

NOTRE DAME REPORT

FACULTY NOTES

- 101 *Appointments*
- 101 *Honors*
- 101 *Activities*

ADMINISTRATORS' NOTES

- 104 *Appointments*

DOCUMENTATION

- 105 *Faculty Opening*
- 105 *Summer Session Commencement Homily*
- 106 *Summer Session Commencement Address*
- 108 *Freshman Orientation Homily*
- 110 *Faculty Board in Control of Athletics*
August 1, 1994

THE GRADUATE SCHOOL

- 111 *Current Publications and Other Scholarly Works*
- 114 *Awards Received and Proposals Submitted*
- 115 *Awards Received*
- 117 *Proposals Submitted*

SEPTEMBER 30, 1994 • NUMBER 3

FACULTY NOTES

Appointments

Peter Steinfels, senior religion correspondent for the *New York Times*, has been appointed visiting W. Harold and Martha Welch professor of American studies. He is teaching a course titled "The Intellectual in American Culture and Politics" which will consider the work of a variegated group of 20th-century public intellectuals ranging from John Dewey to James Baldwin. Another course "American Religion at the End of the Century" will examine the place of religion and religious movements in American culture. Steinfels was graduated from Loyola University in 1963 and holds a doctoral degree in European history from Columbia University. Before joining the *Times* staff in 1988, he was editor of *Commonweal* magazine.

Honors

Rev. Theodore M. Hesburgh, C.S.C., president emeritus and professor emeritus of theology, was honored as one of six recipients of the 1994 Elizabeth Ann Seton Award from the National Catholic Education Association at the NCEA Seton Awards in Washington, D.C., Sept. 12. Established in 1991, the Seton Award recognizes "Organizations and individuals who have made a significant contribution to education in America and to Catholic schools in particular." The award is named in honor of the first American-born saint and founder of the U.S. Catholic school network in the early 1800s.

Guillermo O'Donnell, academic director of the Kellogg Institute and Kellogg professor of government and international studies, has been appointed a member of the Research Board of the International Forum for Democratic Studies, an institution created by the National Endowment for Democracy.

Gregory E. Sterling, assistant professor of theology, was elected to the editorial board of the *Catholic Biblical Quarterly* for 1995-98.

Stephen C. Tegler, visiting faculty fellow in physics, has been appointed to the NASA Planetary Astronomy Review Panel.

Activities

Ikaros Bigi, professor of physics, gave two lectures on "CP Violation" at the XXII ITEP Winterschool on High Energy Physics in Moscow, Russia, March 1-5. He gave an invited talk on "CP Violation in Beauty Decays" at the VIII Rencontres de Physique de la Vallée d'Aoste in La Thuile, Italy, March 8. He delivered the theory summary talk at "Beauty '94" in Le Mont St. Michel, France, April 24-30. Bigi gave the talk "QCD without Voodoo and Undue Incantations" at the HEP seminar of the Universities of Bonn, May 19; Freiburg, May 20; and Munich, May 25. He presented the lecture "QCD and Charmed Baryons" to the WA89 Collaboration at CERN, Geneva, Switzerland, May 30.

John G. Borkowski, McKenna professor of psychology, presented two papers titled "Discovery Learning and Metacognitively-based Instruction" co-authored with N. Muthukrishna and "Social Contexts and the Teaching of Reading Strategies" with Prof. J. Day at the third Applied Memory Conference at the University of Maryland in College Park, Md., Aug. 2-3. He chaired an NIH study section on Physical and Rehabilitative Medicine in Bethesda, Md., Aug. 4. He participated in the review of the "NIH Consortium on the Long-Term Effects of Early Alternative Child Care Arrangements" in Rockville Md., Aug. 29.

Bruce A. Bunker, associate professor of physics, presented the invited talk "The IXS Database Project" at XAFS8, the eighth international XAFS Conference, in Berlin, Germany, Aug. 29-Sept. 3. He was a co-author on the paper "Glancing Angle XAFS and X-Ray Reflectivity Study of Cu Thermal Vibration Amplitude at the Cu-Al₂O₃ Interface" presented at a meeting of the executive committee of the International XAFS Society in Berlin, Germany, Sept. 1.

Danny Z. Chen, assistant professor of computer science and engineering, gave the presentation "Determining Weak External Visibility of Polygons in Parallel" at the sixth Canadian conference on Computational Geometry in Saskatoon, Canada., Aug. 2-6.

Xavier Creary, Huisking professor of chemistry and biochemistry, presented an invited lecture titled " α -Carbonyl, Thiocarbonyl and Imino Cations. On the Importance of C=X Conjugation" to the Polymer Division of the American Chemical Society at the 208th national meeting in Washington, D.C., Aug. 22. He presented an invited lecture titled "Electron Transfer Initiated Reactions of Halodiazirines" at the Paul Gassman Memorial Symposium at the 208th National American Chemical meeting in Washington, D.C., Aug. 24.

FACULTY NOTES

Michael Detlefsen, professor of philosophy, gave the invited talk "Constructive Existence Claims" at a joint meeting of the Collegium Logicum of Technical University of Vienna and the International Kurt Godel Society, May 30. He gave a talk on "Constructivist Conceptions of Proof" at the colloquium of the Department of Philosophy of the University of Konstanz, July 14.

Patrick F. Dunn, professor of aerospace and mechanical engineering, made a presentation on "Combined-Effects Aerosol Experiments" at the Electric Power Research Institute in Palo Alto, Calif., Aug. 25. He presented a paper titled "Measurement and Analysis of Individual Microsphere-Surface Impact Events" co-authored with M.J. Caylor and **Raymond M. Brach**, associate professor of aerospace and mechanical engineering, at the fourth international Aerosol Conference at the University of California in Los Angeles, Calif., Aug. 29–Sept. 2.

Harald E. Esch, professor of biological sciences, presented an invited paper titled "Honeybees Measure Distance Optically" in a symposium on Communication in Honeybees at the 12th world congress on Social Insects at the Sorbonne in Paris, France, Aug. 26. He gave a lecture on "Communication in Bees" at the Social Insects Department of Utrecht University in Utrecht, Holland, Aug. 30.

J. Philip Gleason, professor of history, gave a lecture on the history of Catholic higher education at the opening faculty seminar at Edgewood College in Madison, Wis., Aug. 25.

William G. Gray, chairperson and Massman professor of civil engineering and geological sciences, presented the invited lecture "Interfaces and Averaging" at the Gordon Research Conference on Modeling of Flow in Permeable Media in Andover, N.H., Aug. 8.

William C. Hamlett, associate professor of biological sciences, South Bend Center for Medical Education, organized and convened a symposium titled "Comparative Cardiovascular Biology of Lower Vertebrates" held in conjunction with the XIV Federative International Congress of Anatomy in Lisboa, Portugal, July 22–30. The presented papers will be published as a special issue of the *Journal of Experimental Zoology* in 1995 which Hamlett will edit.

Rev. Robert A. Krieg, C.S.C., associate professor of theology, presented the invited paper "Teaching Jesus Christ to Undergraduates" at the Undergraduate Teaching Session of the Catholic Theological Society of America in Baltimore, Md., June 11. He gave the invited paper "40th Anniversary Reappraisal of Karl Rahner's 'Chalcedon: End or Beginning?'" at the annual meeting of the Karl Rahner Society in Baltimore, Md., June 11. He presented the invited speech "Jesus Christ in History and Art" at the meeting of the First Friday Club of Cleveland in Cleveland, Ohio, June 30. He taught "Jesus Christ in the Gospels and Art" for the Elderhostel at the University of Notre Dame, Notre Dame, Ind., July 18–22.

