

2012

# Stanford Facts



**INFORMATION FOR VISITORS AND PROSPECTIVE STUDENTS**

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## Stanford Academic Calendar 2012

Stanford's complete academic calendar may be found online at <http://www.stanford.edu/dept/registrar/>

### WINTER QUARTER, 2012

Jan. 9:	First day of quarter, instruction begins
Jan. 16:	Martin Luther King, Jr., Day (holiday, no classes)
Feb. 20:	Presidents' Day (holiday, no classes except for Law)
March 12–18:	End-quarter period
March 16:	Last day of classes
March 19–23:	End-quarter examinations

### SPRING QUARTER, 2012

April 2:	First day of quarter, instruction begins
May 28:	Memorial Day (holiday, no classes)
June 1-7:	End-quarter period
June 6:	Last day of classes
June 7:	Day before finals, no classes
June 8–13:	End-quarter examinations
June 16:	Senior Class Day
June 16:	Baccalaureate Saturday
June 17:	Commencement

### 2012-13 FIRST DAY OF CLASSES AND END OF TERM

Autumn 2012–13:	Sept. 24 and Dec. 14
Winter 2012–13:	Jan. 7 and March 22
Spring 2012–13:	April 1 and June 12 (Commencement June 16)
Summer 2012–13:	June 24 and Aug. 17

### FUTURE COMMENCEMENT DATES

June 16, 2013  
June 15, 2014  
June 14, 2015  
June 12, 2016

An introduction  
to one of the  
great American  
universities

# Stanford **Facts** 2012

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### **ON THE COVER:**

Stanford's annual Commencement weekend includes a Baccalaureate celebration for students and their families. *Photo by Linda A. Cicero*

# Visiting Stanford

**T**HE STANFORD VISITOR CENTER IS LOCATED AT 295 GALVEZ ST. Visitors may obtain maps and information at this location. Visitor Information Services (VIS) provides one-hour campus walking tours free to the public each day at 11 a.m. and 3:15 p.m.—except during the winter break and on some holidays—starting at the Visitor Center. Walking tours for groups of 10 or more may be arranged by calling (650) 725-3335 at least one month in advance. VIS also offers golf-cart tours each day at 10 a.m. and 1 p.m., except during finals, the first week of class and academic breaks. These tours are \$5 per person, and reservations can be made at <http://visit.stanford.edu>. Visitors interested in undergraduate admission or tours for prospective students should contact the Office of Undergraduate Admission at (650) 723-2091. For other questions, call VIS at (650) 723-2560.

## Arizona Garden

The Arizona Garden, located near the Mausoleum in the Arboretum, was planted in the 1880s by the Stanfords, adjacent to the site of their proposed, but never built, residence at the Palo Alto Stock Farm. The 17,000-square-foot garden, filled with cacti and succulents, is open daily to the public at no charge. Volunteers are welcome to help with garden restoration the third Saturday of each month. Email [christy.smith@stanford.edu](mailto:christy.smith@stanford.edu).

## Cantor Arts Center

The Cantor Arts Center at Stanford University presents art in 24 galleries plus sculpture gardens, terraces and courtyards. The center's diverse collections span 5,000 years and the world's cultures and number some 30,000 objects, including one of the largest collections of Rodin bronzes outside Paris.





Cantor Arts Center

Presenting a wide range of changing exhibitions, docent tours, lectures, gallery talks, symposia and classes, the Cantor Arts Center is a cultural hub for the community and a teaching resource for Stanford. Admission is free. Call (650) 723-4177.

### **Campus Sculpture**

Stanford has an extensive collection of outdoor art throughout the campus. Among more than 70 sculptures are works by Auguste Rodin, Henry Moore, Josef Albers, Alexander Calder, George Segal, Joan Miró and Andy Goldsworthy. The Papua New Guinea Sculpture Garden features the carving methods, cultural traditions and mythological heritage of the Kwoma and Iatmul people of Papua New Guinea. The B. Gerald Cantor Rodin Sculpture Garden contains 20 works by Auguste Rodin, including *The Gates of Hell*. Call (650) 723-4177.

### **Thomas Welton Stanford Art Gallery**

The Thomas Welton Stanford Art Gallery, part of the Department of Art & Art History, houses studio art classrooms and offers a rotating exhibit program. During exhibitions, it is open Tuesday through Friday, 10 a.m. to 5 p.m., and weekends, 1 to 5 p.m. Call (650) 723-3404.

### **Hoover Tower**

This 285-foot landmark, dedicated in 1941, offers views of campus, the foothills and the Santa Clara Valley. The observation deck houses a carillon of 48 bells, the largest weighing 2.5 tons. The charge is \$2 for general admis-



Goldsworthy's  
Stone River

sion and \$1 for seniors and children. Stanford faculty, students and staff are admitted free with a Stanford ID, along with three guests. The observation deck is open daily 10 a.m. to 4 p.m., but closed most holidays and academic breaks. Call (650) 723-2053 or email [hoover.tower@stanford.edu](mailto:hoover.tower@stanford.edu).

