner)

More detailed follow-up questions were asked of respondents who identified general impacts related to increased communication with and input from industry.

- In one set of follow-up questions, respondents were asked whether or not Center activities had caused educators to become more aware of current innovation or challenges in industry. Respondents to this question overwhelmingly (83%) reported that this was true.

- Similarly, more than four out of five faculty and administrators with knowledge of this topic reported that students were being better prepared for careers as a result of the Centers.

- Half of the industry partners reported that they had already seen evidence that center activity had strengthened their access to qualified employees, and an equal proportion indicated that Center activity had helped to upgrade the skills of current employees. These lower proportions reflect the fact that these outcomes take longer to develop.

3. Help learners of all ages discover and prepare for careers within Center focused industries

Stakeholder survey results

Over 90 percent of stakeholders reported that the Center ***"helped learners become more aware of careers in the field,"*** including 65 percent who reported it helped "a lot."

- Faculty and K-12 partners gave higher responses, and administrators and industry slightly lower.

- Responses were highest among 360° respondents (95% "a lot") and lowest among Advance IT (39% "a lot").

- The total percent of "yes" responses, combining "a lot" and "a little," was the same across all groups.

The following quotations from the interviews illustrate the kinds of evidence cited by respondents for increases in learners' preparation for careers:

> A lot comes from the web-site – internships and job opportunities are posted; students can go there any time. Also, there are opportunities for students to go to conferences where they can make connections and learn about job opportunities. (Advance IT administrator)
>
> MNCEME institutions are validating it [Project Lead the Way] with articulation agreements and put their money where their mouth is. Opportunity for admission is tangible from you to us. (MNCEME K-12 Project Lead the Way partner)
>
> That's an ongoing project – we work to make all aware of the opportunities and options, and the demand in manufacturing and health care. What 360° does, helps what we do. We want to keep people in the state, and create more alignment across the state. (360° industry partner)
>
> We work with high school students through PLTW. The training that teachers go through to teach PLTW increases instructors' knowledge in different career paths and industry (STEM). That knowledge carries over to the students. (MNCEME industry partner)
>
> IT college classroom visits and the marketing materials about careers. There are also visits to K-12 classrooms. (Advance IT industry partner)
>
> Students asking more questions, and they have talked to professionals in the field, have shadowing experience, have done plant tours...we have seen an increased number of students doing that. (360° administrator)

In addition, 89 percent of stakeholders reported that the Center ***"helped learners become better prepared for careers in the field,"*** including 61 percent who reported it helped "a lot."

- Again, faculty and K-12 partners gave the strongest responses (75% and 71% "a lot," respectively). Administrators (48% "a lot") were less positive than industry partners (65% "a lot").

- Responses were highest for 360° (75% "a lot") and HealthForce (71% "a lot"), and lower for Advance IT (50% "a lot") and MNCEME (44% "a lot").

Some of the respondents who reported a high level of impact relating to career identification and preparation in general were asked a series of follow-up questions about more specific changes and impacts that they had observed.

- All such respondents were asked if the work had led to more student interest in the field. All said that it had, and 61 percent said this had happened "a lot."

- Faculty, administrators, and K-12 educators were asked if Center-affiliated student engagement activities had resulted in students having a more realistic idea about careers in the field. All said yes, and nearly three-quarters said that this had happened "a lot."

- Finally industry partners were asked whether or not job applicants were better prepared as a result of the Centers, and whether or not job applicants had more realistic career expectations. All industry partners indicated that both of these outcomes had occurred. This included 58 percent who indicated it had happened “a lot” that applicants had come with more realistic career ideas, and 42 percent who reported it had happened “a lot” that job applicants were better prepared.

These results are encouraging, but also reflect the length of time required for Centers to be in operation before having a substantial impact on the preparation and expectations of job applicants – especially when the preparation work to create these outcomes begins in upper elementary school or middle school.

Impacts of support for Project Lead the Way (PLTW)

During February and March 2010, MNCEME staff surveyed all PLTW contacts in their database statewide to document the kinds of support they have received from MNCEME and what that support has meant to them. Responses were received from 206 individuals, including 127 teachers, 59 school administrators, and 22 others including counselors. These individuals, in school districts across the state, from north to south and from urban through suburban to rural, overwhelmingly praised the support they received from MNCEME through the PLTW coordinator: 50 percent rated it as “extremely effective” in meeting their needs, and 38 percent rated it “very effective.” Support helped schools in several related ways, including:

- Implement PLTW (77%)

- Support PLTW (85%)

- Sustain and/or secure funding for PLTW (45%)

- Obtain certification for programs and/or teachers (60%)

- Training for teachers or counselors (64%)

Over half (53%) report that there would be major changes in their programs if this support were no longer available, and an additional 11 percent report that their programs would cease to exist without the support.

Representative comments about the impact of these services include:

> Our school has several incredible courses that would not be available to our students if not for PLTW/MNCEME. Every day nearly one hundred students are thrilled to go to a class they love. Over the course of the school year we have approximately 200 students involved in PLTW courses and we should have more every year for the next few years.
>
> PLTW has impacted the way I teach. Students engage in real-world applications and project-based learning, applying their problem-solving skills creatively in teams to approach engineering problems. MNCEME supports this by communicating opportunities for professional development and by serving as a resource for information.
>
> We have been able to start a viable program for students with the backing of the validation of Project Lead the Way and MNCEME. For years our students have received many of the skills that are a part of PLTW, but not with the high level of training, leadership, organization, and curriculum that PLTW and MNCEME provided.

4. Encourage cross-campus activity that strengthens learner opportunities and creates premiere course offerings

Stakeholder survey results

Three-quarters (75%) of respondents reported that the Center ***"helped to increase cross-campus cooperation to strengthen learning opportunities,"*** including 39 percent who reported that it helped "a lot."