Charles Kulpa, professor of biological sciences, presented an invited presentation titled "Binding of Dibenzoethiophene from a Hydrocarbon Phase by IGTS8 (ATCC 53968)" at the American Chemical Society meeting in Washington, D.C., Aug. 21–23.

John M. LoSecco, professor of physics, chaired the opening sessions of the BaBar Detector Collaboration meeting held at the Stanford Linear Accelerator Center at Stanford University in Stanford, Calif., Sept. 8.

Michael N. Lykoudis, assistant chairperson and associate professor of architecture, and **Thomas Gordon Smith**, chairperson and professor of architecture, participated in a panel discussion at a conference on "The Ethos of Contemporary Classical Architecture" in Koroni, Greece, Aug. 26–28.

A. Edward Manier, professor of philosophy, Program in the History of Science, and Reilly Center for Science, Technology and Values, spent a sabbatical year, 1993–94, as a visiting fellow in psychology at the McLean Branch of Massachusetts General Hospital, Harvard Medical School; as a visiting scholar in History of Science at Harvard University; and as resident tutor at Leverett House, Harvard College. He lectured on "Biological Models of Cognition and Affect" at Massachusetts Mental Health Center in Boston, Mass., Feb. 3, and McLean Hospital in Belmont, Mass., Feb. 16.

Rev. Jerome H. Neyrey, S.J., professor of theology, presented "Luke's Social Location of Paul: Cultural Anthropology and the Status of Paul" at the regional Society of Biblical Literature meeting in Chicago, Ill., April 16. He presented "The Social and Cultural World of Jesus" to the Spokane Diocesan Renewal Program in Spokane, Wash., May 23–25. He gave the talk "Holiness in the Christian Scriptures" to the Center for the Development in Ministry in Mundelein, Ill., June 19–21. He presented "Loss of Wealth, Loss of Family, Loss of Honor: The Cultural Background of the Original Makarisms" to the Context Group International in St. Andrew, Scotland, June 28–July 4.

FACULTY NOTES

Wolfgang Porod, professor of electrical engineering, served on the program committee and co-authored the presentations "Open Boundary Conditions for Multidimensional Electronic Scattering States" with Henry K. Harbury and R. Kent Smith, "Numerical Simulation of the Effect of Surface Charges on Electron Confinement in Quantum Dot Structures" with Minhan Chen, and "A Linear Eigenvalue Method for Calculating the Positions of Transmission Poles and Zeros in Resonator Structures" with Zhi-an Shao and **Craig S. Lent**, associate professor of electrical engineering, at the third international workshop on Computational Electronics held in Portland, Oreg., May 18-20.

Steven T. Ruggiero, associate professor of physics, presented an invited talk "Far-Infrared Superconducting Devices Collaboration" at National Institute of Standards and Technology in Boulder, Colo., Aug. 5. He gave the talk and poster "Transport Properties of YBCO Thin Films" at the summer meeting of Midwest Superconductivity Consortium at Purdue University in West Lafayette, Ind., Aug. 9.

Rev. Timothy R. Scully, C.S.C., vice president and associate provost, associate professor of government and international studies and senior faculty fellow in the Kellogg Institute, lectured on "The New Political Landscape of the Chilean Party System" to a special session of parliamentary leaders, party leaders and government officials in Santiago, Chile, Aug. 30. This lecture was part of a larger consulting role sponsored by the United Nations in changing electoral formulas in post-authoritarian Chile. He addressed the session on civil-military relations in democratizing contexts where the military retain high prerogatives in law and practice and gave a lecture to the plenary session of the Inter-American Dialogue at the conference Democratic Governance in the Americas held in Washington, D.C., Sept. 12-13.

Gregory E. Sterling, assistant professor of theology, read the formal response "Philo's Knowledge of Other Exegetes and Exegetical Traditions: A Response to David Hay" in the Philo of Alexandria Seminar at the international meeting of the Studiorum Novi Testamenti Societas in Edinburgh, Scotland, Aug. 1-5. He presided at one session and served as a panelist at another session of the Genre of Luke-Acts Unit at the international meeting of the Society of Biblical Literature in Leuven, Belgium, Aug. 7-10. His book *Historiography and Self-definition: Josephus, Luke-Acts and Apologetic Historiography* (NovTSup 64; Leiden: E.J. Brill, 1992) was reviewed at the second session in which he served as a panelist. He delivered a plenary paper "'Wisdom Among the Perfect': Creation Traditions in Alexandrian Judaism and Corinthian Christianity" at the annual meeting of the Catholic Biblical Association in San Diego, Calif., Aug. 13-16.

Duncan G. Stroik, assistant professor of architecture, exhibited his design for the Roebling Gateway Park at the Carnegie Arts Center in Covington, Ky., throughout May. He presented a paper titled "John Russell Pope, Ultimus Romanorum" at the Summer Program in Classical Architecture at the Institute for the Study of Classical Architecture in New York, N.Y., July 16. He was a panelist at a Symposium of Young Architects where he presented the design and construction history of a number of modern villas while at that institute. His collaborative project with **Ruth E. Stroik**, visiting assistant professor in architecture, for "Villa Indiana: A House for an Architect and Artist" was exhibited at the New York Academy of Art in New York, N.Y., throughout July and August.

Edward Vasta, professor of English, provided a paper titled "Aspects of Denial in the Middle English *Patience*" which was read at the International Medieval Congress held at the University of Leeds, United Kingdom, July 4-7.

Kathleen Maas Weigert, associate professional specialist and faculty liaison/academic coordinator in the Center for Social Concerns, faculty fellow in the Kroc Institute and concurrent associate professor of American studies, spoke at the roundtable on "Pedagogies of Nonviolence and Nonviolent Action" at the annual conference of the Consortium on Peace Research, Education and Development at the University of St. Thomas in St. Paul, Minn., June 16-19. She served as faculty-in-residence for the 1994 Midwest regional institute on Integrating Service with Academic Study at North Central College in Naperville, Ill., June 20-22.

Joannes J. Westerink, assistant professor of civil engineering and geological sciences, presented an invited talk "Meshing Requirements for Large Scale Coastal Ocean Tidal Models" and chaired a session titled "Subsurface Transport II" at the Xth international conference on Computational Methods in Water Resources held in Heidelberg, Germany, July 22. He presented an invited talk titled "Convergence Studies of Hurricane Storm Surge Response over a Large Scale Shelf Model" at the Joint North Sea Modelling meeting held in Brussels, Belgium, July 27.

Samir Younés, assistant professor of architecture, presented an exhibition of architectural drawings for the Reconstruction of the Souks of Beirut at Le Musée National de Beyrouth, July 16-Aug. 31.

ADMINISTRATORS' NOTES

Appointments

José Gonzalez has been appointed assistant director in the Office of Multicultural Student Affairs. A 1991 graduate of Notre Dame with a degree in business, Gonzalez returns to the University after serving for two years as assistant director of admissions at Cleveland's St. Ignatius High School, his alma mater, and one year as a marketing accountant with BP Oil. He also has served as a trustee of Esperanza, Inc., an organization devoted to assisting Hispanic youths in the Cleveland area.