### **Herbert Hoover Memorial Exhibit Pavilion**

The Pavilion, located next to Hoover Tower, has changing exhibits. Posters, photos and videos from the Hoover Institution Archives document aspects of modern history. The Pavilion is open free to the public Tuesday through Saturday, 11 a.m. to 4 p.m., except during exhibit installation and holidays. Call (650) 723-3563.

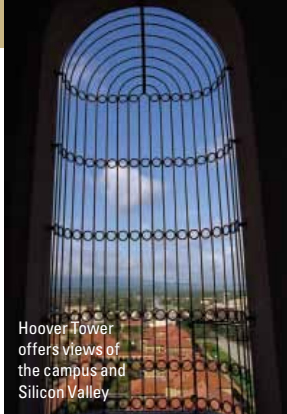
### **Stanford Memorial Church**

The dominant architectural feature of the Main Quadrangle, Memorial Church was dedicated in 1903 in memory of Leland Stanford and has been non-sectarian since its inception. One especially striking feature of the church is the brilliant mosaics covering the interior walls and depicting scenes from the Hebrew Bible. The stained glass windows depict scenes from the New Testament. The church features some 20,000 shades of color in the tile mosaics, 34 shades of pink alone in the cheeks of the four angels in the dome. Memorial Church features five organs, including the Fisk-Nanney

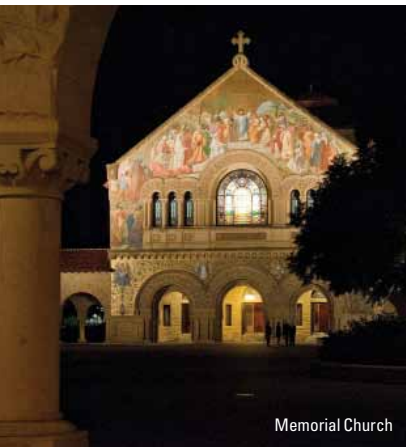
organ, which has 73 ranks and 4,332 pipes. The church is open weekdays from 8 a.m. to 5 p.m. Docent tours are offered every Friday at 2 p.m. and the last Sunday of each month at 11:15 a.m. Special tours can be set up for groups. Call (650) 723-3469.

### **Hanna House**

Docent-led tours of Frank Lloyd Wright's Hanna House can be scheduled online. Tours are held on the first and third Sundays of the month and the second and fourth Saturdays. Reservations are



Hoover Tower offers views of the campus and Silicon Valley



Memorial Church

required. Admission is \$10 per person. Pets and children under 12 are not permitted, and visitors must wear soft-soled shoes. Disabled access is limited. Visit <http://hannahoustours.stanford.edu>.

### **Jasper Ridge Biological Preserve**

Docent-led tours are given at the Jasper Ridge Biological Preserve. Priority is given to groups aligned with the preserve's mission "to contribute to the understanding of the Earth's natural systems." The preserve, located near the Stanford campus, is a 1,189-acre natural laboratory. Children under 14 are not permitted. Information about tours can be found at [jrpb.stanford.edu](http://jrpb.stanford.edu), and reservations can be made by calling (650) 851-6813.

### **The Dish**

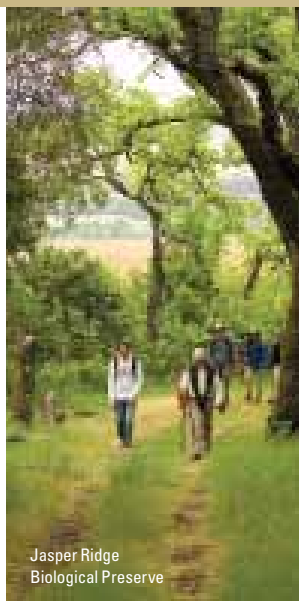
The 150-foot diameter radio telescope, located in the academic reserve in the Stanford foothills, is a popular destination for about 500,000 hikers annually. Known simply as "the Dish," it was constructed in the 1960s to probe the scattering properties of the Earth's ionosphere. It weighs 300,000 pounds and is owned and maintained by SRI International. A 315-acre habitat reserve has been proposed, and eight breeding ponds have been established in the area for the threatened California tiger salamander. Access to the four miles of service roads for public recreation is limited to daylight hours, and dogs are prohibited.

### **Rosenberg Athletic Hall of Fame Room**

The Sydney and Theodore Rosenberg Athletic Hall of Fame Room in the Arrillaga Family Sports Center honors Stanford's athletes. Trophies, pictures and memorabilia dating from the university's founding are on display. The Hall of Fame Room is open weekdays 10 a.m. to 4 p.m. and before home football games. Admission is free.

### **SLAC National Accelerator Laboratory**

The SLAC National Accelerator Laboratory is a U.S. Department of Energy national laboratory operated by Stanford. Members of the public who register in advance can tour the laboratory. Tours are about 1.5 hours and include a visit to the lab's 2-mile-long linear accelerator. Visit [tours.slac.stanford.edu](http://tours.slac.stanford.edu).