- Respondents reporting this helped "a lot" were more common at 360° (55%) and HealthForce (50%), and less common at MNCEME (28%) and Advance IT (17%).

- K-12 partners were most likely to say that Centers had helped "a lot" in this area (3 of 4), followed by faculty (57%), industry partners (35%), and administrators (28%).

Over half (55%) of all faculty and administrators reported at least one example of cross-campus activity that was not in place prior to the Centers. These include:

- New shared positions (18%)

- New shared courses (15%) (most of the new shared courses are online or blended)

- New articulation agreements or memoranda of understanding for block transfer of credits (31%)

- Other new intercampus agreements, such as joint grants, interagency agreements for services, shared curriculum development, and shared research (16%)

Faculty and administrators cite many advantages that they have observed from the shared arrangements, including sharing scarce or expensive resources, networking with colleagues elsewhere in the system, less likelihood of having to cancel low-enrollment courses, enhanced ability to recruit talent, ability to create unique positions no single institution could afford to fund, increased access and completion opportunities for students, and more efficient services for businesses. They cite only a few disadvantages, including mainly the additional time required to coordinate shared positions or programs. However, respondents overwhelmingly reported that the advantages outweigh the disadvantages.

> Now we have students who can do the 2-year program at other campuses, or online, specifically, with little overhead on their part. (360° faculty representative)
>
> The sharing is a big deal, because a student can be in Thief River Falls and take the lecture or online portion of it from home. …When it's time to do the lab component, he can take his lab component at a partner school that's located closer to him, rather than driving all the way out to St. Cloud. (360° faculty)
>
> Individuals can pick the correct courses for their goals, rather than the ones offered locally, with no need to repeat courses. There is more cooperation between colleges. It helps get them the things they need, with no redundancy. (360° industry partner)
>
> At Metro State, there are two separate colleges, and they both have IT groups. These two groups are both present at meetings, and we talk and collaborate. This has the effect of strengthening learning opportunities for all. Also, this collaboration affects the process of how we do things in MnSCU, because it is more inclusive – the Deans meet together to share ideas. (Advance IT administrator)
>
> [The Center has] created the venue and forum for sharing projects, sharing successes, sharing best practices. That helps leverage successful projects that are being showcased, and leads to collaboration among other institutions. (HealthForce administrator)
>
> [The advantage is a] lack of redundancy, and very few gaps in the curriculum, because we talk a lot. (HealthForce faculty)

Benefits from cross-campus work are also perceived by those who are not currently partners. The advantages are attractive enough that several other institutions have asked to be allowed to join. During the last year, Lake Superior College has officially joined both 360° and HealthForce, and Inver Hills Community College has been added to HealthForce. Additionally, the four Centers collectively have also received requests from one university and four other colleges.

5. Champion changes in content and delivery of educational services that will meet the workforce needs of tomorrow

Stakeholder survey results

Three-quarters (75%) of respondents reported that the Center ***"contributed to changes in content or delivery of educational services,"*** including 36 percent who said it contributed "a lot."

- Responses were highest at HealthForce (54%), and lowest at MNCEME and Advance IT (22% each).

- K-12 and faculty representatives most often reported these changes (50% of each), with administrators less aware of them (36%) and industry least (30%).

Respondents provided substantial evidence of the Centers' contributions to innovation and responsiveness to changing needs. The following excerpts from surveys illustrate some of the ways in which Centers have done this:

> They listen to industry and students, and design solutions to needs – flexible, yet strategic. (360° industry partner)
>
> Listening to the voice of the customer – what do they want – schools will figure out pathways to help achieve the students' educational goals. (HealthForce industry partner)
>
> Instrumental in formation of engineering program that teaches engineering in a whole different way. It connects instructors with other innovative instructors. (MNCEME industry partner)
>
> There are an increased number of online courses. This improves access for students. And the modules expedite progress. (Advance IT administrator)

All respondents were also asked whether they could ***"name a process or product developed with the help of the Center that addresses an industry or workplace need better than before."*** Two-thirds (66%) of all respondents named such an innovation that the Center had helped create, citing examples including materials on career development,

camps and other programs to spark interest and motivation among school children, sophisticated health care simulations, a survey of business needs, applied research and consulting for industry, and new curriculum, courses, and entire programs.

Faculty and administrator respondents were also asked whether they could ***"name a process or product developed with the help of the Center that addresses an educational need better than before."*** An even higher proportion – 84 percent – named such innovations, which included articulation agreements and educational pathways, a learning assessment tool, novel delivery mechanisms for courses, new and strengthened curricula, internships, student competitions, and other activities for engaging students and enhancing their learning, informational materials to inform students and prospective students about educational opportunities, a program to support prospective entrepreneurs, and processes to coordinate previously disparate components.

Finally, respondents who indicated they were aware of innovations supported by the Centers were asked if they were aware of ***"any other programs, institutions, or organizations that have adopted a similar approach based on the Center's experience."*** One-quarter of respondents reported that they were aware of instances of the replication of Center-related innovations. The most commonly cited examples were wider use of new curriculum, the addition of new programs to existing shared courses, programs, or articulation agreements, and the wider use of outreach materials and programs. Some respondents were unable to cite specific examples. Nevertheless, the one-quarter figure is likely a low estimate of the actual extent of wider effects, since the most knowledgeable sources for such information would be those outside of the current Centers. Evidence of this was provided by a representative of a new Center partner institution, Lake Superior College, who was interviewed in this survey. (The institution joined both 360° and HealthForce; however, the interview was with an individual who was most familiar with HealthForce.) Asked about the institution's reasons for joining, the administrator replied:

> I know we were benefitting from things HealthForce was doing long before, just as I know programs all over within MnSCU are benefiting now from seeing what HealthForce is doing and learning from that, without having become part of HealthForce.

