Alumni Talk—January 1, 1989

Introduction

It is always great to be back in southern California again...particularly when the mission is to win the Rose Bowl.

This year is particularly exciting:

i) the 100th Tournament of Roses

ii) the 75th Rose Bowl...in a sense, the Diamond Anniversary of that first game in 1902 when the Michigan football team beat Stanford 49 to 0.

iii) Playing in USC one of the greatest football programs of modern times...
....two of the great football programs in the nation...
....with over 1,200 wins among them...
....30 Rose Bowls...
....180 All Americans...

Of course, the Rose Bowl has been a real challenge to us...particularly when we play USC in the Rose Bowl...the phantom touchdown...
....an earthquake that hit southern California in 1979...

This year we are taking no chances...
...We've arranged for Michigan weather to strike the Southland...
We have done our best to infiltrate USC with Michiganders...in key positions...
Can it be simply a coincidence that...
...President Zumberge is a former Michigan faculty member...
...Coach Smith is a former Bo assistant coach...
...even the USC director of bands is a Michigan graduate...
...Bob Forman informs me, however, that Traveller, the USC white horse, not NOT an Michigan graduate...
...but he did graduate from Ohio State, so there is another Big Ten connection...

Of course all of this is probably balanced out by the fact that the Michigan president is a Caltech graduate...

Probably the ultimate Caltech prank...

This is indeed a sentimental trip for Anne and me since it was exactly 20 years ago this December that we left California for Michigan.

As I recall it, it was sunny and in the 80s when we left Pasadena...and snowing and below zero when we arrived in Ann Arbor. We had few warm clothes...our children never even seen snow...

Yet we have found Michigan a marvelous institution...and we have found its warmth in its people...
...its students, faculty, staff, and alumni.

Indeed, it is only when we return to southern California on occasions such as this Rose Bowl mission that all of the old memories of the "Southland" return.

As I noted earlier, Michigan played in the very first Rose Bowl in 1902, at the turn of the century...

And at that time there was little doubt that the University of Michigan was not only the flagship of higher education in America, but perhaps more than any other institution, Michigan during the latter half of the 19th century had practically invented the comprehensive research university that has served our nation so well.

Well, today we are looking forward to the 75th Rose Bowl...even as we prepare once again to enter a new century...
And I and my colleagues believe that it is time that Michigan once again assume its leadership role in
inventing a university capable of serving America of the 21st Century.
Let me dwell on this point a bit.

**Images of Michigan**
- Fall in Ann Arbor....
- Bright football weekends...
- Students walking across the Diag, the Engineering Arch, the Blue Front...
- Or, perhaps, an image of roses...
- Michigan...the nation’s flagship of public higher education, a tradition of excellence

**Today your University is undergoing rapid change**
- Not in quality of students, faculty, and programs nor in its commitment to excellence
- But in some of its other characteristics:
  - Its leadership, of course...
  - Its president, chief financial officer,...
  - even its athletic director...
- its physical plant...
  - $700 M in construction over past 5 years...
  - Medicine, Engineering, Business, LS&A
  - Information technology
  - Computer access, telecommunications, supercomputers, the "electronic" university of tomorrow...
- Its faculty
  - "Impacted wisdom group" is now beginning to retire...
  - Will see major change over next decade (examples: both Business and Engineering have seen over 60% of faculty change in past 5 years)
- its funding base...
  - Most interesting experiment in higher education... less than 20% State ($240 M in $1.4 B)
  - Rest comes from tuition, research, and private support
- its attitude toward the world beyond the ivory tower...
  - Revised policies to encourage rather than constrain
  - Intellectual property policy which now allows faculty to petition UM for ownership
- MRC, ITI, CMI, Health Care, NSFnet
- and in its basic philosophy...
  - Note: We are changing, not so much in an effort to respond to external pressures...but rather to position ourselves to take advantage of some extraordinary opportunities.
  - We are attempting to seize control of our destiny, to determine a direction and a strategy to take us into the 21st Century.
  - We believe that Michigan faces a period of unusual opportunity, responsibility, and challenge in the years ahead.
  - Let me explain...