Jasper Ridge  
Biological Preserve

# The Founding of Stanford University

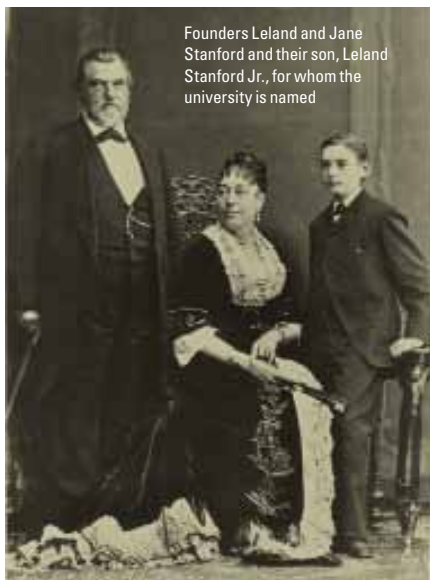
**O**N OCT. 1, 1891, STANFORD UNIVERSITY OPENED ITS DOORS AFTER SIX YEARS OF PLANNING AND BUILDING. In the early morning hours, construction workers were still preparing the Inner Quadrangle for the ceremonies. The great arch at the western end had been backed with panels of red and white cloth to form an alcove where dignitaries would sit.

The 2,000 seats set up in the three-acre Quad soon proved insufficient for the growing crowd. By midmorning, people were streaming across fields on foot. At half past 10, the special train from San Francisco arrived on the temporary spur that had been used during construction. As a faculty member recalled, “Hope was in every heart, and the presiding spirit of freedom prompted us to dare greatly.”

Jane and Leland Stanford established the university in memory of their only child, Leland Jr., who died of typhoid fever at 15. Within weeks of his 1884 death, the Stanfords determined that, because they no longer could do anything for their own child, they would use their wealth to do something for “other people’s” children.

They settled on creating a great university, one that, from the outset, was untraditional: coeducational in a time when most private universities were all-male; nondenominational when most were associated with a religious organization; and avowedly practical, producing “cultured and useful citizens” when most were concerned only with the former.

Leland Stanford devoted to the university the fortune he had amassed, first by supplying provisions to the '49ers mining for California gold and later as one of the “Big Four,” whose Central Pacific Railroad laid tracks eastward to meet the Union Pacific and complete the transcontinental railway.



Founders Leland and Jane Stanford and their son, Leland Stanford Jr., for whom the university is named

Included in the grant to the new university was the Stanfords' more than 8,000-acre Palo Alto Stock Farm for the breeding and training of trotting horses and thoroughbred stock, 35 miles south of the family's San Francisco residence. The campus still carries the nickname "the Farm."

Under the direction of Frederick Law Olmsted, the famed landscape architect who created New York's Central Park, and Charles Allerton Coolidge, a 28-year-old who designed the buildings, the farm's open fields became the site of arcades and quadrangles. In a 1913 letter, Stanford's first president, David Starr Jordan, wrote: "The yellow sandstone arches and cloisters, the 'red-tiled roofs against the azure sky,' make a picture that can never be forgotten, itself an integral part of a Stanford education."

On the university's opening day, Jordan said to Stanford's Pioneer Class: "It is for us as teachers and students in the university's first year to lay the foundations of a school which may last as long as human civilization. ... It is hallowed by no traditions; it is hampered by none. Its finger posts all point forward."

### University Motto

"Die Luft der Freiheit weht" is Stanford's unofficial motto and translates as "the wind of freedom blows." The phrase is a quote from Ulrich von Hutten, a 16th-century humanist. Stanford's first president, David Starr Jordan, embraced the questioning, critical spirit of von Hutten's words and included them on his presidential seal. Gerhard Casper, president of Stanford from 1992 to 2000, adopted the motto as the basis of his inaugural address and encouraged its widespread use across the campus. The motto has been incorporated into the university seal, depicted above.



Opening Day, Oct. 1, 1891



# Stanford Through the Years

<b>1824</b>	March 9	Leland Stanford born
<b>1828</b>	Aug. 25	Jane Lathrop Stanford born
<b>1861</b>	Sept. 4	Leland Stanford elected governor of California
<b>1868</b>	May 14	Leland Stanford Jr. born
<b>1869</b>	May 10	Leland Stanford drives Gold Spike at Promontory, Utah, for the first transcontinental railroad
<b>1884</b>	March 13	Leland Stanford Jr. dies at age 15
<b>1885</b>	Jan. 28	Leland Stanford elected U.S. senator from California
	Nov. 11	Founding Grant of the university executed
<b>1887</b>	May 14	Cornerstone of the university laid
<b>1891</b>	March 22	David Starr Jordan accepts Leland Stanford's offer to become the university's first president
	May 14	Cornerstone of the museum laid
	Oct. 1	Opening Day of the university; 555 students registered the first year
<b>1892</b>	March 19	First Big Game with Cal
	June 27	Hopkins Marine Station established on Monterey Bay
<b>1893</b>	June 21	Leland Stanford dies
<b>1894</b>	May 30	First Ph.D. awarded
<b>1895</b>	May 29	Pioneer Class graduates, including Herbert Hoover
<b>1896</b>	April 4	First women's intercollegiate basketball game
<b>1899</b>	May 31	Amendment to Founding Grant limits number of women students to 500
<b>1903</b>	Jan. 25	Memorial Church dedicated
<b>1905</b>	Feb. 28	Jane Lathrop Stanford dies
<b>1906</b>	April 18	Great San Francisco Earthquake causes extensive damage