6. Produce revenue and leverage resources to power these objectives

Stakeholder survey results

Two-thirds (67%) of respondents reported that the Center ***"helped departments or programs acquire other funding or resources,"*** including 34 percent who said it helped "a lot."

- Respondents who reported that this had happened "a lot" were most common at 360° (45%) and MNCEME (40%), followed by HealthForce (33%) and Advance IT (17%).

Respondents were also asked whether departments or programs had been helped by the Center to ***"benefit from or leverage capacities or resources elsewhere in the system to strengthen your own work."*** (Industry representatives were asked whether the Center had ***"helped MnSCU schools or their programs to partner with or leverage capacities elsewhere in the system to strengthen their work or serve industry better."***) As in the first question, two-thirds (67%) reported such help, including 34 percent who reported "a lot" of help.

Respondents described these benefits in the following ways:

> Meeting with others, seeing what they do, being able to bring those things to your campus. Making changes in what we do. I toured other campuses, came back, and said we are antiquated, and we got working on changing things here. (360° administrator)
>
> MnSCU institutions working with our foundation, DEED, regional economic development, and with industry itself. (360° industry partner)
>
> One example is Alexandria Technical College. They're spreading the word and getting people involved in more industry-related studies. Those are types of examples where it's catching ... you think other schools would walk away saying, "hey, we should do things like that." (MNCEME industry partner)
>
> Regional conversations allow for leveraging and cooperation among individual campuses that we would otherwise not have access to. (HealthForce faculty)
>
> We've been able to apply for other grants because of our expertise in IT. For example, submitting proposals for STEM summits, or for initiatives through the larger MnSCU system. (Advance IT administrator)

Respondents who reported "access to other funding or resources" were asked to provide examples. Many of the examples they gave were of accessing Center funds, not of leveraging the Center to access *additional* resources. However, in the follow-up questions of 11 respondents who indicated outcomes related to leveraging resources, it was clear that their association with the Center had helped some of them to access additional funds. About half of the group had submitted proposals for outside funding in which they proposed to work together with Center partners, and about one-third of the group had received grants based at least in part on that connection. In addition, about half had submitted proposals for outside funds in which they had mentioned their connection to the Center as part of the justification for their qualifications or capacity to do the work. One-third of the group (4 of the 11 responding to these follow-up questions) had received such grants. MNCEME and Advance IT faculty and administrators were the most likely to report having submitted or received such grants.

There are also several comments from respondents citing increases in less tangible resources for their institutions and programs, such as reputation and credibility. Attendant on such gains are more tangible impacts, including gains in student enrollment and improved ability to recruit faculty. There are also several comments specifically citing the value added by the Centers through their function as conveners, to leverage existing resources by bringing them together.

> It has helped this college attain more of the market share, because as people saw what the collaboration is, there is a new perceived value to attending our college as part of the Center rather than a stand alone college. The reputation of the Center is growing and is helping the reputations of the individual colleges by being associated with a reputable Center. (360° administrator)
>
> The Center helped us provide a third-party service/entity to bring resources together – we couldn't do it by ourselves. (Advance IT administrator)
>
> It's nice to have a central group that represents the system. The joining of HEIP [the former Healthcare Education-Industry Partnership] and HealthForce, that brings the best of them together. It's kind of a one-stop-shopping. It's better for the colleges to have one place to go to. For example, they [HealthForce] watch for grant opportunities for people to participate in. (HealthForce industry partner)
>
> Just being part of MNCEME and its name recognition helps to open doors with business, and when looking at grant monies. (MNCEME administrator)

Additional funds leveraged by the Centers

Data shared by the Centers with Wilder Research show the amount of additional funding received or leveraged by the Centers. These do not include the Center's allocation from the Board of Trustees for the year. The amounts shown in Figure 6 below reflect funds received during the year that were either entirely for the direct benefit or use of the Center, or were leveraged for a department or program because of its association with the Center.

The total amount of funding reported for 2008-09 is just over $9.7 million for the four Centers combined. Data collected for the 2006-2009 evaluation reports showed a total of just over $15.6 million leveraged by the four Centers over that three-year period. This year's figures thus represent a substantial increase from the prior annual average, and is also substantially larger than in any previous year.

There are many possible contributing reasons for this growth in funding. One is the increased maturity and credibility of the Centers as grantees and partners, based on their initial three years of work. Another factor that may have contributed to some part of the increase is the availability of federal economic stimulus funds. The large increase in funds from private sources in 2009 includes a multi-million dollar contribution for

MNCEME's work on the development of the Bachelor of Science in Engineering program on the Iron Range.

6. Leveraged funds, 2008-2009, by type of source and year

	2006	2007	2008	2009
Office of the Chancellor special projects funds (e.g. online courses)	$860,490	$761,000	$424,486	$163,604
Other MnSCU colleges and universities	$859,623	$84,525	$568,856	$1,196,672
Local (school, city, county)	$5,000	$91,600	$306,065	$321,364
Other state agencies (e.g., MnDOT, Job Skills Partnership)	$1,968,731	$549,283	$417,050	$2,551,095
Federal	$2,303,373	$0	$1,695,043	$2,514,073
Public sources, sub-total	$5,997,217	$1,486,408	$3,411,500	$6,746,808
Private sources, combined	$794,908	$2,122,850	$1,827,114	$3,756,115
Total amount	$6,792,125	$3,609,258	$5,238,614	$10,502,924

Source: Data provided by Centers, with calculations by Wilder Research. Private sources include private corporations, industry associations, corporate foundations, and other foundations.