**Some Futuring**
- As they say in the jargon of planning, I've been spending a good deal of time "futuring"...gazing into the crystal ball in an effort to determine just where our university should head in the years to come.
- To use this as an opportunity to gaze into the crystal ball...to look not just at the year ahead... but down the road 10, 20, 30 years or more... to consider the possibilities for our University...
what it is...what it could become...
indeed, what it must become...
I should say at the outset of this process of "futuring"
that I believe the University faces
a period of unusual challenge and responsibility in
the years ahead...but also a time of exceptional
opportunity and excitement.

Themes of the Future
Think about it for a moment...
The students we are educating today will spend most of
their lives in the next century...they will be citizens
of the 21st Century...
Yet we, their educators, are very much products
of the 20th Century...
And our institution, the university of today, is
in reality a product of the 19th Century!
The way we are organized into departments and
colleges...our sequential approach to education...
even the concept of courses and credit hours...
all were introduced over a century ago.
And yet the American society we serve has changed dramatically
during the past century and continues to change at an
ever accelerating pace.
It is therefore both appropriate and important to ask the question:
Is the University as we know it today really prepared to
educate the citizens and serve the society of the 21st Century?
While it is always dangerous to speculate about the future,
three themes seem very clear:
i) It will be future in which our nation becomes a truly
multicultural society, with a cultural,
racial, and ethnic diversity that will be truly extraordinary
in our history...
By 2000, one-third of college age students will
be Black or Hispanic...
By 2000, 47% of our school children (K-12) will
be Hispanic or Black (today 25% are)
In the second half of 21st Century, Hispanics will likely
become the largest population group in The United States
Those groups we refer to today as
minorities will become the majority population of
our nation in the century ahead...just as they are
today throughout the world.
In this future, full participation of currently underrepresented
minorities will be of increasing concern for
reasons of equity and social justice.
But, in addition, this objective will be the key to the future
strength and prosperity of America, since our nation
cannot afford to waste the human talent represented
by its minority populations.
If we do not create a nation that mobilizes the talents
of all our citizens, we are destined for a diminished
role in the global community, increased social turbulence, and
most tragically, we will have failed to fulfill the promise of
democracy upon which this nation was founded.

What are the implications for Michigan?
Many of us have become firmly
convinced that for Michigan to achieve
excellence in teaching and research in the
years ahead, for it to serve our state, our nation,
and the world...we simply must achieve and
sustain a campus community recognized for its
racial and ethnic diversity.

We believe the University has a mandate to build a model of a pluralistic, multicultural community for our nation...an environment which is supportive of all individuals, regardless of race, creed, national origin, gender, or sexual preference...

Which values and respects and indeed, draws its intellectual strength from the rich diversity of peoples of different races, cultures, religions, nationalities, and beliefs.

It seems apparent that we cannot sustain the distinction of our University in the pluralistic world society that is our future without intellectual diversity and an openness to new perspectives and experiences.

Our challenge is not to make one group from many, to blend together all cultures into a homogeneous mixture...but to build from many varying cultural, racial, and ethnic groups a truly multicultural community in which we are bound together by a common core of values and beliefs.

In a very real sense, in our effort to build the multicultural university of the 21st Century, we are attempting to address the most urgent and difficult issue confronting our nation today.

ii) It will be a future in which America will become "internationalized"... in which every one of our activities must be viewed from the broader context of participation in the global community... as America becomes a "world nation", with ethnic ties to every part of the globe...

The fact is, a truly domestic US economy has ceased to exist. In slightly more than 5 years, US trade deficit has taken us from the world's largest creditor to its largest debtor nation.

US is the destination of about half the world's immigrants Probably 10 million this decade alone...

One-third of annual population growth is immigration

The United States is evolving into the first true "world nation", with economic and ethnic ties to all parts of the globe.