Lori A. Maurer has been appointed assistant director of residence life. A graduate of the University of North Dakota, she holds a bachelor's degree in physical education and a master's in counseling with an emphasis on student development. She most recently served as an area coordinator in the Office of Residence Life at St. Joseph's University in Philadelphia. She previously was a residence director at Bloomsburg University in Pennsylvania and an assistant student activities advisor at her alma mater.

Carrie Pugh has been appointed assistant director in the Office of Multicultural Student Affairs. She was graduated with honors from Ball State University in 1992 with a major in sociology and minors in Asian studies and Spanish. She has worked for the past two years at Memorial Hospital in South Bend as an intern to the vice president for community affairs and, most recently, as site coordinator for the Adolescent Support and Parenting Program of Memorial's Healthy Babies Project. She also has volunteered in several Michiana service organizations, including the Hispanic Task Force.

Faculty Opening

Director, Angers, France, Program for 1995-97. Fluency in French is required. The position involves teaching, administration and liaison with L'Université Catholique de L'Oest and the Centre International D'Études Françaises. If interested, contact Isabel Charles, associate provost and director of International Study Programs, Room 207 Main Building, 631-5086.

Summer Session Commencement Homily

by Rev. Timothy R. Scully, C.S.C.
August 5, 1994

What a strange, almost dissonant, juxtaposition of images and emotions are presented to us in today's scripture.

After all, we are here to celebrate together! Somewhere down-deep we feel a need to thank God for giving us the wherewithal to make it through all this. So this eucharist is rightly about thanksgiving: to God, to our parents, families, friends, spouses, even professors now colleagues. We do this all weekend long the best way we know how: sharing a sacred meal or two with those closest to us, and re-telling in a circle of intimacy our favorite stories of our years here at Notre Dame.

At first, in hearing the scriptures today, it sounds to me like Jesus is coming to crash our party! He comes bursting in with bare-bones — even harsh — words about discipleship and its unavoidable costs:

"If you wish to come after me, then you must deny yourself, take up your cross, and begin to follow in my footsteps. Those who would save their lives will lose them, but those who lose their lives for my sake will find them."

In some ways these intractable words sound like an eccentric uncle's impolite and inopportune outburst at a family picnic. We listen to them politely, respectfully, but easily dismiss them for what they appear to be: wild eccentricities, even a bit dangerous.

But let's, just for a moment, allow the power of these words about the invitation to discipleship and the cross, speak to us in the midst of our celebration.

Jesus invites us, today, and for the rest of our lives, to follow in his footsteps with the whole of what our lives have become here, to walk with him, placing our most precious gifts of mind and heart in the service of the Kingdom.

We at Notre Dame are invited to a peculiar kind of discipleship. We are disciples who share an invitation to follow the Lord with our particular gifts, those of inquiring minds and fulsome hearts. Let me develop ever so briefly these two notions: the peculiar cast given to the discipleship of those with inquiring minds and fulsome hearts.

In our peculiar discipleship, we place **inquiring minds**, freshly endowed with powerful tools aimed at discovery, at the service of the kingdom. St. Thomas More put it thus: "We serve our God in the tangle of our minds." Or, in other words, we serve God in our efforts to grapple honestly and energetically with the tangle of existence.

There are some among us who are skilled at peering into the lens of a microscope, and who help us to understand the wonder of life invisible to the naked eye! Others seek to unlock the secrets of God's created reality, and thereby overcome what to most appear to be unbridgeable physical obstacles. Look around you: Among us are minds creative enough, daring enough, to design an ecologically safe (electric) car that can travel further and faster than ever before imagined. Think about what this, perhaps trivial, example might mean for the possibility of sustaining human life on our planet into the future. There are minds among us that have traveled the past, and rediscovered a universe perhaps five billion years old, or an America five centuries young. Among us are minds that can pluck meaning from the strings of a harp and the lines of a sonnet. There are those among us who can penetrate the minds of philosophers from ancient Greece to modern France, from the classics to the post-modernists, who long to share the tortured search for what is real, for what is true.

As we explore the frontiers of knowledge, each in our own way, we peer into the mind of God as God is revealed in creation, and on a cross, and in the infinite mystery of the everyday reality that surrounds us. And at the end of our mind's purposeful wanderings, we return to a beginning, and come again and again to see and know Christ, and rediscover what and why we love.

Which brings me to a second, and final notion: Ours is a peculiar discipleship endowed not only with **inquiring minds** but also **fulsome hearts**. At Notre Dame, we do not only seek to know God's creation with all that our mind allows, but to love God's creation with all the unbridled passion our heart permits. As St. Thomas suggested, we seek to know God's creation not somehow to perfect ourselves, but because through this knowledge the One we love becomes present to us. Discipleship calls us to know the Other, and to love the Other; to be turned totally toward God and toward God's sole image on earth, the children of God.

And it is here, when we set our hearts to love fully, that we quickly find ourselves at the foot of the cross. The reality we have come to know is harsh, even chilling. Let's face it, even for those of us who are so copiously blessed, life is often painful. To life's everyday quotient of suffering, add more than a billion persons who walk or lie on this earth hungry. More than ten thousand a day die hungry; but for each one who dies, another takes his or her place — and the disquieting trend is that soon two more will take that place. Though this is true in Rwanda; it is also true in parts of America. We need recite no litany of woe; human pain is familiar enough to each of us.

But our discipleship is a special one because we have been so copiously blessed with inquiring minds and fulsome hearts. Quite simply, to follow Jesus is quite literally "to spend your life's gifts for the sake of others." To engage our minds and hearts in love.

Did Jesus come to speak these bare-bones truths to us today to spoil the party? To dampen our spirit of celebration? Nothing could be further from the spirit of the Lord.

At the heart of the life spent in service to others is the discovery of the fullness of new life. In the midst of adversity, and even death, you will constantly discover life. Losing your life is the only path to discovering it.

I do pray that Notre Dame has deepened your mind's thirst for discovery, and your heart's longing to love and be loved. If so, I am happy, because you leave this beloved place educated, with perhaps a hint of the blessed mystery of God's creation, and a clue that our hearts will not rest, until they rest in God.

So let the celebration continue!

Summer Session Commencement Address

Sr. Kathleen Cannon, O.P.

August 5, 1994

On behalf of the members of the faculty and administrative staff of the University of Notre Dame, it is my pleasure to greet the class of 1994 and their guests on this commencement morning. It is an honor and a privilege to be with you today and to share in this moment of celebration. This moment is a refreshing pause before you move on to new challenges, new jobs, in different countries and in other cultures, in new personal and social contexts. But it is a moment that allows for reflection and gratitude — reflection on the richness of life and learning that your time at Notre Dame has meant for each of you uniquely, individually, personally. And it is a moment of gratitude for all of your life that has been nourished in this place. As the University graduates you today and confers on you your degrees, we acknowledge your achievements and celebrate the enormous promise which each of you holds out for tomorrow. You accomplished what you came to Notre Dame to do and we your professors and administrators, your fellow students, your friends and your families congratulate you and rejoice with you. Obviously none of you had to come here to Notre Dame and you and your loved ones have had to sacrifice a great deal so that you might arrive at this day. You have completed three, or four, or five, or even more years of study and you know well that the life of study has its own demands. Academic life implies effort, concentration, discipline, hard work and — yes, worry and frankly, joy. Illumination comes in small bits and only from time to time not usually in broad bright flashes. To be sure, study is not all work and it can yield its own delight. Some of you also have young families and have had to restructure your time with them or work long hours and late into the night. Others of you have done your course work in the summers foregoing any respite from the challenging round of work and study. And this is to say nothing of the financial burden which has been and will be yours.