Figure 7 below subdivides the amounts shown in Figure 6, to show the proportion of funds brought in to support the work of associated departments and programs and those more directly supporting Center operations. The proportion varies considerably among the Centers. Overall, the number of dollars coming through Center budgets decreased by $100,000 from the 2008 level, which is a small fraction of the total amount. In 2008, funds received by the Centers themselves were 15 percent of the total leveraged funds. This proportion dropped to 6 percent in 2009 not because of this small drop in absolute dollars, but primarily because the total value of non-Center leveraged funds grew by a very substantial amount.

The Centers' ability to raise funds specifically to support their own operations is constrained by their "virtual" status, which requires them to have a fiscal agent for any such funds. Without an official status that gives them standing to receive and manage funds independently, it may be difficult for Centers to significantly increase their level of self-support.

7. Leveraged and matched funds received in 2009, by Center and whether funds flow through Center budgets or not

	Overall leveraged funding		360°	MnCEME	AdIT	Health Force	TOTAL
Public sources of funding	Office of the Chancellor special projects funds	Center			129,804	33,800	163,604
		Non-Center					
		Total			$129,804	$33,800	$163,604
	Other MnSCU colleges and universities	Center					
		Non-Center	717,211			479,461	1,196,672
		Total	$717,211			$479,461	$1,196,672
	Local (school, city, county)	Center					
		Non-Center				321,364	321,364
		Total				$321,364	$321,364
	Other (non-MnSCU) state agencies	Center	202,000		50,000		252,000
		Non-Center	863,926	1,420,329		14,840	2,299,095
		Total	$1,065,926	$1,420,329	$50,000	$14,840	$2,551,095
	Federal	Center	161,404		5,000		166,404
		Non-Center	134,669	1,900,000	313,000		2,347,669
		Total	296,073	$1,900,000	$318,000		$2,514,073
	Total from public sources	***Center***	**363,404**		**184,804**	**33,800**	**582,008**
		Non-Center	**1,715,806**	**3,320,329**	**313,000**	**815,665**	**6,164,800**
		Total	**$2,079,210**	**$3,320,329**	**$497,804**	**$849,465**	**$6,746,808**
Private funding	Scholarships or sponsorship (e.g. camps or seminars)	Center					
		Non-Center	25,272	10,000	175,500		210,772
		Total	$25,272	$10,000	$175,500		$210,772
	In-kind donations or equipment	Center					
		Non-Center	8,000	698,837			706,837
		Total	$8,000	$698,837			$706,837
	Other grants, contracts, or funding	Center	15,000				15,000
		Non-Center	3,000	2,500,000		320,506	2,823,506
		Total	$18,000	$2,500,000		$320,506	$2,838,506
	Total from private sources	***Center***	**15,000**				**15,000**
		Non-Center	**36,272**	**3,208,837**	**175,500**	**320,506**	**3,741,115**
		Total	**$51,272**	**$3,208,837**	**$175,500**	**$320,506**	**$3,756,115**
Total		**Center**	**378,404**	**0**	**184,804**	**33,800**	**597,008**
		Non-Center	**1,752,078**	**6,529,166**	**488,500**	**1,136,172**	**9,905,916**
		Total	**$2,130,482**	**$6,529,166**	**$673,304**	**$1,169,972**	**$10,502,924**
		Center%	**18%**	**0%**	**27%**	**3%**	**6%**
		Non-C%	**82%**	**100%**	**73%**	**97%**	**94%**

Source: Data provided by Centers, with calculations by Wilder Research.

Summary of impacts

The tables on the following pages summarize the responses to the broadest questions about impacts for each of the six Center objectives. In Figure 8 these are grouped by Center, and in Figure 9 they are grouped by the type of respondent.

It is important to recall that not all impacts are reflected in these survey findings. For example, most administrators and faculty members – even those most involved in the activities of the Centers – are not aware of the impact of Project Lead the Way on the career awareness or level of preparation of middle school and high school students. The responses shown here only reflect respondents' assessments of the impact of those activities with which they are themselves the most directly involved. In this respect, it is a somewhat conservative estimate of impact.

Not surprisingly, objectives 1 through 3 show the greatest evidence of impact by the Centers of Excellence. These three objectives represent initial steps that help to lay the groundwork for the latter three. Impacts seen in these objects are leading indicators for potential longer-term impacts in the other objectives.

Within specific objectives, there are some notable differences in ratings among different stakeholder groups. For example, 79 percent of faculty report "a lot" of impact in helping learners become more aware of careers in the field (row 3a), compared to 60 percent of administrators and 59 percent of industry. Given the closer contact that faculty have with learners, it is likely that the different ratings reflect different levels of awareness, combined with caution not to over-estimate impact on the part of administrators and industry representatives. It is also possible that faculty are reporting about change in one group of students – those they see on a regular basis – while the other groups are thinking of a larger pool of learners (such as all students in a program, for administrators, or all job applicants, for industry representatives).

Differences among Centers reflect an assortment of influences. In addition to specific Center strategies and activities, such influences also include differences in the structures and needs of the industry sectors they serve, as well as in the history and current capacities of the institutions and programs that are included in the Centers. It is likely that Advance IT's lower impact in cross-campus cooperation for learning opportunities (row 4) is related to its smaller number of institutional partners, and its lower impact in increasing communication between industry and education (row 2) is related to the more fragmented structure of the industry sector. Also, as previously mentioned, MNCEME's lower ratings for helping learners become better prepared for careers in the field (row 3b) reflects a small number of stakeholders who are familiar with the impacts of Project Lead the Way.

