Who We Are College of Engineering May trail 149 the 2010 Faculty Meeting College of Engineering College of Engineering the nation is total State of the College College integrates teaching



Dean Bruce R. White

Academic Year 2009-10

who will make a differr 150

research and service to

society, advancing the

leading edge of engineering

knowledge and training t

next generation of engine

our world.

Meeting Minutes

- UNIVERSITY OF CALIFORNIA, DAVIS VOLUME XXXVIII, NO. 3
 - ACADEMIC SENATE

MINUTES

• REGULAR MEETING

• FACULTY OF THE COLLEGE OF ENGINEERING (DAVIS)

• May 19, 2010, 4:00 p.m., room 1065 Kemper Hall

Order of Business

- Announcements by the President, Mark Yudof (none)
- 2. Announcements by the Chair, Ron Hess Slides to follow

Executive Committee Activities

- CEC Chair participation on the Administrative Services College Workgroup
- CEC sought Department views on Importance of Accreditation
- CEC received briefing from Karen Andrews and Gail Yokote regarding Library Reorganization

Executive Committee continued

- CEC provided COE response to the Chancellor regarding "UC Davis A Transformative Vision"
- Requested and received budget updates from the Dean's Office
- Received updates from Chairs of COE Standing Committees

Executive Committee continued

- Received briefing from Human Resources personnel Irene Horgan-Thompson and Tracy Schuster regarding implementation of recommendations from the Administrative Services workgroup
- Provided COE response to Council of Vice Chancellors draft recommendations to the Commission on the Future

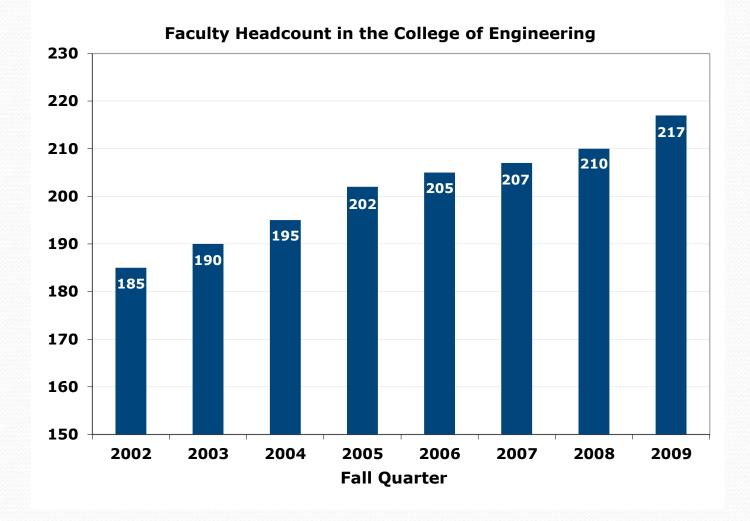
Executive Committee continued

• CEC will be providing input to the Dean of Engineering regarding strategic academic planning issues for the College.