The growing internationalization of America suggests that understanding cultures other than our own is necessary not only for personal enrichment and good citizenship in the global community, but indeed, necessary for our very survival as a nation...

We are no longer self-sufficient or self-sustaining. We are not immune to the shocks of the world society. We have never been more dependent on other nations and other peoples.

What are the implications for Michigan?

Among the University's many responsibilities and priorities, one therefore must rank high our responsibility to develop and sustain programs which reflect this international perspective.

It is true that this University has a long tradition of involvement in international activities...indeed, our academic programs, our relationships with institutions abroad, the international representation among our students and faculty...all contribute in important ways to our institution.

If the UM is to fully participate in an increasingly interdependent world, it must begin to think more imaginatively, more aggressively, and more strategically about how to strengthen our role as a true international center of learning.
iii) It will be a future in which we rapidly evolve from a resource- and labor-intensive society to a knowledge-intensive society, in which intellectual capital-educated people and their ideas-become the keys to our prosperity, security, and well-being.

Looking back over history, one can identify certain abrupt changes, discontinuities, in the nature, the very fabric of our civilization...

There are many who contend that our society today is once again undergoing such a dramatic shift in fundamental perspective and structure.

Today we are evolving rapidly to a new post-industrial, knowledge-based society, just as a century ago our agrarian society evolved through the Industrial Revolution.

Our economy is switching steadily away from material and labor-intensive products and processes to those which depend upon knowledge as their primary ingredient.

A transition is occurring in which Intellectual capital--brainpower-- is replacing financial and physical capital as key to our strength, prosperity, and social well-being

New ideas and concepts are exploding forth at ever increasing rates...

   We have ceased to accept that there is any coherent or unique core of wisdom that serves as the basis for new knowledge...

   We've seen simply too many instances in which a new concept has blown apart our traditional views of a field...

   We are increasingly surrounded by radical critiques of fundamental premises and scholarship...

   There is also great intellectual change and ferment...

   In many fields, the knowledge base is doubling every few years...

   The typical college graduate of today will likely change careers several times during a lifetime...

   Hence a college education will only serve as the stepping stone to a process of lifelong education...and the ability to adapt to...indeed, to manage change...will become the most valuable skill of all.

**What are the implications for Michigan?**

As our society becomes ever more knowledge-intensive, and hence ever more dependent upon educated people and their ideas...

It will become ever more dependent upon research universities such as Michigan since we are one of the primary sources both of new knowledge and those who can apply it...

This will provide us with some unusual opportunities and responsibilities in the years ahead...as we are increasingly viewed as key players in the age of knowledge that is this nation's future.

It is my believe that these themes of pluralism, internationalization of America, and our evolution to a knowledge-intensive society will not only dominate the future, but will create a time of unusual challenge and responsibility, opportunity and excitement for this University.

**The Need for a New Paradigm**

The future will indeed be a time of great challenge
as we attempt to serve the pluralistic, knowledge-intensive, world nation that will be The United States of the 21st Century.

Many of us are becoming convinced that higher education in America will be facing a period of challenge and change similar to that of a century ago, when the great land-grant universities were born in a response to the industrial age...and in a response to a profound democratic impulse to extend the benefits of learning to all of society.

Indeed, many in recent years have suggested that there is a need for a paradigm shift in the nature of higher education in the years ahead. But I suspect that such a change in the paradigm of the research university will not be gradual and evolutionary...but rather of a more dramatic and revolutionary nature.

Further, rather than the paradigm serving as a model simply to permit replication, the new paradigm of the research university for the 21st Century will clearly be an object for further articulation, specification and refinement as the pace of change in our society accelerates.

And this will require, perhaps more than at any time in the recent history of higher education unusually strong leadership...leadership capable of identifying and articulating an exciting, challenging, and compelling mission for our institutions and then uniting our university communities...and those who support and depend upon us...in a common effort to pursue this mission.