Undoubtedly, there were times when you wondered: What does it all mean? What does it have to do with anything really significant? Is it worth the sacrifice? Hopefully what you have been about here and what the University has actually done for you will become clearer to you as the years go on and as the value of this education which is now yours becomes more apparent to you. Receiving the diploma today occurs in one fleeting moment. But what has happened before, the entire course of the educational experience, is what shapes your lives now and will shape your future.

DOCUMENTATION

The sacrifices of your loved ones, of course, are no less. And if I may change voices for just a moment and speak on your behalf to your parents, spouses, children and best friends. You have given so much: material necessities; intellectual enthusiasm and encouragement to continue; self-confidence and love. Today you have journeyed from near and far and you even listen to a commencement speaker, simply because this day is just too good to miss. You have helped to bring these graduates to this day and we at Notre Dame congratulate you, too, and in their names we thank you. And, in the beginning and at the end, we thank the distinguished members of our faculty. For all these contributors to your education, I invite the class of 1994 to give your applause.

Newspapers publish pieces about how much more money one can make over the course of a lifetime when one has a University degree. This implies, of course, that the real business of living begins once we get that piece of paper — the entry to the good life, the better job. Only then, say some, does our life work get under way — this academic interlude only a preface and soon forgotten. But the most important part about your degrees and the most important part about the academic experience derive from the overall opportunity to be in the company of persons, “the little platoon of scholars” as Cardinal Newman and more recently Jaroslav Pelikan put it, who constantly pursue the study of truth. To translate Plato somewhat freely: The best way to educate is to introduce people into conversation with the best companions.

In a recent address at Notre Dame-Australia, the novelist Morris West described the enterprise as “a company of men and women of all races, creeds and opinions, who debate — as they must in the pursuit of knowledge — who dispute inevitably about principles and practices and viewpoints.” Thus educational experience frees us to join that company by entering that conversation for the sake of moving toward truth. If we are lucky we are caught up in the quest for life. The discussion about those who teach and those who learn is, of course, a very relative one because finally we all are pupils in this great world and we all are teachers of the next generation.

Your commencement, then, marks your belonging to a community. A community of learning essentially, but also a community of care and concern. A community in which all persons are encouraged to grow in every way, in mind, in spirit, in knowledge, and wisdom and understanding. It is here in such a community that people do something sacred for one another. They assist and encourage one another with all of their energies to grow in wholeness. This particular academic community, Notre Dame, a Catholic university community, in addition provides an atmosphere in which other values are not only tolerated but are in fact desirable. It provides the atmosphere in which generosity is presumed, where people are

concerned enough to take one another seriously, and this causes a degree of difference. It is a community in which the members rejoice in the opportunity for service to one another. Respect, enthusiasm, openness to truth and humility before it, tolerance of others faults and idiosyncracies, single mindedness without fanaticism, these exist in the best educational communities. But they should prevail in a Catholic university whose very existence and goal is the pursuit of truth and in particular the kind of truth that sets humanity free.

Notre Dame, guided by its more than 150-year-old dedication to the pursuit and sharing of truth, has made every effort to provide you with the framework and options through which each of you might, uniquely and individually, of course, attain your academic degree, a credential by which our faculty and trustees attest that you are well educated persons.

The real value of that education is not to be found in practical knowledge alone — how to do certain things — or in having current answers to problems — the real value is found in learning how to ask the right questions. One of the advantages of university learning is that it opens us up to the right questions. We should always be grappling with the questions and concerning ourselves with understanding the deeper issues. Those with the benefit of a university education have an obligation to be thinking about the big questions all of the time so that the decisions that they make in their lives can be truly affected by what they have learned in their educational experience. That is after all, the ultimate aim of study — not to know what others have thought — but to begin to glimpse the truth about life.

The familiar world we all know of common sense, while a sufficient guide for many of our daily tasks and needs cannot hope to cope with the profound changes that beset our society. Common sense is simply not adequate to interpret the anxious questions in so many hearts: What is really happening here? What does it all mean? And what can I possibly do about it?

Consider just one of the challenges that you are going to be faced with — that all of us are going to be faced with — as we stand on the brink of a new millennium: the information revolution which we have slipped into during the past 20 years. Evoking an image right out of Dante, even *Time* magazine's recent article “Battle for the Soul of the Internet” suggests that the demonic in our culture and society has taken on a different name and content from the demons of the Middle Ages but is no less real or threatening. Today in a certain sense we are battling for the soul of the future. So many are so afraid of the information super highway; in the face of the future they wonder if any of us is going to have a private life. Where is privacy going to be as we march down the information

super highway? What is this going to do to us? How will it affect our children? How can it be channeled for the great service to intellectual life which it portends? University educated people have to be part of the channeling, part of making people understand its value as well as its challenges.

Other issues such as the rise of a true global market, genetic engineering, international cooperation for ecological security, will present equally dramatic challenges and questions for us. These movements, products of our own genius as a human family may threaten humanity's soul or they can be used to contribute to our freedom and to the search for truth.

Your influence and responsibility as leaders in society, the economy, and the world community will help to determine the positive outcome of a world in ferment.

What we must remember if the years of study are to be truly successful, is that it is always up to us to be ever engaged with the challenge and the thrill of study and contemplation. For it is only through personal commitment to such engagement that we develop as human beings who can really make a difference in life. And here, of course, the University's mission statement calls upon our generosity of spirit and our willingness to share what we have received with others. The mission statement says that the aim of the educational experience is "to create a sense of human solidarity and concern for the common good that will bear fruit as learning becomes service to justice."

In you, the class of 1994, the University once again experiences the fulfillment of its essential mission to educate to truth in all of its forms. This is how your University — your alma mater now, as you leave, has both perfectly and imperfectly, tried to serve you and to love you. In some sense, this place is yours because here you have had the opportunity for the greatest of challenges and the most significant of experiences — intellectual and thought provoking ones — ones which can frame the rest of your lives. And so, today, we have good cause to honor the life of your mind and spirit. We who remain at the University hope that this whole life of your spirit has been enkindled and challenged by your experience here and that Notre Dame's spirit and life have endeared themselves in many ways to you. May you always take time to reflect upon the questions and may the paths which you choose in life always help, in some way, to serve the needs of others.

We hope for the best from you in the name of Notre Dame and we trust that you will prosper under the blessing of God's love.

God speed and God bless.

Freshman Orientation Homily

by Rev. Richard V. Warner, C.S.C.

August 28, 1994

Ireland is said to be the land of a hundred thousand welcomes, and it's true, but I think you will agree with me that Notre Dame is not far behind. This word slips easily from lips around here, and it is said sincerely and with feeling. Whether you are the first one in your family to come here or whether you have worn blue and gold almost since you took your first breath, you are here now, and this land is your land now. Welcome.

In the first reading from the book of Deuteronomy, a conversation between God and the Israelites, represented by Moses, establishes a covenant of love. The Israelites wanted their own land; they wanted to take their place among the nations of their world. What would distinguish the Israelites among all the other nations and tribes would be their faithfulness to God.