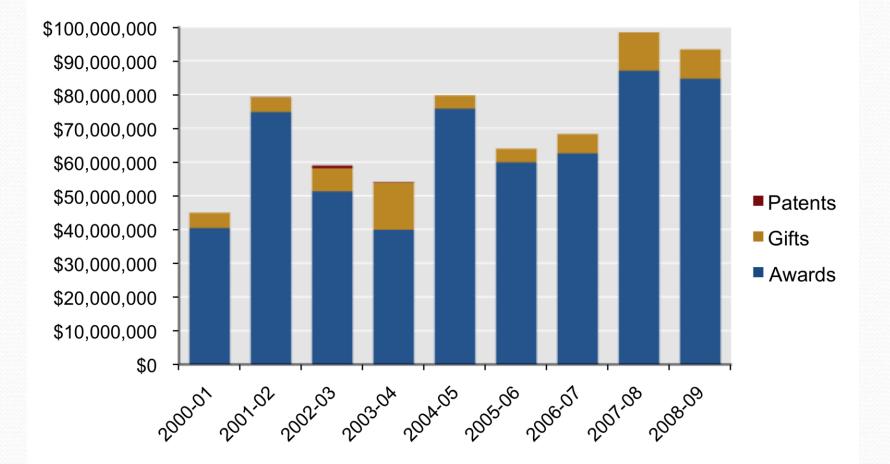
Order of Business

3. Announcements by Dean, Bruce R. White Slides to follow

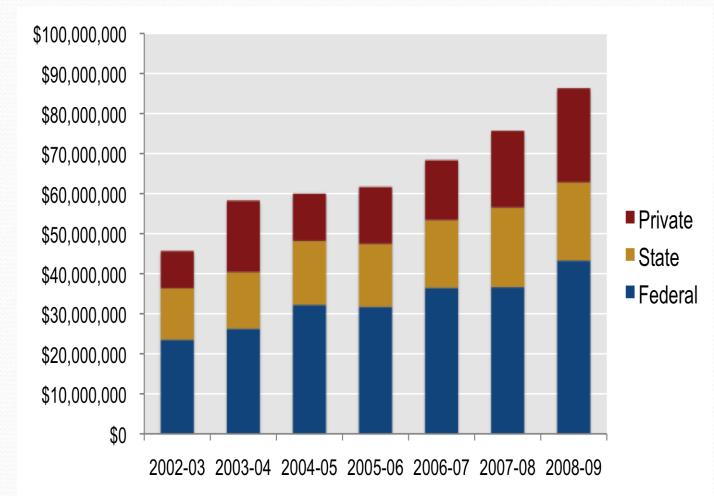
Faculty Growth



Research Grants & Contracts



Research Expenditures



Private now Represents 30% of Total Research Expenditures

NSF Career Awards (42)

Ian Kennedy (MAE) – PYI	1988	Dipak Ghosal (CS)	1997	Mihaela vanderSchaar (ECE)*	2005
Enrique Lavernia (CHMS) – PYI	1989	Frederic Chong (CS)*	1998	Zhendong Su (CS)	2006
Jeannie Darby (CEE) – PYI	1990	Marjorie Longo (CHMS)	1998	Rajeevan Amirtharajah (ECE)	2006
Kathryn McCarthy (BAE) – PYI	1990	Olav Solgaard (ECE)*	1998	Bevan Baas (ECE)	2006
Michael McCarthy (BAE) – PYI	1990	Thomas Young (CEE)	1998	M. Saif Islam (ECE)	2006
A. Nazli Gundes (ECE) – PYI	1992	Kwan-Liu Ma (CS) - PECASE	2000	Valeria LaSaponara (MAE)	2007
Matt Farrens (CS) – PYI	1992	Michael Zhang (CEE)	2000	Hao Chen (CS)	2007
Stephanie Dungan (CHMS) - PYI	1993	Hussain Al-Asaad (ECE)	2001	lan Davidson (CS)	2007
Nicolas Abbott (CHMS)*	1995	Norman Tien (ECE)*	2002	Nael El-Farra (CHMS)	2008
Ronald Phillips (CHMS)	1995	Anh-Vu Pham (ECE)	2002	Yayoi Takamura (CHMS)	2008
Bernd Hamann (CS)	1996	Annamarie Amenta (CS)	2002	David Horsley (MAE)	2009
Phillip Rogaway (CS)	1996	Chen-Nee Chuah (ECE)	2003	Tingrui Pan (BME)	2009
Venkatesh Akella (ECE)	1997	Frank Loge (CEE)	2004	Michael Neff (CS)	2009
Debbie Niemeier (CEE)	1997	Xin Liu (CS)	2005	Klaus Van Benthem (CHMS)	2010

PYI – Presidential Young Investigator

*No longer at UCD

Graduate Rankings

Category	2004	2005	2006	2007	2008	2009	2010	2011
Engineering Overall	36	37	38	T35	T34	T32	33	32
Among Public Institutions	20	21	22	20	T19	T20	20	20
Aerospace/Aeronautical		25	T20	T22	T32	T33	T30	T24
Biomedical/Bioengineering		28	T24	T21	T24	T27	T26	T23
Chemical		22	T25	T27	T26	T20	T22	T30
Civil	20	15	T16	17	T20	T16	T18	T16
Computer Engineering		36	T35	T34	T37	T37	T39	N/A
Computer Science					T40	T37	T37	T39
Electrical/Electronic/Comm.		39	T38	T33	T40	T37	T36	T38
Environmental/Env. Health	18	11	14	T13	T12	T13	T13	T14
Materials		36	T26	T28	T26	T22	T34	T26
Mechanical		31	T28	T28	T38	T35	T32	T33