8. Overview of findings, by objective and Center

Objective	360° N=20		MNCEME N=18		Advance IT N=18		HealthForce N=24		Total N=80	
	N	%	N	%	N	%	N	%	N	%
1. Helped increase communication among colleagues in different programs or institutions	**19**	**95%**	**17**	**94%**	**15**	**83%**	**22**	**92%**	**73**	**91%**
A lot	*17*	*85%*	*10*	*56%*	*7*	*39%*	*18*	*75%*	*5*	*65%*
A little	*2*	*10%*	*7*	*39%*	*8*	*44%*	*4*	*17%*	*21*	*26%*
2. Increased communication between educators and people in industry	**20**	**100%**	**15**	**83%**	**17**	**94%**	**24**	**100%**	**76**	**95%**
A lot	*13*	*65%*	*12*	*67%*	*6*	*33%*	*17*	*71%*	*48*	*60%*
A little	*7*	*35%*	*3*	*17%*	*11*	*61%*	*7*	*29%*	*28*	*35%*
3a. Helped learners become more aware of careers in the field	**20**	**100%**	**17**	**94%**	**15**	**83%**	**24**	**100%**	**76**	**95%**
A lot	*19*	*95%*	*10*	*56%*	*7*	*39%*	*16*	*67%*	*52*	*65%*
A little	*1*	*5%*	*7*	*39%*	*8*	*44%*	*8*	*33%*	*24*	*30%*
3b. Helped learners become better prepared for careers in the field	**18**	**90%**	**17**	**94%**	**14**	**78%**	**22**	**92%**	**71**	**89%**
A lot	*15*	*75%*	*8*	*44%*	*9*	*50%*	*17*	*71%*	*49*	*61%*
A little	*3*	*15%*	*9*	*50%*	*5*	*28%*	*5*	*21%*	*22*	*28%*
4. Helped to increase cross-campus cooperation to strengthen learning opportunities	**14**	**70%**	**17**	**94%**	**10**	**56%**	**19**	**79%**	**60**	**75%**
A lot	*11*	*55%*	*5*	*28%*	*3*	*17%*	*12*	*50%*	*31*	*39%*
A little	*3*	*15%*	*12*	*67%*	*7*	*39%*	*7*	*29%*	*29*	*36%*
5. Contributed to changes in content or delivery of educational services	**15**	**75%**	**14**	**78%**	**12**	**67%**	**19**	**79%**	**60**	**75%**
A lot	*8*	*40%*	*4*	*22%*	*4*	*22%*	*13*	*54%*	*29*	*36%*
A little	*7*	*35%*	*10*	*56%*	*8*	*44%*	*6*	*25%*	*31*	*39%*
6a. Helped departments or programs acquire other funding or resources	**14**	**70%**	**14**	**78%**	**7**	**39%**	**18**	**75%**	**53**	**66%**
A lot	*9*	*45%*	*7*	*39%*	*3*	*17%*	*8*	*33%*	*27*	*34%*
A little	*5*	*25%*	*7*	*39%*	*4*	*22%*	*10*	*42%*	*26*	*33%*
6b. Benefited from or leveraged capacities or resources elsewhere in the system to strengthen your own work	**11**	**55%**	**13**	**72%**	**10**	**56%**	**19**	**79%**	**53**	**66%**
A lot	*8*	*40%*	*5*	*28%*	*4*	*22%*	*10*	*42%*	*27*	*34%*
A little	*3*	*15%*	*8*	*44%*	*6*	*33%*	*9*	*38%*	*26*	*33%*

9. Overview of findings, by objective and respondent group*

Objective	Faculty N=14		Administrators N=25		Industry N=37		Total* N=76	
	N	%	N	%	N	%	N	%
1. Helped increase communication among colleagues in different programs or institutions	**13**	**93%**	**23**	**92%**	**33**	**89%**	**69**	**91%**
A lot	*8*	*57%*	*17*	*68%*	*24*	*65%*	*49*	*64%*
A little	*5*	*36%*	*6*	*24%*	*9*	*24%*	*20*	*26%*
2. Increased communication between educators and people in industry	**14**	**100%**	**22**	**88%**	**36**	**97%**	**72**	**95%**
A lot	*9*	*64%*	*13*	*52%*	*22*	*59%*	*44*	*58%*
A little	*5*	*36%*	*9*	*36%*	*14*	*38%*	*28*	*37%*
3a. Helped learners become more aware of careers in the field	**13**	**93%**	**24**	**96%**	**35**	**95%**	**72**	**95%**
A lot	*11*	*79%*	*15*	*60%*	*22*	*59%*	*48*	*63%*
A little	*2*	*14%*	*9*	*36%*	*13*	*35%*	*24*	*32%*
3b. Helped learners become better prepared for careers in the field	**13**	**93%**	**23**	**92%**	**31**	**84%**	**67**	**88%**
A lot	*10*	*71%*	*12*	*48%*	*24*	*65%*	*46*	*61%*
A little	*3*	*21%*	*11*	*44%*	*7*	*19%*	*21*	*28%*
4. Helped to increase cross-campus cooperation to strengthen learning opportunities	**12**	**86%**	**22**	**88%**	**23**	**62%**	**57**	**75%**
A lot	*8*	*57%*	*7*	*28%*	*13*	*35%*	*28*	*37%*
A little	*4*	*29%*	*15*	*60%*	*10*	*27%*	*29*	*38%*
5. Contributed to changes in content or delivery of educational services	**12**	**86%**	**20**	**80%**	**25**	**68%**	**57**	**75%**
A lot	*7*	*50%*	*9*	*36%*	*11*	*30%*	*27*	*36%*
A little	*5*	*36%*	*11*	*44%*	*14*	*38%*	*30*	*39%*
6a. Helped departments or programs acquire other funding or resources	**11**	**79%**	**19**	**76%**	**19**	**51%**	**49**	**64%**
A lot	*5*	*36%*	*8*	*32%*	*10*	*27%*	*23*	*30%*
A little	*6*	*43%*	*11*	*44%*	*9*	*24%*	*26*	*34%*
6b. Benefited from or leveraged capacities or resources elsewhere in the system to strengthen your own work	**10**	**71%**	**19**	**76%**	**21**	**57%**	**50**	**66%**
A lot	*4*	*29%*	*10*	*40%*	*10*	*27%*	*24*	*32%*
A little	*6*	*43%*	*9*	*36%*	*11*	*30%*	*26*	*34%*