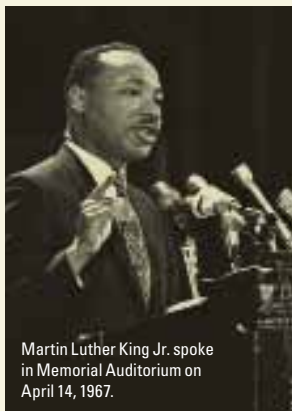
Stanford's first president, David Starr Jordan

Members of the 1892 Stanford Football team, who pulled off a surprising 14–10 win over Cal in the first Big Game



- |             |            |   |
|-------------|------------|---|
| <b>1908</b> | Oct. 30    | Cooper Medical College transferred to Stanford  |
|             | Dec. 18    | School of Law organized   |
| <b>1913</b> | May 23     | School of Medicine organized  |
|             | Aug. 1     | John Casper Branner takes office as second president                                    |
| <b>1916</b> | Jan. 1     | Ray Lyman Wilbur takes office as third president  |
| <b>1917</b> | April 27   | School of Education organized   |
|             | Dec. 6     | Thomas Welton Stanford Art Gallery completed  |
| <b>1919</b> | June 20    | Hoover War Collection (now Hoover Institution on War, Revolution and Peace) established |
|             | July 14    | Main Library opens  |
| <b>1921</b> | May 23     | Honor Code adopted  |
| <b>1925</b> | May 15     | School of Engineering organized   |
|             | Sept. 30   | Graduate Business School opens  |
| <b>1930</b> | Jan. 1     | First round of golf at the Stanford Golf Course   |
| <b>1933</b> | May 11     | Board of Trustees resolution allows for enrollment of more than 500 women students      |
| <b>1937</b> |            | Frank Lloyd Wright's Hanna House constructed  |
| <b>1941</b> | June 16–20 | University's 50th anniversary celebrated and Hoover Tower dedicated                     |
| <b>1943</b> | Sept. 1    | Donald B. Tresidder takes office as fourth president                                    |
| <b>1946</b> |            | Creative Writing Program founded by Wallace Stegner                                     |
| <b>1947</b> | Jan. 6     | First broadcast of campus radio station KSU (later KZSU)                                |
|             |            | School of Mineral Sciences (now Earth Sciences) organized                               |

<b>1948</b>	Sept. 1	Schools of Biological Sciences, Humanities, Physical Sciences and Social Sciences merged into School of Humanities and Sciences
<b>1949</b>	April 1	Wallace Sterling takes office as fifth president
<b>1951</b>	Oct. 1	First research park lease signed with Varian Associates
<b>1952</b>	April 1	Biology Professor Douglas Whitaker becomes first provost
	Nov. 6	Physics Professor Felix Bloch becomes Stanford's first Nobel laureate
<b>1958</b>	June 24	First overseas campus opened near Stuttgart, Germany
<b>1959</b>	August	Planning begins for the radio telescope called "the Dish"
	Sept. 17	School of Medicine building dedicated
<b>1967</b>	Sept. 9	Stanford Linear Accelerator Center dedicated; now called SLAC National Accelerator Laboratory
<b>1968</b>	Sept. 12	Inaugural session, Senate of the Academic Council
	Dec. 1	Kenneth Pitzer takes office as sixth president
<b>1970</b>	Sept. 24	Richard Lyman takes office as seventh president
<b>1973</b>	Jan. 9	University trustees designate Jasper Ridge Biological Preserve
<b>1974</b>	Feb. 11	B. Gerald Cantor donates his collection of Rodin sculptures
<b>1980</b>	Aug. 1	Donald Kennedy takes office as eighth president
<b>1989</b>	Oct. 17	Loma Prieta earthquake causes extensive damage
<b>1992</b>	Sept. 1	Gerhard Casper takes office as ninth president
<b>1996</b>	May	Stanford Graduate Fellowships program announced
<b>1997</b>	Sept. 25	Stanford Introductory Seminars launched
<b>1998</b>	September	Stanford Alumni Association integrated into the university Science and Engineering Quadrangle opens
<b>1999</b>	January	The Leland Stanford Jr. Museum reopens as part of the Iris & B. Gerald Cantor Center for Visual Arts



Martin Luther King Jr. spoke in Memorial Auditorium on April 14, 1967.