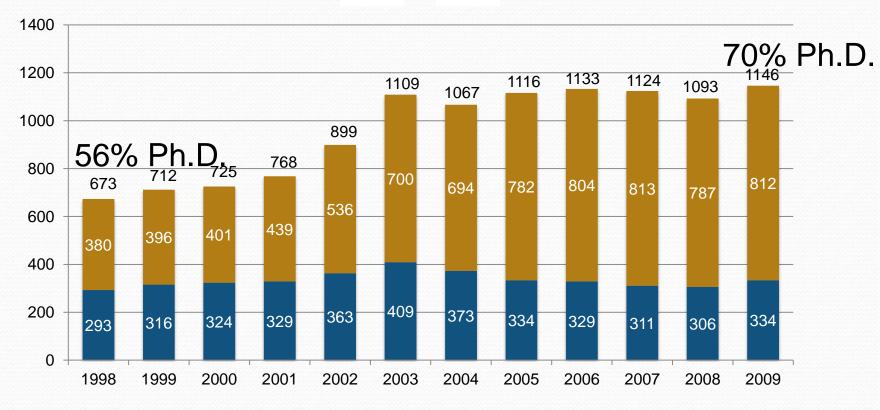
US News and World Report Rankings, America's Best Graduate Schools, published in April the preceding year.

T = Tied with one or more schools.

Graduate Enrollments

Graduate Enrollment* in the College of Engineering

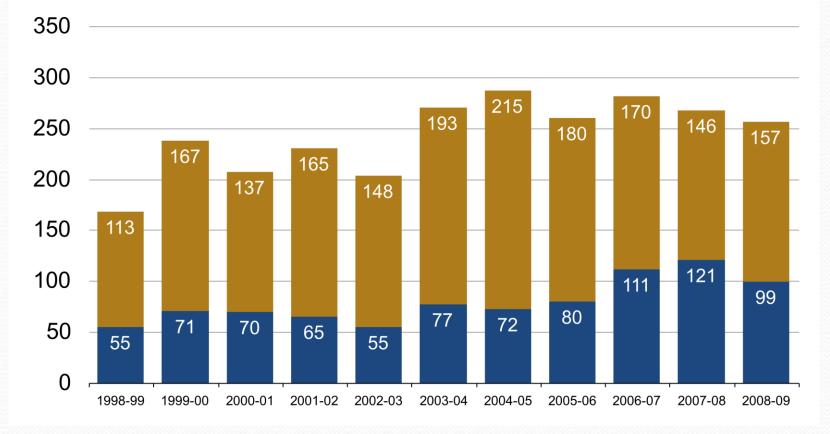
MS 🛛 🗧 PHD



*Starting Fall 2003, graduate enrollment includes students on PELP status, filing fee status or students in graduate groups outside of engineering whose major research advisor is an engineering faculty member.