**Note:* *Due to the small number, the four K-12 respondents are not included in this table.*

Accomplishments made possible by the Centers

Some stakeholders in the survey occasionally volunteered observations that certain things "would not have happened" or "could not have been done" without the Centers. Respondents who made such statements included all four of the K-12 respondents, 9 of the 14 faculty, 5 of the 25 administrators, and 1 industry representative. This represents 21 percent of all the stakeholders who were surveyed. Among only the non-industry representatives, it includes 42 percent of the total.

Respondents did not claim that all the impacts they described were solely because of the Centers. Rather, certain specific changes, in the following categories, were said to have resulted only because of the Centers' involvement:

- Improved student learning and training (8 respondents)
- Increased outreach and career awareness, and improved STEM preparation, among pre-college students (7 respondents)
- Development of career pathways and improved cross-campus coordination and access to programs (5 respondents)
- Improved use of existing resources and access to additional resources and support (5 respondents)
- Development of new courses and programs, and sharing of best practices (4 respondents)
- A unified system "voice" speaking to the industry sector (1 respondent)

Respondents credit the following contributions of the Centers with making these outcomes possible:

- Funds (10 respondents)
- Convening and facilitation to bring people together (literally or metaphorically) across campuses and promote sharing and coordination (9 respondents)
- Coordinated outreach and marketing (5 respondents) and other specific activities (2 respondents)

In contrast, three respondents – two administrators and one faculty member – commented that they did not believe the Centers had made a difference in accomplishments. Describing new program development and general curriculum and equipment updates, these stakeholders felt that the same results could have been obtained had their own institutions had the same amount of money.

Discussion and conclusions

The Centers are showing a level of impact consistent with the time they have had to develop

The Centers provide a unique capacity in the system for meeting an interrelated set of six important goals. They provide added value to support system innovation and responsiveness to flagship economic sectors in the state. In each of the six objectives, we find strong evidence that they are creating impact. Based on many evaluations of comparable organizations, we find that the level of impact observed is consistent with what can reasonably be expected of multi-partner, multi-sector collaborations after four to five years of development.

In meeting these six objectives, Centers are also advancing the priorities of the overall system's current strategic plan.

- Through help for diverse learners to discover and prepare for careers, and creating new pathways for communication with learners, they are **increasing access, opportunity, and success for students**.

- By championing changes in content and delivery, including cross-campus coordination to strengthen courses and programs, they are **promoting high quality programs and services** and **strengthening the system's commitment to excellence and accountability.**

- By identifying industry opportunities and the workforce preparation these require – and championing the courses and programs needed to meet them – they are **enhancing the state's economic competitiveness.**

- With the new communication pathways they have developed and are strengthening, as well as promoting changes in the content and delivery of educational services, they are spearheading **innovation to meet current and future educational needs**.

- Finally, by leveraging their system funds to secure additional revenue, and leveraging existing capacities for greater coordination and impact, they are helping to advance the new goal currently under consideration of **enhancing the long-term viability** of public higher education.

Centers are adapting with different strengths to meet different situations and priorities

From the outset, the Centers were designed with differences that fit unique industry sector needs and institutional capacities. The same considerations continue to shape varying developmental paths. For example, we see more new program development in the two Centers (360° and HealthForce) that have more academic partners. By contrast, at MNCEME, the host institution's four-year programs have national accreditation whose standards limit transferability of some first- and second-year credits. However, this Center has focused the most on strengthening pre-college STEM training that can articulate into the front end of either two-year or four-year programs.

Another factor that influences Center activities and options is the nature of the industry sector it serves. Advance IT works in a sector that itself serves a wide range of industries as well as nonprofits and government agencies. This sector began with the least well-developed industry associations. This Center, fittingly, has put the most effort into developing and convening industry networks and developing supports for Center alumni.

We would not expect equal successes across the board. By its nature, innovation presumes a readiness to embrace some less successful efforts as the price of discovering better methods. Both kinds of results produce valuable learning.

The Centers' position within the overall system still needs fine-tuning

The Centers are currently held accountable to create innovation within the system. However, as "virtual centers" that do not enroll students or offer courses or programs of study, they have no authority to make the changes necessary for that innovation to occur. The Centers have been tasked to encourage cooperation in a basically competitive environment, and encouraged to develop new rules of engagement while existing policies and incentives still stand. These include institutional funding and oversight that encourage competition by basing funding on the number of students served, and that create disincentives for more technical (and hence expensive) fields of study by basing per-student funding at the same rate for all. It will be important to consider options to better align institutional and Center incentives, and give Centers more tools for creating and measuring the changes they are expected to produce.

In their current configuration, Centers are promoting ways of doing business that do not necessarily fit with current institutional practices. This is one likely reason why administrators gave Centers lower ratings than did faculty on performance of some objectives – and sometimes also lower than industry partners. The work to improve the

alignment of curriculum and develop new programs, for example, is time-consuming, often requires considerable added administrative effort, and may not – especially not yet – show a corresponding benefit at the institutional level. Faculty, however, have a more direct view of the gains in student access, learning, and career readiness, and industry stakeholders are in a position to reap the most significant benefits when the additional and better-prepared students complete their programs.

