

# Graduate Education in the U.S.: National Concerns and a Princeton Perspective

William B. Russel
Dean of the Graduate School
Princeton University

ACGS October 2009

- Commission on the Future of Graduate Education in the US
- A Princeton Perspective



# Commission on the Future of Graduate Education in the United States

#### **Conveners**

Debra W. Stewart, President Kurt Landgraf, President & CEO Council of Graduate Schools Educational Testing Service

#### Chair/Vice Chair

William B. Russel, Dean
Princeton University
Suzanne Ortega, Vice Provost
University of New Mexico

#### **Members**

Corporate executives (IBM, Xerox, DuPont, TIAA/CREF, Battelle Institute, Bank of America)

University presidents/chancellors (UCLA, Jackson State, Wisconsin) Provosts and deans (American, Virginia Tech, UC Davis, Ohio State, Penn State, Hofstra, SUNY Brockport, Indiana)



# **Major National Reports**

# **National Academies**

- Policy Implications of International Graduate Students and Postdoctoral Scholars in the United States (2005)
- Rising Above the Gathering Storm (2007)
  - → U.S. innovation and future prosperity depend on our capacity to produce appropriate numbers of graduate degree holders prepared to address the challenges and opportunities of the 21st century.



# What's missing? The evidence!

- What is the right number of graduates?
- What do the trends indicate?
- Is current graduate training appropriate?
- How is the rest of the world responding?



# **Organization**

Commission advice and consent

• Council of Graduate Schools guidance and editing

• Educational Testing Service research and writing

# Report

- Introduction
- Current status and expectations
- Vulnerabilities
- Recommendations and action plan release April 29, 2010



# **Princeton University**

small, private research university 5,200 undergraduates

### **Graduate Programs**

2,452 graduate students 39% female

37% international (7% China) 14/7% American minorities

# **2009-10** enrollment Doctoral (41)Masters (7)

Zoos to em omment	Doctorul (1)	JIVIABLEI
Humanities	478	4
Social Sciences	452	40
Natural Sciences	660	-
Engineering	489	28
Architecture	22	63
Int'l & Public Affairs	41	174
2008-09 degrees	349	155



#### **Goals of the Graduate School**

- Attract the best and brightest from all demographic groups and around the world
- Support graduate students well both financially and physically
- Maintain rigorous disciplinary degree programs with interdisciplinary opportunities
- Provide opportunities to gain understanding of other societies and cultures
- Augment academic programs with professional development
- Bring a major fraction of the students to timely completion of their degrees
- Graduate individuals who will steward the professions and improve the world
- Maintain connection with alumni to assess our success and enlist their support



# **Support Services**

#### for

#### **Undergraduate and Graduate Programs**

#### **Students**

#### **Center for Teaching & Learning**

English Language Program Preparation for teaching

#### **Writing Program**

Science Writing
Dissertation Boot Camps

#### **General Counsel**

Visa services

#### **Campus Life**

Health services International center Career services

#### **Facilities**

Housing and dining

#### Alumni

#### **Alumni Council**

Reunions & regional events APGA

#### **Communications**

Princeton Alumni Weekly

#### **Development**

Graduate Annual Giving



# What do we worry most about?

• admissions quality and diversity of students

• **support** financial aid and housing

• academic standards reenrollment and completion

• placement employment and success



# **Graduate Admissions**

#### **Graduate School**

# School/Dept/Program

- set targets and overbids
- recruit applicants
- collect applications [Jan 1]
- transmit applications to programs evaluate and rank admits meet to agree on admits and financial offers
- transmit offers

· recruit admits

process responses

negotiate offers to applicants on wait list complete admissions process by April 15



### **Results of Graduate Admissions**

	2005-06	••••	2009-10	
<ul><li>applications</li></ul>	8,120		10,138	
<ul><li>admits</li></ul>	1,050 [12.5%]		1,070 [10.5%]	
• acceptances	540 [51%]		571 [54%]	
		[74]	4% masters, 48%	Ph.D.s]

- most serious competitors
   Harvard in all but engineering
   Stanford, MIT, Berkeley in sciences, engineering, social sciences
   Columbia, Yale, CMU, Chicago also in several divisions
- selective growth in masters and Ph.D. programs



### **Annual Re-enrollment**

#### **Graduate School**

#### • open process in Spring

#### **Graduate Program**

- →• graduate student reports progress and plans for next year
  - committee/adviser reviews and provides assessment
  - graduate student reviews/responds
  - adviser & director of graduate studies
- **∠** agree to re-enroll/defer/terminate
- associate dean reviews and approves or consults
- decision transmitted to student



The Graduate School maintains **centralized control** over graduate education, but must remain **responsive** to the priorities of the University and the needs and aspirations of the departments and programs and **depends** on support from all administrative units of the University.

Therefore, maintaining close contact with the entire campus is essential to the health of the Graduate School.



# Ph.D. Completion, Median Time-to-Degree, and Placement

2008-09 Ph.D.s	#	TTD	Placement		#
Architecture	1	5.6	Academic	Major U.S.	29
Humanities	74	6.6		Other U.S.	50
Social Sciences	70	6.0		Int'l	14
Int'l & Public Policy	6	4.7	Postdoctoral	U.S.	110
Natural Sciences	108	5.0		Int'l	29
Engineering	<u>90</u>	5.1	Ind/Business		65
Overall	349	5.6	Govt/NPO		23
			Not/Unkn		16

- Percentage of completion in the 75-85% range
- Healthy time-to-degree though long in the humanities
- High percentage (95%) placed at graduation
- Intense competition for top academic positions
- Major fraction (40+%) in postdoctoral appointments
- Significant portion (25%) in non-academic positions