<b>2000</b>	<b>May 2</b>	The foothills surrounding “the Dish” become a habitat conservation area
	<b>Oct. 20</b>	John Hennessy is inaugurated as Stanford’s 10th president
<b>2001</b>	<b>May 2</b>	The Hewlett Foundation’s \$400 million gift is the largest in university history
<b>2005</b>	<b>Dec. 31</b>	Campaign for Undergraduate Education raises more than \$1 billion
<b>2006</b>	<b>Oct. 10</b>	\$4.3 billion Stanford Challenge fundraising campaign announced
<b>2008</b>	<b>March 4</b>	Jerry Yang and Akiko Yamazaki Environment and Energy Building dedicated
<b>2010</b>		New buildings include the John A. and Cynthia Fry Gunn Building, Hasso Plattner Institute of Design, Center for Nanoscale Science and Engineering, Li Ka Shing Center for Learning and Knowledge, Jen-Hsun Huang Engineering Center and Lorry I. Lokey Stem Cell Research Building
<b>2011</b>		Stanford earns its 100th NCAA national team title

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### Presidents of Stanford University

<b>1891–1913</b>	David Starr Jordan	<b>1970–1980</b>	Richard W. Lyman
<b>1913–1915</b>	John Casper Branner	<b>1980–1992</b>	Donald Kennedy
<b>1916–1943</b>	Ray Lyman Wilbur	<b>1992–2000</b>	Gerhard Casper
<b>1943–1948</b>	Donald B. Tresidder	<b>2000–</b>	John L. Hennessy
<b>1949–1968</b>	J. E. Wallace Sterling		
<b>1968–1970</b>	Kenneth S. Pitzer		

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### Provosts of Stanford University

<b>1952–1955</b>	Douglas M. Whitaker	<b>1980–1984</b>	Albert M. Hastorf
<b>1955–1965</b>	Frederick E. Terman	<b>1984–1992</b>	James N. Rosse
<b>1967–1970</b>	Richard W. Lyman	<b>1992–1993</b>	Gerald Lieberman
<b>1971–1978</b>	William F. Miller	<b>1993–1999</b>	Condoleezza Rice
<b>1979</b>	Gerald Lieberman	<b>1999–2000</b>	John L. Hennessy
<b>1979–1980</b>	Donald Kennedy	<b>2000–</b>	John W. Etchemendy

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## Growth of Faculty and Student Body

	UNDERGRADUATES	GRADUATE STUDENTS	ACADEMIC COUNCIL*
<b>1900</b>	1,055	114	75
<b>1910</b>	1,498	157	112
<b>1920</b>	2,165	283	150
<b>1930</b>	3,103	1,530	271
<b>1940</b>	3,460	1,782	309
<b>1950</b>	4,805	2,907	372
<b>1960</b>	5,648	4,208	619
<b>1970</b>	6,221	5,217	1,029
<b>1980</b>	6,630	6,236	1,230
<b>1990</b>	6,555	6,886	1,340
<b>2000</b>	6,548	7,700	1,368
<b>2001</b>	6,637	7,536	1,384
<b>2002</b>	6,731	7,608	1,377
<b>2003</b>	6,654	7,800	1,396
<b>2004</b>	6,753	8,093	1,410
<b>2005</b>	6,705	8,176	1,398
<b>2006</b>	6,689	8,201	1,418
<b>2007</b>	6,759	8,186	1,428
<b>2008</b>	6,812	8,328	1,459
<b>2009</b>	6,878	8,441	1,475
<b>2010</b>	6,887	8,779	1,468
<b>2011</b>	6,927	8,796	1,492

\* Includes tenure-line faculty, non-tenure-line faculty and senior fellows at specified policy centers and institutes. Academic staff—teaching, center fellows and Medical Center-line faculty are not members of the Academic Council.

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## Tuition Rates

<b>1920–21</b>	\$ 120	<b>2002–2003</b>	27,204
<b>1930–31</b>	300	<b>2003–2004</b>	28,563
<b>1940–41</b>	345	<b>2004–2005</b>	29,847
<b>1950–51</b>	660	<b>2005–2006</b>	31,200
<b>1960–61</b>	1,005	<b>2006–2007</b>	32,994
<b>1970–71</b>	2,400	<b>2007–2008</b>	34,800
<b>1980–81</b>	6,285	<b>2008–2009</b>	36,030
<b>1990–91</b>	14,280	<b>2009–2010</b>	37,380
<b>2000–2001</b>	24,441	<b>2010–2011</b>	38,700
<b>2001–2002</b>	25,917	<b>2011–2012</b>	40,050

# The Stanford Undergraduate Program and Admission

## Undergraduate Admission and Financial Aid

**S**TUDENTS WHO DERIVE PLEASURE FROM LEARNING FOR ITS OWN SAKE THRIVE AT STANFORD. We look for distinctive students who exhibit energy, curiosity and a love of learning in their classes and lives. Academic excellence is the primary criterion for admission, and the most important credential is the transcript. Stanford recommends that prospective students take a minimum of four years of English, four years of mathematics, three years of laboratory science, three years of the same foreign language and three years of history or social studies. We seek outstanding students who have selected a rigorous academic program and achieved distinction in a range of courses.

With many more highly qualified applicants than places available, we also take into consideration personal qualities—we want to know how students have taken advantage of available resources and their promise for contributing to the campus community and the world beyond Stanford. To this end, the admission committee carefully and thoroughly reads and evaluates all parts of each application, paying close attention to individual strengths and exceptional abilities.

Stanford is committed to a need-blind admission policy for U.S. citizens and permanent residents—admitting qualified students without regard to their ability to pay—and to providing a comprehensive financial aid program for all admitted students who have computed need as determined by the university and who meet other requisite conditions for financial aid. In recent years, financial assistance has been provided to nearly 80 percent of undergraduate students from a variety of internal and external sources.