Graduate Degrees Awarded

Doctoral Masters

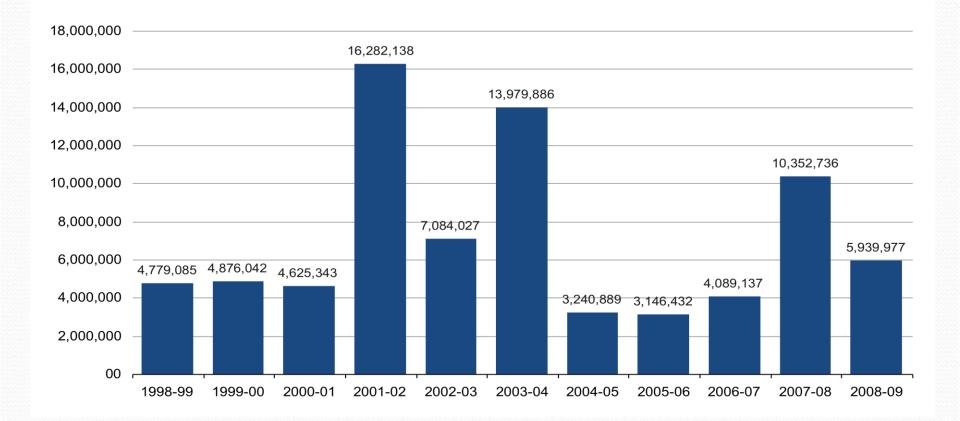


UCDavis Startup Licensing Agreements 2003 - 2008

New Company	Founder	Founded	Licenses
Arete Therapeutics	Bruce Hammock	2003	9
SialoGen Therapeutics	Rick Troy	2003	1
Trace Genetics		2003	
Vitalea Science	Steve Dueker	2003	1
Airmid	Heike Wulff	2004	6
GlycoMetrix	Kit Lam / Carlito Lebrilla	2004	3
Immunotox Inc	Leo Chalupa	2004	
Q1 Nanosystems (fka All Best Materials LLC)	Pieter Stroeve / Ruxandra Vidu	2004	3
Hill Engineering LLC	Mike Hill	2005	
Stratovan	David Wiley / Bernd Hamman	2005	
Pediatric Biosciences	David Amaral	2006	1
Advanced Luminescence	Charles Hunt	2006	1
EDI - Efficient Drivetrains Inc.	Andy Frank	2006	3
High Merit ThermoElectrics	Susan Kauzlarich	2006	
HyPhase Energy	Mat Caldwell (grad student)'	2006	
Mesolytics Inc	Zane Starkewolfe / Dan Masiel (grad students)	2006	
Mutant Logic	Jorge Campos (grad student)	2006	2
SynapSense	Raju Randey	2006	2
MilDeas	Julie Sutcliffe	2007	
Synthia	lan Kennedy / Dan Change	2007	3
XeraSys	John Rundle	2007	2
OnSite Power	Ruihong Zhang	2007	5
Planarmag	Anh-vu Pham	2008	

10 College of Engineering Faculty Involved in Startup Licensing Agreements

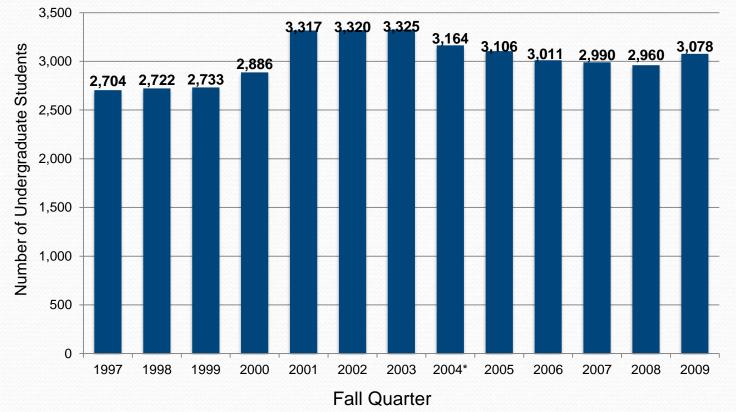
Trends in Private Gifts and Grants



Undergraduate Enrollment

Undergraduate Enrollment* in the College of Engineering

(includes the Computer Science major in the College of Letters & Science)

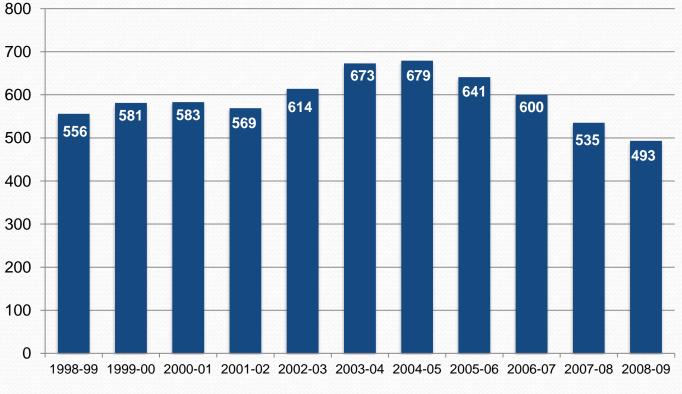


*Beginning Fall Quarter 2004, enrollment figures include students on temporary PELP status.