The role of administrators, however, is vital to the success and growth of the Centers. The accomplishments we observe to date are evidence of their considerable willingness to discern, and work for, the larger good. To help extend a similar level of collaboration beyond the initial circle of Center supporters, the overall system should provide structures and processes to support and sustain this kind of collaboration.

Future considerations

The level of impact observed to date leads to a conclusion that continued funding of the Centers is merited. The same amount of money, spread among institutions rather than focused through the Centers, would be unlikely to achieve the same goals. The Centers add value by focusing funds on common purposes. They also add to the impact of the funds through their convening and facilitation to craft a shared work plan and help the partners maintain their accountability to each other for working together. Additional decision-making authority or system incentives to back up these purposes should be considered.

Given the current challenges inherent in Centers' structure, the system should not assume that the current configuration of the Centers is the best for the long term. Different options should be considered. Is it necessary to identify a single lead institution? If so, should there be limits on the kind of institution that is so designated? Could more than one university be included? Should the unit of affiliation continue to be entire institutions, or could individual programs be considered Center partners? The system will be best served if a wide variety of options are considered.

Appendix

1. Detail of follow-up responses for Objectives 1, 2, and 3

2. Key activities, by Center, showing areas of impact

1. Detail of follow-up responses for Objectives 1, 2, and 3

The figures below show the detailed numbers and percentages for the follow-up questions mentioned in the Findings section for Objectives 1, 2, and 3.

A1. Detail of follow-up question responses for Objective 1

	Group(s) responding	Number of respondents	Responses
Has [this activity] introduced new ideas or new resources to your firm or sector?	Industry partners	12	58% "Yes, a lot" 42% "Yes, a little"
Has it introduced new ideas to the program or institution?	Faculty and administrators	11	64% "Yes, a lot" 14% "Yes, a little"
Has it introduced new resources to the program or institution?	Faculty and administrators	11	74% "Yes, a lot" 26% "Yes, a little"
Has [this activity] put you in touch with new colleagues?	All groups	23	83% "Yes"
Has the work positioned the institution well with any key industry or other partners?	Administrators	7	3 "Yes, a lot" 4 "Yes, a little"

A2. Detail of follow-up question responses for Objective 2

	Group(s) responding	Number of respondents	Responses
As a result of [activity], have educators become more aware of current innovation or challenges in industry?	All groups	23	83% said "Yes"
Are students in the program being better prepared for careers?	Faculty and administrators	7	6 said "Yes, a lot"
Has [activity] strengthened your access to qualified employees?	Industry partners	8	2 said "Yes, a lot" 2 said "Yes, a little"
Has [activity] helped you upgrade the skills of current employees?	Industry partners	8	2 said "Yes, a lot" 2 said "Yes, a little"

A3. Detail of follow-up question responses for Objective 3

	Group(s) responding	Number of respondents	Responses
More students/potential job applicants are interested in careers in the field (a)	All groups	27	61% "Yes, a lot" 22% "Yes, a little"
Job applicants are better prepared (b)	Industry partners	12	42% "Yes, a lot" 33% "Yes, a little"
Job applicants have more realistic career ideas (b)	Industry partners	12	58% "Yes, a lot" 25% "Yes, a little"
Students have more realistic ideas about careers in the field (b)	K-12, faculty, administrators	15	73% "Yes, a lot" 20% "Yes, a little"

Notes: (a) Students or potential job applicants interested in the field: *Responses were highest among MNCEME representatives (75% "a lot") and lowest among Advance IT respondents (25% "a lot").*

(b) Job applicants or students better prepared, more realistic: *Responses were most consistently high among Advance IT representatives (percentages cannot be given due to small numbers)*

2. Key activities, by Center, showing areas of impact

Based on Center documents and interviews with Center directors, Wilder Research identified 8 to 12 activities of each Center that reflect the most significant investment of energy and resources and are most likely to contribute to accomplishing the objectives of the Centers. These are listed in Figures A4 through A7 below.

Based on stakeholder feedback, interviews with directors, and prior evaluations, the link between each activity and its associated impacts is represented in the chart. A solid circle in a given column indicates a large or very likely impact related to that column's objective or system priority. An open circle represents a moderate or possible impact. A blank in a column indicates that no impact, or only minimal impact, has been observed in this area so far.

The Center objectives, discussed in the introduction above, are the areas of activity in which Centers uniquely add value to the system. The numbering corresponds to the list below:

1. Create new pathways for communication and collaboration
2. Identify industry opportunities and innovations, and the workforce preparation they require
3. Help learners of all ages discover and prepare for careers
4. Encourage cross-campus activity that strengthens opportunities and creates premiere course offerings
5. Champion changes in content and delivery of educational services
6. Produce revenue and leverage resources to power these objectives

The columns for system priorities (also discussed in the introduction) correspond to the numbering in the following list:

1. Increase access and opportunity
2. Ensure high-quality learning programs and services
3. Provide programs and services that enhance …economic competitiveness …
4. Innovate to meet current and future educational needs