The application deadline for Stanford's Restrictive Early Action process is Nov. 1, and the application deadline for the Regular Decision process is Jan. 1. For more information about application policies and procedures, visit <http://admission.stanford.edu> or call the Office of Undergraduate Admission at (650) 723-2091.

## The Undergraduate Program

The objective of Stanford University, Jane and Leland Stanford wrote in their Founding Grant in 1885, is “to qualify its students for personal success, and direct usefulness in life; And its purposes, to promote the public welfare by exercising an influence in behalf of humanity and civilization, teaching the blessings of liberty regulated by law, and inculcating love and reverence

for the great principles of government as derived from the inalienable rights of man to life, liberty, and the pursuit of happiness.”

With an approximate 5.9 to 1 student-to-faculty ratio, Stanford emphasizes close interaction with faculty. Stanford offers three undergraduate degrees—Bachelor of Arts (B.A.), Bachelor of Sciences (B.S.) and Bachelor of Arts and Sciences (B.A.S.)—each designed to achieve balance between depth of knowledge acquired through specialization and breadth of knowledge gained through exploration. Undergraduates complete at least 180 units, including requirements for the major, writing and rhetoric requirements, one year of a foreign language and courses in the following areas:

**Introduction to the Humanities:** One course each quarter of the freshman year

**Disciplinary Breadth:** Five courses required, at least one in engineering and applied sciences, humanities, mathematics, natural sciences and social sciences

**Education for Citizenship:** Two courses in at least two of the following subject areas—ethical reasoning, the global community, American cultures and gender studies

Of the seven schools at Stanford, three award undergraduate degrees: Humanities and Sciences, Earth Sciences and Engineering. Students who wish to pursue in depth more than one field may double major—that is, complete the requirements for majors in two fields—or minor in a second field. Students also can pursue an individually designed major.

### **Introductory Seminars**

Stanford’s academic program prioritizes engaging students in serious critical inquiry from their first days on campus, working closely with faculty members. Among the programs designed

## **Major Fields of Undergraduate Study**

- African and African American Studies
- American Studies
- Anthropology
- Archaeology
- Art
  - Art History*
  - Film and Media Studies*
  - Studio Art*
- Biology
- Chemistry
- Chinese
- Classics
  - Ancient History*
  - Classical Studies*
  - Greek*
  - Latin*
- Communication
- Comparative Literature
- Comparative Studies in Race and Ethnicity
  - Asian American Studies*
  - Chicana/o Studies*
  - Native American Studies*
- Drama
- Earth Sciences
  - Earth Systems*
  - Energy Resources*
  - Engineering*
  - Geological & Environmental Sciences*
  - Geophysics*
- East Asian Studies
- Economics
- Engineering
  - Aeronautics and Astronautics*
  - Architectural Design*
  - Atmosphere/Energy*
  - Bioengineering*
  - Biomechanical*
  - Biomedical Computation*
  - Chemical*

Engineering (continued)

*Civil*

*Computer Science*

*Computer Systems*

*Engineering*

*Electrical*

*Engineering Physics*

*Environmental*

*Management Science*

*and Engineering*

*Materials Science*

*Mechanical*

*Product Design*

English

Feminist Studies

French

German Studies

History

Human Biology

Iberian and Latin American  
Cultures

International Relations

Italian

Japanese

Linguistics

Mathematical &  
Computational Science

Mathematics

Music

Philosophy

Physics

Political Science

Psychology

Public Policy

Religious Studies

Science, Technology and  
Society

Slavic Languages and  
Literatures

Sociology

Statistics

Symbolic Systems

Urban Studies

to provide mentoring relationships are freshman seminars and sophomore seminars and dialogues, which are taught by some of the university's most renowned faculty members. More than 2,300 students enroll in about 200 seminars annually. Other special programs include Sophomore College and Freshman-Sophomore College at Sterling Quad.

### **Undergraduate Research**

Stanford believes learning is enhanced by participation in research. The Office of Undergraduate Advising and Research offers advising, grants and programs to aid undergraduate participation in the production of new knowledge. Grants are awarded to faculty and departments to support student involvement in faculty members' research and to students themselves to support independent research projects under faculty mentorship.

The Symposia of Undergraduate Research and Public Service (SURPS) provide opportunities for undergraduates to present scholarly work to Stanford faculty, students and alumni.

In 2010–11, \$4.5 million was allocated for grant programs benefiting more than 900 projects.

### **Honors**

Collaborating with faculty, undergraduates work in laboratories, do research through Stanford's extensive library and archive collections, or travel to sites worldwide to complete independent projects. The resulting honors thesis is recognized by conferring the degree "with Honors." About 25 percent of the members of each graduating class earn departmental honors. About 100 students annually participate in Bing Honors College.

## Academic Services

Stanford offers academic services to students, including the Hume Writing Center, the Stanford Language Center, Undergraduate Advising and Research and the Center for Teaching and Learning. The Schwab Learning Center serves students with learning differences. The Career Development Center offers support for life after college.