Bachelor Degrees Awarded

Bachelor Degrees Awarded in the College of Engineering

(includes the Computer Science major in the College of Letters & Science)



Fiscal Year

Undergraduate Rankings

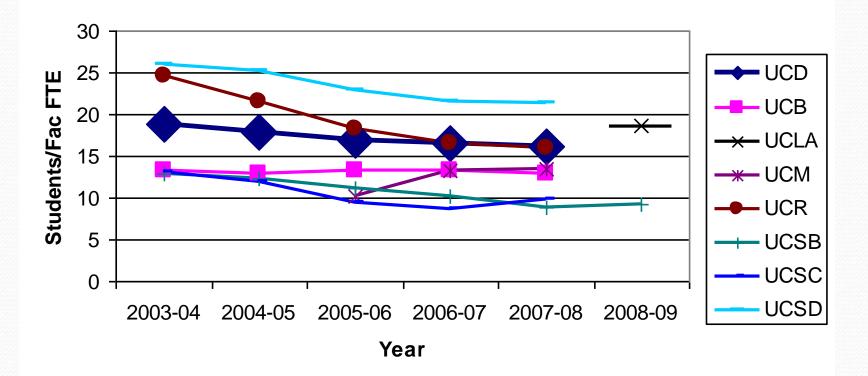
Category	2007	2008	2009	2010
National Universities: Top Schools	T47	T42	T44	T42
Public Universities: Top Schools	T13	T11	T12	T11
Best Undergraduate Engineering Programs	T34	T33	T35	T34
Best Undergraduate Engineering Public Institutions	T19	T19	T20	T19
Agricultural Engineering	T2	T4	T5	6 th
Biomedical Engineering	T21			

US News and World Report Rankings, America's Best Colleges, published in August the preceding year. T = Tied with one or more schools

UC Engineering Teaching

(Undergraduate)

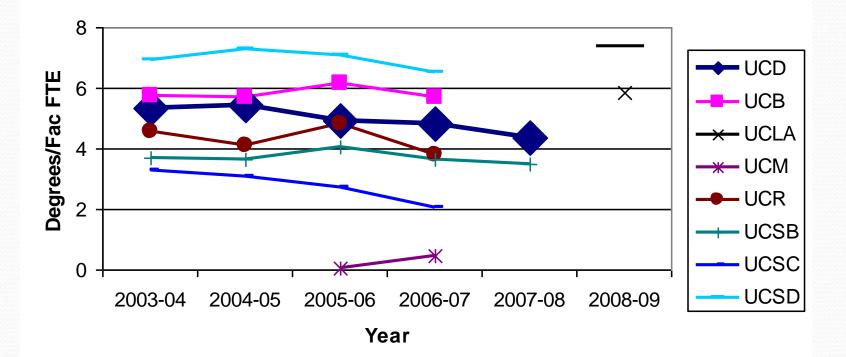
Fall Enrollment per Faculty FTE



UC Engineering Teaching

(Undergraduate)

Degrees Granted per Faculty FTE



Distinguished Engineering Alumni Medal Awards Program ("DEAM")

Highlights of Review Committee Recommendations September 2009 Goal: Increase participation!

Comparison Programs: UC Berkeley, University of Iowa, UC Davis College of Agricultural and Environmental Sciences)

Triple number of medals awarded by creating three separate categories:

- Academia
- Business or Industry
- Public Service

2010 DEAM Winners



Business Tim Bucher



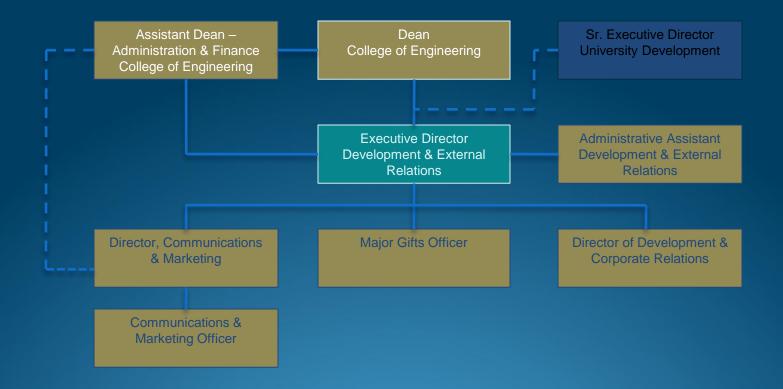
Public Service Jeff Canclini Flight Trials Lead Lockheed Martin