The land they sought could not be conquered on the basis of their own strength. It would be theirs, however, if they lived their lives in faithfulness to God's laws and decrees. By loving and respecting God and each other, they would receive their inheritance as God's chosen ones, as God's beloved people. Their land would be the place where the name of the God of Abraham would always be holy, and where compassionate acts of mercy and love would distinguish them as a people.

Their story of faith, like ours, had its ups and downs. At times, the Israelites were absolutely faithful to the personal God they gradually come to recognize and trust. Then, despite misfortunes of every kind, they experienced deeply and sometimes passionately God's abiding love for them.

They were tempted, as we are, to turn to God in moments of danger, or fear or when they knew that left to their own resources, they could neither prevail nor succeed. When things went well, they, like us, believed that their achievements and happiness were the result of their own talents and effort.

In his letter to early Christian believers, the apostle James reminds us that "every worthwhile gift comes from above" and that the source of our true blessings is our God who can never be overshadowed or outshined; our God who can never be outdone in mercy or compassion, whose love never fails, and who is loyal and faithful to us under every circumstance.

DOCUMENTATION

Today's gospel is yet another reminder that we can neither capture nor encompass our relationship to God only in laws or commandments, even though these are very important.

Jesus repeats time and again in the gospel that our relationship to God and to each other, especially those most in need, depends upon a truly human heart which pulsates in generous solidarity and unselfish love.

We should act upon the word of God that has been implanted in our heart, the apostle reminds us. Then we will both worship with a fulsome heart and act humbly in meeting the needs of others as trustworthy friends of the poor.

Dear Notre Dame students.

At Notre Dame, religion is not thoughtless conformity to tradition.

Religious observance is a free action that comes from your heart. It is not shallow, unreflective acquiescence or submission to someone else's demands. We worship God, we yearn to know more about Jesus Christ, we joyfully meet the needs of people who are hungry, and homeless, and discriminated against because these actions flow from our convictions and from our beliefs.

Maybe once upon a time, when you were young, you went to Church because you had to. Maybe you were concerned about others, because service was a requirement.

But not now. Not here at Notre Dame.

If you worship God, if you who are Catholics celebrate the Eucharist, it is not going to be because someone makes you do it. It will be because you will come to want to live your life of faith in such a way that you can be faithful to the God who loved you first. It will be because you will feel the need, the deep craving, to pray to the God who gave you life and who made of your life something truly remarkable.

You know, when you were born, the human and the divine came together in an incredible way. Your parents, in the mystery of God's plan for you, gave you life. Because of them, because of their love and support and encouragement, you have had opportunities which have enabled you to become Notre Dame students. From them, you first learned of the mysteries of faith, which are central mission values for Notre Dame as well.

Yes, these will be formative years, when you will explore life's many promises, and consider the deepest yearnings of your heart which spring from your faith. At Notre Dame, which is a community of scholars, your minds surely will be expanded. And at Notre Dame, which is a community of believers, your beliefs will continue to be enhanced.

Notre Dame is a welcoming community of scholars and believers.

Many times, like this morning, you will gather around an altar, usually in your residence halls. You will share in the body and blood of Christ which is your birthright as a person of faith. You will bring simple gifts of bread and wine, and Jesus himself will become your nourishment.

But your encounter with Christ cannot stop at the chapel door. For you are called to let your lives exemplify in simple and uncomplicated ways, the call to service which springs from Eucharist. You will have many opportunities to serve others; whether by meeting the needs of your fellow students on campus who are lonely or burdened in some way or by serving people in the South Bend area or in some other place where human life and well being is threatened.

Take advantage of the opportunities you will have here to grow in faith, in worship and in service. Learn more about the God you love through discussions with others and in quiet moments of prayer.

That has been the way for generations of Notre Dame men and women. Let it be your way, too. May your years here be marked by a growing desire to be more faithful and committed believers.

DOCUMENTATION

Faculty Board in Control of Athletics

August 1, 1994

In attendance: Rev. E. William Beauchamp, C.S.C., chair; Professor George Craig; Professor JoAnn DellaNeva; Dr. Kathleen Halischak, recorder; Professor George Howard; Professor David Kirkner; Professor William Nichols; Professor Patricia O'Hara; Dr. Roland Smith
Absent: Professor Fernand Dutile

The meeting was called to order at 8:40 a.m. by Dr. Halischak.

1. Dr. Halischak presented for board consideration a recommendation for Horst Dziura as captain of the men's tennis team. The board recommended approval.

2. Dr. Halischak presented for board consideration a recommendation for monogram awards in lacrosse. The board recommended approval of the monograms. This list is attached to these minutes and hereby incorporated by reference as an official part of the board minutes.

3. Dr. Halischak presented for board consideration a recommendation for the playing schedule of women's tennis. The board recommended approval of the schedule. This list is attached to these minutes and hereby incorporated by reference as an official part of the board minutes.

4. Dr. Halischak presented for board consideration a recommendation for the playing schedule of men's tennis. Questions were raised regarding the number of absences by individuals who are invited to elite tennis events since they have often missed more than the allotted three class absences. Professor O'Hara reminded the board of the policy that was put into place several years ago which holds that these individuals are reviewed on a case-by-case basis and decisions are made by her office in consultation with Academic Services. Dr. Halischak was asked to present information on the exact number of classes that could possibly be missed by individuals on both the men's and women's team. The board tabled the vote on the men's tennis playing schedule.

5. Dr. Halischak presented for board consideration a recommendation for the playing schedule of women's golf. The board recommended approval of the schedule. This list is attached to these minutes and hereby incorporated by reference as an official part of the board minutes.

6. Dr. Halischak presented for board consideration a recommendation for the playing schedule of women's basketball. The board recommended approval of the schedule. This list is attached to these minutes and hereby in-

corporated by reference as an official part of the board minutes.

7. Dr. Halischak presented for board consideration a recommendation for the playing schedule of ice hockey. The board recommended approval of the schedule. This list is attached to these minutes and hereby incorporated by reference as an official part of the board minutes.

8. Father Beauchamp announced to the board the retirement of Dick Rosenthal and the appointment of Michael A. Wadsworth as athletic director, effective August 1, 1995. Father Beauchamp outlined for the board the events that led to these decisions and answered questions from the board members. The press release regarding these announcements and the vita of Mr. Wadsworth are attached to these minutes.

9. Father Beauchamp asked the board members for topics of discussions for upcoming meetings. The following were suggested: a follow-up to Dean Keane's letter recommending restricted athletic participation for selected probationary student-athletes; a discussion regarding the off-campus living situation of student-athletes; a discussion of the voting on the faculty board; a discussion of the travel policy of athletic teams during bad weather; and a discussion of increased faculty participation in football recruiting.

The meeting was adjourned at 9:45 a.m.

THE GRADUATE SCHOOL OFFICE OF RESEARCH

Current Publications and Other Scholarly Works

Current publications should be mailed to the Office of Research of the Graduate School, Room 312, Main Building.

COLLEGE OF ARTS AND LETTERS

Anthropology

DaMatta, Roberto A.

R.A. DaMatta. 1994. Treze Pontos Riscados em Torno da Cultura Popular. *Anuário Antropológico* 92:49-67.

R.A. DaMatta. 1994. Wie wird Brasil zu Brasilien? Pages 164-173 in, *Nachdenken Über Eine Reise Ohne Ende: Brasilien Literaisch*. Babel Verlag/Haus der Kulturen der Welt, Berlin, Germany.