## Bing Overseas Studies Program

Stanford offers study opportunities in Australia, Barcelona, Beijing, Berlin, Cape Town, Florence, Kyoto, Madrid, Moscow, Oxford, Paris and Santiago. Students may enroll for one or more quarters at most centers and participate in internships, research projects and public service. Seven hundred forty-nine students, or about 44 percent of the average class year, studied abroad with Stanford in 2010–11.

## Other Off-Campus Study Opportunities

The Bing Stanford in Washington Program enables undergraduates to work and study through courses and internships in a residential program in the nation's capital. The Hopkins Marine Station allows students to live in Pacific Grove while studying marine biology. Students also can take advantage of exchange programs with Dartmouth College, Howard University, Morehouse College and Spelman College.

## Profile of the Class of 2015

*(Some percentages may be rounded)*

Freshman applicants	34,348
Freshman admits	2,437
Admit rate	7.1%
Freshmen entering	1,707
<i>Male</i>	52%
<i>Female</i>	48%
High schools represented	
<i>Public</i>	57.6%
<i>Private</i>	31.9%
<i>Home school</i>	0.3%
<i>International</i>	10.2%

## GEOGRAPHIC DIVERSITY

States represented	50
Largest state representation	California (39.3%)
Countries represented	52

**ACADEMIC ACHIEVEMENT**

Top 10 percent of class*	92%
Top 20 percent of class*	97%
SAT Critical Reading 700–800	62%
SAT Math 700–800	72%
SAT Writing 700–800	70%

\* where reported

**ETHNIC DIVERSITY**

African American	10.5%
Asian	22.4%
International	8.4%
Mexican/Chicano	8.6%
Native American	3.3%
Native Hawaiian/Pacific Islander	1.5%
Other Hispanic	6.7%
White	30.7%
Declined to state/other	8.0%

**Total Undergraduate Profile 2011**

6,927 matriculated

**MAJORS BY SCHOOL***(Some percentages may be rounded)*

School of Humanities and Sciences	2,309	(33%)
School of Engineering	983	(14%)
School of Earth Sciences	106	(2%)
Undeclared	3,529	(51%)

**GEOGRAPHIC ORIGIN**

California	2,713	(39%)
Other U.S.	3,688	(53%)
Foreign (89 countries)	526	(8%)
<i>Asia</i>	289	(55%)
<i>The Americas</i>	80	(15%)
<i>Europe</i>	88	(17%)
<i>Africa</i>	37	(7%)
<i>Middle East and North Africa</i>	24	(5%)
<i>Pacific Basin</i>	6	(1%)

**SEX**

Women	3,342	(48%)
Men	3,585	(52%)

## **RACE/ETHNICITY**

African American	704	(10%)
American Indian or Alaska Native	179	(3%)
Asian American or Pacific Islander	1,486	(21%)
White	2,605	(38%)
International	526	(8%)
Mexican American	529	(8%)
Other Hispanic	427	(6%)
Unidentified	564	(7%)

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## **Other Undergraduate Education Facts**

Undergraduate degrees awarded in 2011: 1,670

## **GRADUATION RATES**

(percentage of students receiving undergraduate degrees within five years of initial enrollment at Stanford)

<b>1997</b>	90.0	<b>2002</b>	92.1
<b>1998</b>	92.5	<b>2003</b>	92.1
<b>1999</b>	90.1	<b>2004</b>	92.2
<b>2000</b>	92.5	<b>2005</b>	92.0
<b>2001</b>	92.3	<b>2006</b>	92.0

## **COURSES ENROLLING UNDERGRADUATES FALL 2011**

<b>Class size</b>	<b>Number of courses</b>	<b>Percentage of courses</b>
2-9	572	36
10-19	509	32
20-29	147	9
30-39	89	6
40-49	62	4
50-99	111	7
100+	78	5
<b>Total</b>	<b>1,568</b>	

## **MAJORS GRANTING HIGHEST NUMBER OF UNDERGRADUATE DEGREES IN 2010-11**

1. Biology or Human Biology
2. Economics
3. International Relations
4. Engineering
5. Computer Science

### **FINANCIAL AID 2010–11**

Total students receiving assistance		5,442
Total students enrolled (4 qtrs.)		6,889
Percent of students receiving any form of financial assistance from internal or external sources:		79%
Percent of students receiving need-based scholarship from Stanford		49%
Percent of students receiving Pell Grants		17%
Scholarship Aid	\$ 158,475,492	(92.5%)
Long-Term Loans	6,957,175	(4.1%)
Term-Time Jobs	5,853,188	(3.4%)
<b>Total</b>	<b>\$ 171,285,855</b>	<b>100%</b>

### **SOURCES OF SCHOLARSHIP AID 2010–11**

Stanford General Funds	\$ 35,314,813
Current Gifts–Nonathletic	16,804,937
Endowment Income–Nonathletic	66,546,894
Trademark Income	274,894
Athletic Awards	17,381,074
Department Awards	676,031
Federal Pell Grants	5,115,908
Federal Supplemental Grants	1,113,698
Other Federal Grants	1,351,441
State Grants	3,810,608
Other External Awards	10,085,194
<b>Total</b>	<b>\$ 158,475,492</b>