A Heritage of Leadership

Who will determine the new paradigm for the research? university in America?

Who will provide the leadership?

Why not the University of Michigan?

After all, in a very real sense, it was our University that developed the paradigm of the public university capable of responding to the needs of a rapidly changing America of the 19th century...a paradigm that still dominates higher education today.

In a sense, we have been throughout our history the flagship of public higher education in America.

Although Michigan was not the first of the state universities, it was the first to free itself of sectarian control and become a true public institution, governed by the people of the state.

From its founding, Michigan was identified with the most progressive forces in American higher education...

First to blend the classical curriculum with the German approach stressing faculty involvement in research and dedicated to the preparation of future scholars.

First university in the West to pioneer in professional education, starting the Medical School in 1850, the Law School in 1859, and engineering courses in 1854.

Among the first to introduce instruction in zoology and botany, modern languages, modern history, American literature, pharmacy, dentistry, speech, journalism, teacher education, forestry, bacteriology, naval architecture, aeronautical engineering, computer engineering...and even in my own field, nuclear engineering (with the associated Michigan Memorial Phoenix Project)

I believe that today our University is once again in an excellent position to
assume a role of leadership in higher education... to develop a new model of what the research university must become to serve 21st Century America... Several characteristics of the University suggest this role of leadership:

1. **Reputation** as the flagship of public higher education
   A large, comprehensive, public, research university
   A serious commitment to scholarship
   Unusual breadth, rich diversity of academic disciplines, professional schools, social and cultural activities...
   ...our intellectual pluralism...
   Unusual degree of participation of faculty and students in University decisions
   Indeed, throughout its history, Michigan has been known for a spirit of democracy and tolerance among its students and faculty.
   Harper's Weekly (1860):
   "The most striking feature of the University is the broad and liberal spirit in which it does its work."

2. **People**
   A faculty of great intellectual strength and unusual breadth
   Student body of quality unsurpassed by any public institution
   And, of course, that marvelous army of maize and blue alumni... over 300,000 strong...indeed, one of every 1,000 Americans...
   with a deep commitment to this institution.

3. **Resources**
   While it is true that state support has not been strong in recent years, we nevertheless benefit from an unusually broad and balanced base of support from both the public and private sectors.

4. **Ability to control our own destiny**
   Finally, we must never underestimate the importance of the fact that the University was created by the State Constitution itself...which establishes our Board of Regents as a coordinate branch of state government, with authority over the University exceeding that of the legislature, governor, and judiciary.
   In a sense, we are almost unique among public institutions in having the ability to control our own destiny...
   It is this rich set of characteristics that could well position the University to assume once again the leadership role it played in the 19th century by developing the new model for higher education appropriate for the needs of our state and nation in the 21st Century.

**A Call for Action**
But if we are to be successful in defining and achieving a mission of leadership in higher education, we will need far more than these characteristics.

Let me suggest several of the most critical themes:

1. **The Commitment to Quality**
   Of course, one of the canonical invariants, the constants of the motion, that will allow us to respond to a future of change is an unrelenting commitment to academic excellence and scholarly values.
   This will require that we also commit ourselves to focusing resources to achieve excellence...since in a future of limited resources, quality must inevitably dominate the breadth and capacity of our programs.

2. **Diversity, Pluralism, and Multiculturalism**
   I have mentioned this theme earlier, but it is so essential that I feel obliged to return to it once again.
It is imperative that the University recognize
the importance of racial and cultural diversity
and pluralism to achieving our objectives of
excellence in teaching, research, and service.
We draw great strength from diversity, from the
new intellectual perspectives and richness of
diverse cultural expressions and experiences.
We simply will be unable to sustain the distinction of
our university in the pluralistic world society that is
our future without reflecting this diversity in our
intellectual activities and in the people who
comprise our campus community.