Economics

Dutt, Amitava K.

A.K. Dutt, ed. 1994. *New Directions in Analytical Political Economy*. Edward Elgar Publishing Limited, Aldershot, Hants, England. xiv + 340 pp.

A.K. Dutt. 1994. On the Long-run Stability of Capitalist Economies: Implications of a Model of Growth and Distribution. Pages 93-120 in, A.K. Dutt, ed. *New Directions in Analytical Political Economy*. Edward Elgar Publishing Limited, Aldershot, Hants, England.

Jarsulic, Marc W.

M.W. Jarsulic. 1994. Profits and Growth Dynamics. Pages 77-92 in, A.K. Dutt, ed., *New Directions in Analytical Political Economy*. Edward Elgar Publishing Limited, Aldershot, Hants, England.

Kim, Kwan S.

K.S. Kim. 1994. Emerging Issues in Pacific Asian Economic Cooperation and Integration: An Overview. Pages 47-60 in, *Sixth Korean Economic Association Conference Proceedings*. The Korean Economic Association, Seoul, Korea.

K.S. Kim. 1994. Foreign Trade Regimes, Employment and Income Distribution — Selected Developing Country Studies. *Keizai Kenkyu* 45(3):218-229.

Mirowski, Philip E.

P.E. Mirowski. 1994. Some Suggestions for Linking Arbitrage, Symmetries and the Social Theory of Value. Pages 185-210 in, A.K. Dutt, ed., *New Directions in Analytical Political Economy*. Edward Elgar Publishing Limited, Aldershot, Hants, England.

Ros, Jaime

J. Ros. 1994. Foreign Exchange and Fiscal Constraints on Growth: A Reconsideration of Structuralist and Macroeconomic Approaches. Pages 271-292 in, A.K. Dutt, ed., *New Directions in Analytical Political Economy*. Edward Elgar Publishing Limited, Aldershot, Hants, England.

You, Jong-Il

J.-I. You. 1994. Endogenous Technical Change, Accumulation and Distribution. Pages 121-147 in, A.K. Dutt, ed., *New Directions in Analytical Political Economy*. Edward Elgar Publishing Limited, Aldershot, Hants, England.

History

Miscamble, Wilson D., C.S.C., Rev.

Rev. W.D. Miscamble, C.S.C. 1994. The Foreign Policy of the Truman Administration: A Post-Cold War Appraisal. *Presidential Studies Quarterly* XXIV(3):479-494.

Philosophy

Watson, Stephen H.

S.H. Watson. 1994. Between Tradition and Oblivion: Foucault etc. Pages 262-285 in, G. Gutting, ed., *The Cambridge Companion to Foucault*. Cambridge University Press, Cambridge, England.

S.H. Watson. 1994. Merleau Ponty, The Ethics of Ambiguity. Pages 147-170 in, P. Burke and J. vanderVeken, eds., *Merleau Ponty in Contemporary Perspective*. Kluwer, Hague, The Netherlands.

S.H. Watson and A.B. Dallery, eds., with E.M. Bower. 1994. *Transitions in Continental Philosophy*. SUNY Press, Albany, New York. 353 pp.

Program of Liberal Studies

Weinfield, Henry M.

H.M. Weinfield. 1994. Song for the In-Itself and For-Itself. Pages 198-199 in, A.R. Ammons, ed., *The Best American Poetry 1994*. Scribner's, New York, New York.

Theology

Krieg, Robert A., C.S.C., Rev.

Rev. R.A. Krieg, C.S.C. 1994. Romano Guardini: Paving the Way for Vatican II. *National Catholic Register* 70(07/24/94):1+8.

Sterling, Gregory E.

G.E. Sterling. 1994. Review of Josephus and the New Testament, by S. Mason. *Journal of Religion* 74:251-52.

G.E. Sterling. 1994. Review of The Portrait of Philip in Acts: A Study of Roles and Relations, by F.S. Spencer. *Catholic Biblical Quarterly* 56:152-154.

THE GRADUATE SCHOOL OFFICE OF RESEARCH

COLLEGE OF SCIENCE

Biological Sciences

Pollard, Morris

M. Pollard and P.H. Luckert. 1994. The Antimetastatic Effect of IV-Inoculated BCG on Adenocarcinomas in the Prostate-Seminal Vesicle Complex of L-W Rats. *Anticancer Research* 14:901-904.

Rai, Karamjit S.

K.S. Rai. 1993. Genetics of a Colonizing Species: *Aedes albopictus* in the New World. Pages 137-151 in, K.K. Dhir and T.S. Sareen, eds., *Frontiers in Plant Science Research*. Bhagwati Enterprises, Delhi, India.

Mathematics

Alber, Mark S.

M.S. Alber and J.E. Marsden. 1994. Geometric Phases and Monodromy at Singularities. Pages 273-296 in, N.M. Ercolani et al., eds., *Singular Limits of Dispersive Waves*, NATO ASI Series B, Vol. 320. Plenum Press, New York, New York.

M.S. Alber and J.E. Marsden. 1994. Resonant Geometric Phases for Soliton Equations. Pages 1-26 in, A. Bloch, ed., *Field Institute Communications Vol. 3: Hamiltonian Gradient Flows, Algorithms and Control*. American Mathematical Society, Providence, Rhode Island.

Hu, Bei

B. Hu and H-M. Yin. 1994. Blowup of Solution for the Heat Equation with a Nonlinear Boundary Condition. Pages 189-198 in, X. Liu and D. Siegel, eds., *Comparison Methods and Stability Theory*. Marcel Dekker, Inc., New York, New York.

Rosenthal, Joachim J.

M.S. Ravi, J. Rosenthal and X. Wang. 1994. On Generic Stabilizability and Pole Assignability. *Systems & Control Letters* 23(2):79-84.

Snow, Dennis M.

D.M. Snow. 1993. Computing Tensor Product Decompositions. *A.C.M. Transactions on Mathematical Software* 19:95-108.

Yin, Hong-Min

See under Hu, Bei. 1994. Pages 189-198 in, *Comparison Methods and Stability Theory*.

Physics

Rettig, Terrence W.

See under Tegler, Stephen C. 1994. *Astrophysical Journal* 423:674-680.

Tegler, Stephen C.

D.A. Weintraub, S.C. Tegler, J.H. Kastner and T.W. Rettig. 1994. Infrared Spectroscopy and Imaging Polarimetry of the Disk Around the T Tauri Star RNO 91. *Astrophysical Journal* 423:674-680.

COLLEGE OF ENGINEERING

Aerospace and Mechanical Engineering

Huang, Nai-Chien

N-C. Huang and X. Liu. 1994. A Model Study of Debonding and Pull-out of Fibers from Fiber-Reinforced Composite. *IACM WCCM III, The Third World Congress on Computational Mechanics II*:1352-1353.

Stanisic, Michael M.

S.J. Remis and M.M. Stanisic. 1994. A Comparison of Two Minimally-Singular Articulated Arm-Subassemblies. Pages 351-358 in, J. Lenarcic and B. Ravani, eds., *Advances in Robot Kinematics and Computational Geometry*. Kluwer Academic Publishers, Dordrecht, The Netherlands.

S.J. Lorenc and M.M. Stanisic. 1994. Third-Order Control of a Planar System Tracking Constant Curvature Paths. Pages 229-238 in, J. Lenarcic and B. Ravani, eds., *Advances in Robot Kinematics and Computational Geometry*. Kluwer Academic Publishers, Dordrecht, The Netherlands.

