III. Institutional Priorities: **Duluth**

**Academic Excellence – Faculty, Reputation**

**Investing in Best Departments**

- **Matching faculty lines with needs:** Utilization of faculty position pool; open lines are returned to the Vice Chancellor for Academic Administration.

**Investments to Strengthen Interdisciplinary and Legislative Initiatives**

- **Design Initiative:** UMD hired one new tenure-track faculty member and a one-semester visiting professor; many guest artists visited the campus. Faculty taught courses utilizing Visualization and Digital Imaging Laboratory (VDIL) technology.
- **Cellular and Molecular Biology:** One FTE faculty member was hired to expand UMD’s initiative in cell and molecular biology.
- **State Agricultural Special – Freshwater:** Two new FTE faculty were hired to expand UMD’s course offerings, research opportunities, and leveraged funds in the freshwater resource initiative.

**Measuring Results**

- In FY01, funding from 16 faculty lines was reallocated to prioritized needs within academic units for FY02.
- Revised curriculum for graphic design majors; increased number of majors in graphic design by 69 percent over two years; increased faculty research in VDIL.
- Additional $290,000 in Army Research funds; established a genomics center on campus; increased research collaboration between College of Science and Engineering and UMD medical school faculty.
- Increased viability of the Large Lakes Observatory; leveraged funds producing additional instrumentation.

**Students**

**Investments to Strengthen the Undergraduate Experience**

- **Advising:** Network advising programs across campus; continuing development of the Electronic Portfolio; reviewing undergraduate programs.
- **Undergraduate Research Opportunities Program (UROP):** Increased opportunities for undergraduate research and creative activity.
- **Introduction to College Learning (ICL):** One-credit course provides academic, personal, and social enrichment to first-year students; focuses on technology, campus resources, study skills, values and ethics, learning styles, relationship and conflict management.
- **Laptop Initiative:** 166 juniors and seniors in four majors (accounting, education-early childhood, theatre-design emphasis, and sociology/anthropology/criminology) participated in the laptop initiative in FY01.
Measuring Results

- Added 2.5 FTE advising positions; reviewed 75 percent of undergraduate programs.
- Received funding for 102 UROP students; an additional 570 students participated in undergraduate research or independent study; supported 14 student presenters at the National Conference on Undergraduate Research (NCUR); two NCUR presenters chosen to participate in undergraduate research meeting/presentation on Capitol Hill.
- 832 students enrolled in 31 sections of ICL in FY01.
- 832 ICL students and 513 School of Fine Arts (SFA) students are using the Electronic Portfolio.
- Increased retention three to five percent over non-ICL participants.
- 20 courses have been redesigned for increased technology use in the Laptop Initiative program.

Engagement: Access and Outreach

Expanding Access: Educational Programs

- Center for Economic Education (teaching and learning initiative)
  - Improve the quality and quantity of economic education and economic literacy with a focus on preK-12 teachers
  - Provide credit and non-credit workshops and seminars for teachers, curriculum supervisors, administrators
- Arrowhead Preparing Teachers for Tomorrow’s Technology Today (APT3) College of Education and Human Service Professions (CEHSP)
  - Faculty, teachers, and students work together in “collaboratories” learning and applying technology
- Chester Park Lab School CEHSP and SFA
  - Coordinate and place teacher education music students
  - CEHSP students from physical education, early childhood education, elementary education, teaching visual arts, and educational technology programs actively engage in teaching and learning with Chester Park Lab School students
  - Students completing practicum student teaching, UROP, and APT3 projects work collaboratively with Chester Park teachers and parents
- Continuing Education (CE)
  - Outreach to high school students through the College in the Schools program
  - Outreach to community members through evening programs
  - Coordinate Masters of Education (M.Ed.), Masters of Liberal Studies (MLS), and Masters of Science in Engineering Management (MSEM) programs
  - Outreach to senior citizens through University for Seniors
- Social Work Distance Education Masters Program (CEHSP): Provide opportunity for American Indian professionals to obtain a masters degree in social work.
- Fond du Lac Tribal and Community College Teacher Education Program: Provide education degree to American Indian students.
Expanding Outreach: Regional and Statewide Service and Community Engagement

- **Natural Resources Research Institute (NRRI):**
  - Mission: To foster economic development of Minnesota’s natural resources in an environmentally sound manner to promote private sector employment
  - Provide near-term economic development efforts that contribute to private sector job creation and retention
  - Focus applied research and development on natural resources to develop products, processes, and services
  - Expand natural resources research to provide a knowledge base for sound environmental and economic decisions