3. The Challenge of Change
We face a future in which permanence and stability
will become of less importance than flexibility and creativity...
in which the only certainty will be the presence of
continual change...
Just as with other institutions in our society, those
universities that will thrive will be those that are
capable not only of responding to this future of
change...but, indeed, have the capacity to
manage and control change.
I believe that it was Burke who said that:
"A state without the means of change is without the
means for its preservation"
I believe this is to be true for all institutions in our society
...and for universities in particular.
One can argue that such renewal and change
are essential both for the achievement and
the sustaining of excellence.
To get better, we must seek a culture in which
creativity, initiative, and innovation are valued.
To this end, we must build a secure environment on this campus that can
sustain change and risk-taking and even failure..
as they say in computers, a “fault-tolerant” environment...
since the safer you can make a situation, the
higher you can raise the challenge.

4. A Return to Fundamental Values
Let me suggest, that as we contemplate the various actions
necessary for leadership in higher education, we would
do well to recommit ourselves to sustaining the most
fundamental values of the University.
For while change and renewal will be important themes of
our future, they can only occur upon a solid foundation
of institutional values.
Of course, academic institutions usually focus first on
intellectual values...characters of the mind....
The seeking of wisdom
Freedom of inquiry
Intellectual integrity
Discipline of the mind
Respect for reasoned conclusions
Democracy and justice
While these are essential in any university,
there are also other sets of values which we must
not ignore:
Values of moral character such as:
Honesty
Integrity
Courage
Compassion
Values of a civilized society:
  - Tolerance and mutual respect
  - Collegiality, civility, and community

5. The Important "Cs":
   Let me focus a bit on these all-important "c-values"...
   - Caring and concern and compassion
   - Cooperation and communication and civility
   Since these are the values that pull us together as a community.

   As the pace of change accelerates and its direction becomes less predictable, forces inevitably develop which tend to pull us apart—which trigger misunderstanding and conflict.

   And yet the challenges we will face in the years ahead require us to pull together as a scholarly community.

   It is desperately important that we seek the themes and mechanisms capable of uniting us—and resist those which drive us apart.

   This is a particularly important in universities...

   In these intensely people-dependent institutions we have long accepted the premise that the key to quality is attracting and retaining the most outstanding students, faculty, and staff, providing them with the environment and encouragement to push to the limits of their abilities...and then getting out of their way!

   However, in striving for a culture which stresses excellence and achievement, we also run the risk of losing that sense of collegiality, that sense of a scholarly community, that will, in the end, determine our capacity to face the challenges ahead.

   A challenge of the modern university is to find in our history and tradition those values that unite us and to renew our commitment to these values in such a way that they shape our future.

   We must strive for a true sense of an academic community in which the human mind is brought boldly to bear on the most enduring questions that confront us.

The Role of Alumni and Friends
To the University

   A university achieves greatness through its people... through their talents and abilities... their involvement and commitment...

   But it is important to recognize that the "community" that comprises a university extends far beyond its students, faculty, and staff...

   Rather this community extends outward... beyond our ivy-covered walls to embrace our alumni and friends...

   it also extends backward in time...to include that long line of maize and blue that have build and sustained the distinction of this University...

   I might even suggest that this community extends into the future...through those families...many of them already associated with the University... that will produce the students and faculty for this institution in years to come

   A key factory in the strength of the University... active involvement by alumni

   Not just for financial support...
although you can expect to hear from us even more frequently
Not just for your efforts in directing outstanding students to Ann Arbor -- many of them your own children or grandchildren...
Not just for influence...
    although since Michigan produces leaders, many of alumni have the opportunity to have major impact on UM through their roles as leaders of government or industry
But beyond that, through your active involvement...
    to provide to our students a sense of potential, what the future holds in store for them...
    for our faculty, since by buying in to what we are trying to do, you provide them with strong evidence of the profound importance of their activities
In a sense, our alumni and friends play the key role in passing the torch...
    in passing from one generation to the next the Michigan tradition...the tradition of excellence which we all cherish so deeply.