Civil Engineering and Geological Sciences

Gray, William G.

J.C. Muccino, W.G. Gray and M.G.G. Foreman. 1994. Calculation of Vertical Velocity in a 3D Model Using a Least Squares Approach. Pages 1105-1112 in, A. Peters, G. Wittum, B. Herrling, U. Meissner, C.A. Brebbia, W.G. Gray and G.F. Pinder, eds., *Computational Methods in Water Resources X*, Vol. 2. Kluwer Academic Publishers, Dordrecht, The Netherlands.

A. Peters, G. Wittum, B. Herrling, U. Meissner, C.A. Brebbia, W.G. Gray and G.F. Pinder, eds. 1994. *Computational Methods in Water Resources X*, Vol. 1 and 2. Kluwer Academic Publishers, Dordrecht, The Netherlands. Vol. 1 xxvi + pp. 1-830; Vol. 2 xxvi + pp. 831-1548.

C.D. Montemagno and W.G. Gray. 1994. Effective Visualization of Large Data Sets. Pages 1465-1471 in, A. Peters, G. Wittum, B. Herrling, U. Meissner, C.A. Brebbia, W.G. Gray and G.F. Pinder, eds., *Computational Methods in Water Resources X*, Vol. 2. Kluwer Academic Publishers, Dordrecht, The Netherlands.

R.L. Kolar, W.G. Gray and J.J. Westerink. 1994. Normal Flow Boundary Conditions in Shallow Water Models — Affect on Mass Conservation and Accuracy. Pages 1081-1088 in, A. Peters, G. Wittum, B. Herrling, U. Meissner, C.A. Brebbia, W.G. Gray and G.F. Pinder, eds., *Computational Methods in Water Resources X*, Vol. 2. Kluwer Academic Publishers, Dordrecht, The Netherlands.

THE GRADUATE SCHOOL OFFICE OF RESEARCH

Westerink, Joannes J.

C.A. Blain, J.J. Westerink and R.A. Luettich. 1994. Domain and Grid Sensitivity Studies for Hurricane Storm Surge Predictions. Pages 1275-1282 in, A. Peters, G. Wittum, B. Herrling, U. Meissner, C.A. Brebbia, W.G. Gray and G.F. Pinder, eds., Computational Methods in Water Resources X, Vol. 2. Kluwer Academic Publishers, Dordrecht, The Netherlands.

J.J. Westerink and R.A. Luettich. 1994. Meshing Requirements for Large Scale Coastal Ocean Tidal Models. Pages 1323-1330 in, A. Peters, G. Wittum, B. Herrling, U. Meissner, C.A. Brebbia, W.G. Gray and G.F. Pinder, eds., Computational Methods in Water Resources X, Vol. 2. Kluwer Academic Publishers, Dordrecht, The Netherlands.

See under Gray, William G. 1994. Pages 1081-1088 in, Computational Methods in Water Resources X, Vol. 2.

Computer Science and Engineering

Chen, Ziyi D.

Z.D. Chen. 1994. Determining Weak External Visibility of Polygons in Parallel. Pages 375-380 in, Proceedings of the Sixth Canadian Conference on Computational Geometry. Saskatoon, Saskatchewan, Canada.

Electrical Engineering

Lent, Craig S.

See under Porod, Wolfgang. 1994. Pages 219-222 in, Proceedings of the Third International Workshop on Computational Electronics.

Porod, Wolfgang

Z. Shao, W. Porod and C.S. Lent. 1994. A Linear Eigenvalue Method for Calculating the Positions of Transmission Poles and Zeros in Resonator Structures. Pages 219-222 in, S.M. Goodnick, ed., Proceedings of the Third International Workshop on Computational Electronics. Oregon State University Press, Portland, Oregon.

M. Chen and W. Porod. 1994. Numerical Simulation of the Effect of Surface Charges on Electron Confinement in Quantum Dot Structures. Pages 215-218 in, S.M. Goodnick, ed., Proceedings of the Third International Workshop on Computational Electronics. Oregon State University Press, Portland, Oregon.

H.K. Harbury, W. Porod and R.K. Smith. 1994. Open Boundary Conditions for Multidimensional Electronic Scattering States. Pages 153-156 in, S.M. Goodnick, ed., Proceedings of the Third International Workshop on Computational Electronics. Oregon State University Press, Portland, Oregon.

LAW SCHOOL

Gunn, Alan

V.R. Johnson and A. Gunn. 1994. Studies in American Tort Law. Carolina Academic Press, Durham, North Carolina. lxi + 996 pp.

A. Gunn and L.D. Ward. 1993. 1994 Supplement to Cases, Text and Problems on Federal Income Taxation (3d Ed.). West Publishing Company, St. Paul, Minnesota. xiii + 55 pp.

Le, Trai T.T.

T.T.T. Le. 1994. The Legal Status of the Refugee in the United States. *American Journal of Comparative Law* (Supplement 1994):577-615.

INSTITUTE FOR CHURCH LIFE

Center for Pastoral Liturgy

Fitzgerald, Timothy, Rev.

Rev. T. Fitzgerald. 1994. Infant Baptism: A Parish Celebration. Liturgy Training Publications, Archdiocese of Chicago, Chicago, Illinois. 110 pp.

Mitchell, Nathan D.

N.D. Mitchell. 1994. Eucharist as Sacrament of Initiation. Liturgy Training Publications, Archdiocese of Chicago, Chicago, Illinois. 154 pp.

LOBUND LABORATORY

Luckert, Phyllis H.

See under College of Science, Biological Sciences; Pollard, Morris. 1994. *Anticancer Research* 14:901-904.

THE GRADUATE SCHOOL OFFICE OF RESEARCH

Summary of Awards Received and Proposals Submitted

In the period July 1, 1994, through July 31, 1994

AWARDS RECEIVED

Category	Renewal		New		Total	
	No.	Amount	No.	Amount	No.	Amount
Research	7	564,392	21	1,145,023	28	1,709,415
Facilities and Equipment	1	61,000	1	41,474	2	102,474
Instructional Programs	0	0	0	0	0	0
Service Programs	0	0	0	0	0	0
Other Programs	0	0	4	73,340	4	73,340
Total	8	625,392	26	1,259,837	34	1,885,229

PROPOSALS SUBMITTED

Category	Renewal		New		Total	
	No.	Amount	No.	Amount	No.	Amount
Research	4	615,410	10	2,266,712	14	2,882,122
Facilities and Equipment	0	0	1	55,316	1	55,316
Instructional Programs	0	0	0	0	0	0
Service Programs	0	0	0	0	0	0
Other Programs	0	0	0	0	0	0
Total	4	615,410	11	2,322,028	15	2,937,438

THE GRADUATE SCHOOL OFFICE OF RESEARCH

Awards Received

In the period July 1, 1994, through July 31, 1994

AWARDS FOR RESEARCH

Aerospace and Mechanical Engineering

Atassi, H.
Hydrodynamics and Acoustics in Nonuniform Flows
Department of the Navy
\$100,000 46 months

Biological Sciences

Lodge, D.
Food Webs and Nutrients: Benthic Community Responses
National Science Foundation
\$68,921 54 months

Adams, J.
Molecular Analysis of *P. vivax* Erythrocyte Binding Proteins
World Health Organization
\$18,000 12 months