Reception Thursday June 10th from 4:00 pm to 6:00 pm, Bruce and Marie West Lobby, Kemper Hall





Academia Michael Chajes, Dean College of Engineering University of Delaware **Restructuring of the Development and External Relations Office**



Budget Updates

- CoE Intranet Site
 - Budget related information & FAQs posted; information will be updated periodically
 - Please send questions other requests for information to Dean White or Assistant Dean Fulton
 - Discussion on budget reductions/Re-working of CoE budget will continue with chairs/ MSOs and the Executive Committee over the next 2-3 weeks
- Administrative Services in the CoE
 - <u>Campus Director of Compensation Irene Horgan-Thompson</u> has been meeting with MSOs and dean's office staff to discuss a different model for administrative services
 - <u>Presentation to CoE Executive Committee, Chairs, and MSOs</u> on May 17, 2010, on status of administrative services discussions to date, by Irene and MSOs
 - Open Forums for CoE Faculty and Staff (dates/times to be confirmed): Thursday, May 27, 2010, 4:00-5:00 (Irene Horgan-Thompson on Administrative Services) Wednesday, June 9, 2010, 4:00-5:00, Budget Overview/Reduction Targets
- I.T. Work Group on Shared Services in the CoE, Faculty & Staff Representatives (charge letter to be sent by May 21, 2010)

New Faculty since July 2009

- Nitin Nitin (BAE, July 09)
- Ilias Tagkopoulos (CS July 09)
- Mark Modera (CEE July 09)
- Todd Green (CS July 09)
- Kyriacos Athanasiou (BME July 09)
- Stephen O'Driscoll (ECE August 09)
- Linda Katehi (ECE August 09)

Reports from Standing Committees

Committee on Undergraduate Educational Policy, Pieter Stroeve, Chair Angie Louie, committee representative

Awards Committee, Walter Harris, Chair Zhaojun Bai, committee representative

Reports continued

Research and Library Committee, Brian Kolner, Chair Karen McDonald, committee representative

Committee on Graduate Study, Tonya Kuhl, Chair

Committee on Student Recruitment, Development, and Welfare, Sanjay Joshi, Chair

Order of Business continued ...

- 4. Special orders (none)
- 5. Petitions of students (none)
- 6. Unfinished business (none)
- New business: (none)
 Chair,
 Faculty of the College of Engineering

Standing Committees 2010/11

Executive Committee

Applied Science BAE **BME** CHMS CEE CS ECE MAE

Greg Miller David Slaughter Simon Cherry Marjorie Longo Jeannie Darby Matthew Farrens Zhi Ding **Ron Hess**

Student Recruitment,

Development and Welfare

Applied Science BAE **BME CHMS** CEE CS ECE MAE

Stephen Cramer Michael McCarthy Jinyi Qi Yayoi Takamura Ken Loh Matt Bishop Anna Scaglione **David Horsley**

Undergraduate Educational Policy

Applied Science BAE BME **CHMS** CEE CS ECE MAE

Hector Baldis Michael Delwiche Angie Louie **Pieter Stroeve Bassam Younis** Phillip Rogaway **Stephen Lewis Roger Davis**

Awards Committee

Applied Science BAE **BME CHMS** CEE CS ECE MAE

Yong Duan Bryan Jenkins Scott Simon **Ron Phillips** John Bolander Zhaojun Bai **Bernard** Levy **Mohamed Hafez**

Research and Library

Applied Science BAE **BME CHMS** CEE CS ECE MAE

Brian Kolner Wes Wallender Alex Revzin Sabyasachi Sen Tim Ginn Hao Chen **Charles Hunt** Kazuo Yamazaki

Graduate Study

Applied Science BAE **BME CHMS** CEE CS ECE MAE

Brian Kolner Shrini Upadhyaya Tonya Kuhl **Roland Faller** Frank Loge Kwan-Liu Ma Venkatesh Akella J.P. Delplanque

Faculty Meeting Concluded:

25 senate members attended the annual faculty meeting.