- **Bureau of Business and Economic Research (BBER) School of Business and Economics:**
  - Provide research on business and economic issues in northeastern Minnesota and statewide
  - Serve as a data center, respond to inquiries for data
  - Provide a training ground for students interested in hands-on research experience
  - Provide the UMD community with economic information

- **Minnesota Sea Grant Program:**
  - Work with individuals and communities to maintain and enhance the environment and economies along Lake Superior and inland waters
  - Provide outreach services to region and state

**Measuring Results**

- **Center for Economic Development (CED):**
  - Collaborate with teacher education faculty to provide training for pre-service teachers
  - Conduct student programs such as the Lake Superior Economic Challenge
  - Conduct research in the area of economic education
  - Maintain up-to-date library on research and materials related to economic education
  - Work with Minnesota Council for Economic Education to establish working relationships with economics educators in other countries

- **Chester Park Lab School:**
  - 200 Chester Park students and parents participate in performances three times/year
  - 160 UMD students and 12 UMD faculty engage in professional development activities such as collaboratively integrating technology into the curriculum
  - 332 Chester Park children have benefited from the teaching and learning activities of UMD students
  - Utilize Title IV-E funds to partner with Bemidji State University to offer MSW through Child Welfare Scholar

- **Continuing Education (CE):**
  - Provide college-level courses in local high schools; schools maintain funding base and students receive college credit
  - Degree and job-skill oriented evening programs provide opportunity for non-traditional students to prepare for new careers
- Campuses 14
- Cohorts run in Duluth, International Falls, and at UMM. MSEM reaches out to working engineers across the state.
- 23 students taking UMD teacher education courses taught by American Indian faculty on tribal college campus.
  - SFA Kindermusik: 300 elementary students are enrolled in music programs and participate in performances each year.
  - APT3: Used in preK-12 classrooms for teaching and learning with a diversity and rural focus on addressing the digital divide.
  - NRRI:
    - Leverage $3.4 million of State Special funds into an operating budget of $13.7 million.
    - Minerals
      - Coleraine Research Laboratory collaborations with industry to improve taconite pellet processing efficiency and quality
      - Using $600,000 federal grant to accelerate research and outreach on value added iron products
      - Studying one million feet of drill core to understand copper-nickel deposits and associated precious metals
    - Forestry/forest products
      - Developed an advanced laboratory capability to work with value added solid wood products and composites
      - Developed process to commercialize chemical derivatives from birch bark; UMD formed limited liability company with two partners to bring products to market
      - Organized the MN Hybrid Poplar Research Cooperative to develop and commercially demonstrate alternative sources of wood fiber
    - Peat/peat products
      - Assisted small companies in establishing peat-harvesting operations
      - Have taken a lead in starting the MN Peat Association
    - Water and the environment
      - NRRI houses the University’s largest research program on water and the environment
      - Active staff outreach to meet constituent demand for environmental and resource management information
      - Obtained a $6 million grant to study biological indicators that predict the health of the Great Lakes system
      - Conduct outreach effort with contractors, resorts, homeowners, and governmental agencies
  - BBER
    - Published economic indices, provided forecasts for northeastern Minnesota, conducted input-output studies for public and private sector
    - Conducted the Northeast Minnesota Skills Assessment Project with the Minnesota Department of Economic Security
    - Cooperates with the Humphrey Institute on an industry cluster study of northeastern Minnesota’s economy
• **Minnesota Sea Grant Program**
  - Identify needs, fund research, translate research results, facilitate policy decisions
  - 13 professionals and four students in media relations program generated 400 reporter contacts, resulting in stories reaching 272 million people
  - Web site features 820 pages of information and averages 80,000 hits per month
  - Publication center fills 1,000 orders for publications annually

**Strengthening the University Community: Human Resources**

**Supporting and Developing a Diverse Faculty and Staff as Teachers and Researchers**

- **Technology Camp:** Faculty participate in a one-week camp, resulting in enriched curriculum delivery (Web pages, chat rooms, video streaming, etc.) for UMD courses.

**Recruiting and Retaining a Diverse Faculty and Staff**

- **Target of Opportunity (TOP) Funding:** Three FTE faculty were hired using TOP and Bridge funds.
- **Chancellor’s Diversity Initiative:** Visiting scholars and artists have given residencies, and public and classroom lectures, and worked individually with UMD students and faculty; approximately $35,000 invested annually.

**Measuring Results**

- **Tech Camp:** Over a three-year period, FY99-FY01, over 25 percent of UMD faculty (100) participated in Tech Camp.
- **TOP:** Increased number of faculty of color; added an American Indian woman to the staff of the Education Department to teach diversity courses.
- **Diversity Initiative:** Over 24 visiting scholars have given residencies and lectures, and worked with students and faculty individually; enables UMD to recruit a more diverse faculty and student body.