Duman, J.
Structure/Function Studies of Dendroides Antifreeze Protein
Aspen Systems, Inc.
\$30,000 6 months

Civil Engineering and Geological Sciences

Gray, W.
NSF-Graduate Research Traineeship
National Science Foundation
\$215,000 24 months

Pyrak-Nolte, L.
National Science Foundation Young Investigator 1994
National Science Foundation
\$25,000 12 months

Spencer, B., Sain, M.
Reliability and Safety of Controlled Structures
National Science Foundation
\$66,067 30 months

Chemical Engineering

Chang, H.
REU Supplement to NSF CTS-91-12977
National Science Foundation
\$2,500 36 months

Brennecke, J.
REU Supplement for NSF-CTS91-57087
National Science Foundation
\$5,000 54 months

Varma, A., McGinn, P.
Combustion Synthesis Under Microgravity
National Aeronautics and Space Administration
\$129,000 24 months

Brennecke, J.
Presidential Young Investigator Award
National Science Foundation
\$62,500 54 months

Chemistry and Biochemistry

Miller, M.
Asymmetric Synthesis of Antiviral and Antifungal Compounds
Miles
\$34,060 12 months

Bumpus, J.
Enzymology of Fungal and Mammalian Peroxidase
Utah State University
\$93,135 12 months

Huber, P.
Protein Binding Domains on Eukaryotic 5S rRNA and rDNA
National Institutes of Health
\$184,997 12 months

Electrical Engineering

Stevenson, R., Lumsdaine, A.
Parallel Algorithms for Image Processing
Department of the Air Force
\$50,785 12 months

Stevenson, R.
Multi-Frame Integration for High-Resolution Skills
Department of the Air Force
\$35,408 12 months

Sain, M., Yang, K., et al.
Clark Clutch Plates
Clark-Hurth Components
\$7,000 6 months

Minniti, R.
VLSI Fabrication Principles — Short Course
Delco Electronics Corporation
\$42,858 12 months

Porod, W., Lent, C., et al.
Coulomb Coupling between Quantum Dots and Waveguides
Department of the Navy
\$139,998 36 months

Government and International Studies

Mainwaring, S.
The Urban Poor in Democratic Argentina
North-South Center
\$19,465 4 months

THE GRADUATE SCHOOL OFFICE OF RESEARCH

Mathematics

Alber, M.
Nonlinear Integrable Equations
National Science Foundation
\$30,000 24 months

Dyer, M.
Coxeter Groups and Lie Theory
National Science Foundation
\$19,200 12 months

Physics

Garg, U.
Investigation: Isoscalar Giant Dipole Resonance in
Nuclei
North Atlantic Treaty Organization
\$7,782 24 months

Bigi, I.
Subtle Tests of the Standard Model
National Science Foundation
\$123,560 42 months

Rettig, T., Tegler, S.
The Nuclear Structure of P/S-L9 by High Resolution
Imaging
SpaceTelescope Science Institute
\$59,844 24 months

Wayne, M., Ruchti, R.
DO Detector Project
Fermi National Lab
\$53,000 2 months

Johnson, W., Sapirstein, J.
Weak Interactions in Atomic
National Science Foundation
\$36,335 42 months

Program of Liberal Studies

Power, F.
Self-Evaluation Processes
Kauffman Foundation
\$50,000 12 months

AWARDS FOR FACILITIES AND EQUIPMENT

Chemical Engineering

Brennecke, J.
Time-Resolved Fluorescence Spectrometer
National Science Foundation
\$41,474 12 months

Physics

Cason, N., LoSecco, J., et al.
Equipment for Brookhaven Experiment E-852
Brookhaven National Laboratory
\$61,000 61 months

AWARDS FOR OTHER PROGRAMS

Financial Aid

Malloy, J.
Indian Fellowship
Department of Education
\$23,440 12 months

Sociology

Hallinan, M.
NAFSA Fellowship for Vladimir T. Khmelkov
NAFSA/Association of International Educators
\$9,900 12 months

Theology

Sterling, G.
Theological Scholarship and Research Award
Association of Theological Schools
\$15,000 12 months

Whitmore, T.
Henry Luce III Fellow in Theology
Association of Theological Schools
\$25,000 12 months

THE GRADUATE SCHOOL OFFICE OF RESEARCH

Proposals Submitted

In the period July 1, 1994, through July 31, 1994

PROPOSALS FOR RESEARCH

Biological Sciences

- Boyd, S.
Neuropeptide Control of Behavior
National Science Foundation
\$273,144 36 months
- Muller, I.
Factors Directing the Immune Response to Leishmania
Major
World Health Organization
\$192,937 36 months
- Duman, J.
Structure/Function Studies of Insect Antifreeze Proteins
Department of the Air Force
\$180,000 36 months
- Muller, I.
Antigen Specificity of T Lymphocytes
World Health Organization
\$166,140 36 months
- Carlton, R.
Benthic Algal Productivity and Oxygen Production
National Oceanic and Atmospheric Administration
\$27,204 12 months

Chemistry and Biochemistry

- Miller, M.
Design of an Improved Beta-Lactam Antibiotic
National Institutes of Health
\$0 12 months
- Thomas, J.
Photodamage on Clays
Environmental Protection Agency
\$500,000 36 months
- Photophysical Studies of Freezing
ACS Petroleum Research Fund
\$75,000 36 months
- Basu, S.
Glycolipid Metabolism in Normal Pathological Tissues
National Institutes of Health
\$14,790 12 months
- Fehlner, T., Wolf, E.
Precursors for Heterogeneous Catalysts
National Science Foundation
\$554,146 36 months

Computer Science and Engineering

- Lumsdaine, A.
Parallelism for Computational Science and Engineering
Mississippi State University
\$552,266 60 months

Electrical Engineering

- Liu, R., Huang, Y.
Blind Identification Seismic Signal Processing
W.J. Schafer Association, Inc.
\$300,021 12 months
- Sain, M., Tang, K., et al.
Clark Clutch Plates
Clark-Hurth Components
\$7,000 6 months

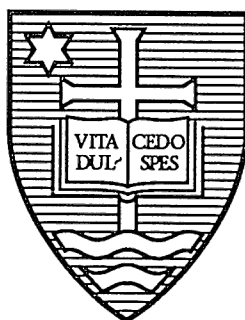
Physics

- Glazier, J.
NSF Young Investigator Award
National Science Foundation
\$39,474 12 months

PROPOSALS FOR FACILITIES AND EQUIPMENT

Computer Science and Engineering

- Uhran, J., Antsaklis, P., et al.
Computational Intelligence Applications Laboratory
National Science Foundation
\$55,316 12 months



NOTRE DAME REPORT

Volume 24, Number 3

September 30, 1994

Notre Dame Report (USPS 7070-8000) is an official publication published fortnightly during the school year, monthly in the summer, by the University of Notre Dame, Office of the Provost. Second-class postage paid at Notre Dame, Indiana. *Postmaster:* Please send address corrections to: Records Clerk, Department of Human Resources, Security Building, University of Notre Dame, Notre Dame, IN 46556.

Linda M. Diltz, Editor
Marten Schalm, Designer
Julie E. Rogers, Publication Assistant
Gerard Jacobitz, Indexer
Publications and Graphic Services
415 Main Building
Notre Dame, IN 46556
(219) 631-5337

© 1994 by the University of Notre Dame, Notre Dame, IN 46556. All rights reserved.