A4. Key activities of the 360° Center, 2009–2010

	Impact on goal areas									
	Center of Excellence objectives						System priorities			
	1	2	3	4	5	6	1	2	3	4
A. Outreach work to do public marketing and communications through the Center's web site, Facebook ads, and LinkedIn for the purpose of promoting the manufacturing industry and manufacturing and engineering careers and recruiting students into 360º affiliated programs.			●	●			●		●	
B. Outreach efforts through camps for K-12 students, career fairs, and connections to teachers, counselors, and secondary school administrators	●		●			●	●		●	
C. Financial support to partner institutions, which helped support summer camps, equipment, and the needs of programs in regions around the state	●	●	●	●	●	●	●	●	●	●
D. Development of new online certificates, called "Distance 360" programs. These certificates are designed as building blocks within the 360º Seamless Career Pathway.	●	●	●	●	●	●	●	●	●	●
E. The "IDEA competition" for potential entrepreneurs, in partnership with the Northwest Minnesota Ingenuity Frontier	○	●				●			●	
F. Partnership in the Regional Economic Alliance, now called Impact 20/20, also in partnership with the Northwest Minnesota Ingenuity Frontier	○	○	●		○	○		○	○	○
G. Assisting Anoka Ramsey Community College with the development of an Associate of Science program in Applied Engineering with a biomedical focus, with the option to complete the bachelor's degree at Bemidji State University	○	○		○	○	○		○	○	○
H. Helping to launch the Institute of Technological Entrepreneurship & Innovation at Bemidji State	○	○	○			○		○	○	○
I. Coordination and financial support for the West Central Minnesota Dream It. Do It. Campaign	●	○	●	○	○	●	●	○	●	○
J. The Center Director's participation as a board member of the Great Lakes Manufacturing Council	●	●			○				○	

KEY to impact

Based on stakeholder feedback, director interviews, and prior evaluations

	Minimal/not observed yet
○	Some/possible
●	Large/very likely

A5. Key activities of MNCEME, 2009–2010

	Impact on goal areas									
	Center of Excellence objectives						System priorities			
	1	2	3	4	5	6	1	2	3	4
A. Support for a new Bachelor of Science in Engineering program on the Iron Range	●	●		●	●	○	●	●	●	●
B. "Maximize Minnesota" events on energy management for business and industry	●	●	○	○					○	●
C. RFP process for funding projects in partner schools to support cross-campus and extended learning activities	●	●	●	●	●	●	●	●	●	●
D. Increase public visibility for manufacturing and engineering through the functionality of the new web site: social networking, updates, etc.	●		●			○	●			
E. Frequent Deans and Advisory Board meetings to facilitate communication between and among groups	●	●		●	●				○	●
F. Membership in regional and national manufacturing associations to influence manufacturing policy, perception, and promotion	●	●			●				●	
G. Active staff outreach and support for Project Lead the Way	●		●	●	●	●	●	●	●	○
H. Efforts to stimulate STEM interest through ZAP camps, Rube Goldberg competitions, presence at the State Fair, etc.	○		●			●	●		●	
I. Promotion of career awareness, including *Measures of Success* magazine, and an online e-zine	●	●	●			●	○	●		

KEY to impact

Based on stakeholder feedback, director interviews, and prior evaluations

	Minimal/not observed yet
○	Some/possible
●	Large/very likely

A6. Key activities of Advance IT, 2009–2010

	Impact on goal areas									
	Center of Excellence objectives						System priorities			
	1	2	3	4	5	6	1	2	3	4
A. Advance IT's work to found, sponsor, and participate in ongoing activities of the Minnesota IT Workforce Collaborative, a partnership project with DEED and the Minnesota High Tech Association to identify and meet the needs of the Minnesota IT labor market	●	●		○	○	○			●	○
B. Host, plan, and manage the Secure360 conference as one of four organizational members of the Upper Midwest Security Alliance	●	●			○	●			●	
C. A comprehensive IT career awareness and success program that includes online resources through Minnesota IT Careers and several campus-based events at Metro Area campuses	●	○	●	●	●	●	●	●	●	●
D. Support for new course creation, updating of course curriculum, and conversion to online delivery for content in IP telephony, risk management, network security, open source technology, forensics, and information management	●	●		●	●	●	○	●	●	●
E. Programs for outreach to secondary students that promote career awareness and interest, as well as introductory-level courses offered during non-school hours that promote college readiness and in some cases college credit.	○	○	●	●	●	○	●	●	○	
F. Career advancement and continuing education for MnSCU IT alumni			●	●		○	●		●	
G. Continuing professional education in security-related topics for public and private sector employees	○	○	○			○	●	○	○	
H. The Minnesota-Wisconsin competition of the National Collegiate Cyber Defense Competition	●	●	●	●	○	○	○	●	●	

KEY to impact

Based on stakeholder feedback, director interviews, and prior evaluations

	Minimal/not observed yet
○	Some/possible
●	Large/very likely

A7. Key activities of HealthForce, 2009–2010

	Impact on goal areas									
	Center of Excellence objectives						System priorities			
	1	2	3	4	5	6	1	2	3	4
A. Center structure to promote communication and collaboration in place of prior competition (institutions and industry partners)	●	●	●			●	○	●	●	●
B. Fund innovations statewide through the RFP process (also leverages system resources not previously activated)	●	●	●	●	●	●	○	●	○	●
C. Staff support for targeted initiatives [e.g. outreach]	●	●	●		○		●		●	●
D. Scrubs Camp and other career awareness and preparation activities	●	○	●				●	●		○
E. Center-funded activities to strengthen recruitment and retention of a diverse workforce			●			●	●			
F. Center-funded activities to promote advancement opportunities for incumbent workforce		○	●	○	○			●	●	
G. Center support for new curricula and programs, including simulations and the Medical Assistant program	●	●	●	●	●	○	●	●	●	●
H. Regional Incentives grants to help identify workforce needs and coordinate responses within specific regions	●	●			○	○			●	○
I. Moving Experience Forward grants to foster replication and expansion of best practices developed through earlier Center funding	○	○	○	●	●	○	○	●	●	○
J. The Center's participation in the Coalition for Continuous Improvement in Healthcare	●	●		○	●			●	●	●
K. Support for the cross-campus Doctorate of Nursing Practice program	●			●	●	○	●	●	○	●
L. Support for DOL proposal and grant implementation to build clinical lab workforce	○	●		●	●	●	○	●	●	●

KEY to impact

Based on stakeholder feedback, director interviews, and prior evaluations

	Minimal/not observed yet
○	Some/possible
●	Large/very likely