The Hazards of Predicting the Future
In conclusion, my crystal ball suggests a future of challenge and responsibility, opportunity and excitement...
As the United States becomes a pluralistic world nation, intensely dependent upon knowledge--upon educated people and ideas--and hence intensely dependent upon these marvelous, mysterious, and complex institutions we know as research universities.
How much of this particular vision of the future will actually come to pass?
Will the themes of pluralism, internationalization, and knowledge really dominate our future...
To be sure, change is not a predictable process...
    There is always a hazard to predicting the future...
But then I always remember that old saying
"The best way to predict the future is to invent it!"...
And isn't that, after all, just the role of the University...
    the job of inventing the future?...
Remember once again that fork in the road...
    one path leading to a preservation of the University as a great university...but only one among many...
    the other path leading not only to distinction but to leadership...
I believe that we should take this second path...
    that we should summon the vision and courage...
    the dedication and commitment...to accept our heritage of leadership in higher education...
I believe that the 1990s and beyond can be a time similar to the late 19th century when the University of Michigan was a primary source for much of the innovation and leadership in higher education in this nation.
And what more exciting mission could we have than to accept this challenge by striving to develop a new model of the research university capable of responding to the changing needs of our state and our nation...
The challenge of making the University of Michigan the model for the University of the 21st Century.

Tomorrow's Challenge
In a very real sense, the Rose Bowl must be viewed as the crowning symbol of achievement, of excellence, in intercollegiate athletics.
And, in a similar vein, we view the Rose Bowl, its long tradition of excellence, of quality, as an opportunity for our students--who also happen to be outstanding athletes--to demonstrate to America and the world all that is good in intercollegiate athletics today.

**Michigan belief**

Athletic competition can play an important role in our fundamental mission: education. I suppose it is something in the very nature of a university that causes us to continually ask the questions about our values, our goals, our priorities... What are we?...what do we strive to become?... Interestingly enough, I suspect that if one were to go through one of Bo's talks to his team with a highlighter, you would get some pretty good ideas...

**Words...**

- Pride...in institutions and in one's self
- Sacrifice for others...for the team
- Dedication to the achievement of excellence
- A disdain for mediocrity
- Courage, confidence,...
- Leadership...
- Integrity, honesty,
- Quality, Class...

It is certainly true that intercollegiate athletics can provide students with a marvelous opportunity to develop those qualities so important in later life...particularly when led by inspiring and enlightened coaches such as Bo Schlembecher. But it can do more, for these programs also serve as models not simply for the university community, but for many others throughout their society...

How many youngsters dream of the day they could play in the Rose Bowl...and learn from others the qualities necessary to get there?

And how many of us as adults tend to identify with these teams...sharing their thrill in victory...and suffering with them through defeat.

**Football...indeed, all intercollegiate athletics...is a game, to be sure...** but it is also a remarkable model of life...and those factors which lead to a program's long term success are also the factors which prepare young men and women for life itself!

While it is important that we always keep it in perspective...that we always place primary emphasis on the first word in "student-athlete"...it is also important that we acknowledge that the lessons that Coach Schembechler and his colleagues teach to the young men who don them aize and blue of Michigan are some of the most important lessons of life...lessons everything bit as important as those we teach in the classroom or laboratory...

**Congratulations...**

The Rose Bowl is very special to us at the University since it allows us to recognize and take pride in the accomplishments of those who have brought us to Pasadena...

i) The Michigan Football Team, the players themselves who have met the challenge...both on the field and in the classroom

ii) Eric Becker and the women and men of the Michigan Marching Band who have, through long hours of practice and work, continued the tradition of excellence in what is generally regarded as the nation's leading college band.

iii) All of the students, who participating as cheerleaders, managers, or simply as loyal fans, have played important roles in building a winning spirit at Michigan
iv) The coaches and staff of the Football Team and the Department of Athletics
v) And, of course, perhaps as much as any one else, we must congratulate the families that stood behind these individuals.