### **STUDENT BUDGET 2011–12**

Tuition	\$ 40,050
Required Fees*	519
Room and Board	12,291
Books (estimated)	1,500
Personal (estimated)	2,400
<b>Total</b>	<b>\$ 56,760</b>

The average per student cumulative undergraduate indebtedness for students receiving financial aid and earning undergraduate degrees between July 1, 2010, and June 30, 2011: \$ 16,558

Percent of graduates with debt 28%

### **STANFORD STUDENT AWARDS**

Rhodes Scholars	107	
Marshall Award winners	86	* Vaden Health Center fee charged to students living on campus
Truman Scholars	60	

# Graduate Studies at Stanford

IN STANFORD'S FIRST YEAR, 1891, 39 MEN AND 12 WOMEN FROM 19 STATES REGISTERED IN GRADUATE STANDING, representing one of the first opportunities for graduate study on the West Coast. Today, 8,796 students in 91 departments and programs are pursuing post-baccalaureate degrees in all seven of Stanford's schools: Business, Earth Sciences, Education, Engineering, Humanities and Sciences, Law and Medicine. Exchange programs with the University of California-Berkeley and the University of California-San Francisco enable graduate students to take courses not offered at Stanford.

About 85 percent of Stanford graduate students receive financial assistance, aside from loans, from Stanford or external sources. About 56 percent of graduate students live on campus.

## Graduate Admissions

Admissions decisions are made by each department and program. Programs also set application deadlines. Graduate Admissions in the Office of the Registrar provides application information and materials for nearly all graduate degree programs. Visit <http://gradadmissions.stanford.edu> or call (650) 723-4291.

- Visit Graduate School of Business admissions at <http://www.gsb.stanford.edu/admissions/apply/>
- Visit the School of Law admissions at <http://www.law.stanford.edu/program/degrees/>
- Visit the School of Medicine's M.D. program admissions at <http://med.stanford.edu/admissions/>

The Knight Management Center is home to the Stanford Graduate School of Business



## Graduate Fellowships

Fellowships are a form of funding for graduate studies that provide tuition and a stipend to support a student's educational expenses. The availability of fellowships varies among departments, schools and programs. Academic merit and availability of funds are the primary considerations in the awarding of such financial support.

Three university-wide endowed fellowship programs for doctoral students are Stanford Graduate Fellowships in Science and Engineering (SGF), Stanford Interdisciplinary Graduate Fellowships (SIGF) and Lieberman Fellowships. SGF and SIGF award three-year fellowships, providing recipients financial support that is independent of any research project or faculty grant. Lieberman Fellowships are awarded in memory of former provost Gerald Lieberman. SGF and Lieberman Fellowships are awarded by department or school nomination; current graduate students apply for SIGF awards. These three programs are currently supporting 548 recipients from 46 fields across the seven schools. In 2011–12 the annual stipend is \$34,200.

## Multidisciplinary Study

Stanford facilitates multidisciplinary teaching and research. Many students receive more than one graduate degree, through a joint degree program or by applying to add a second degree program. Graduate students are encouraged to enroll in classes across the university, outside of their home discipline.

Stanford Graduate Summer Institute (SGSI) offers interdisciplinary courses for graduate students. Most SGSI courses are small, intensive non-credit seminars usually taught after summer quarter.

## Graduate Student Profile 2011–12

8,796 matriculated

### SCHOOLS

*(Some percentages may be rounded)*

Graduate School of Business	940	(11%)
School of Earth Sciences	338	(4%)
School of Education	355	(4%)
School of Engineering	3,452	(39%)
School of Humanities and Sciences	2,159	(24%)
School of Law	631	(7%)
School of Medicine	921	(11%)



The Munger Graduate Residence

**GEOGRAPHIC ORIGIN**

California	2,936	(33%)
Other U.S.	2,967	(34%)
Foreign (108 countries)	2,893	(33%)
Asia	1,705	(59%)
Europe	490	(17%)
The Americas	394	(14%)
Middle East and North Africa	201	(7%)
Pacific Basin	46	(2%)
Africa	40	(2%)

**SEX**

Women	3,222	(37%)
Men	5,574	(63%)

**RACE/ETHNICITY**

African American	279	(3%)
American Indian or Alaska Native	68	(1%)
Asian American or Pacific Islander	1,182	(13%)
Hispanic/Latino	475	(5%)
White	3,163	(36%)
International	2,893	(33%)
Declined to state	61	(1%)
Unknown	675	(8%)

**DEGREES AWARDED (2010–11)**

Master's	2,146
Professional (JD, MD)	291
Doctoral (PhD, DMA)	762

# Stanford's Schools, Departments and Programs

Stanford offers the following degrees: B.A., B.S., B.A.S., M.A., M.S., Ph.D., D.M.A., M.D., M.B.A., J.D., J.S.D., J.S.M., LL.M., M.F.A., M.L.S., M.L.A., M.P.P., ENG

## Graduate School of Business

Dean: Garth Saloner

The mission of the Stanford Graduate School of Business is to create ideas that deepen and advance the understanding of management and to develop innovative, principled and insightful leaders who change the world. The MBA program enrolls about 800 students each year and provides foundational knowledge in topics such as finance and organizational behavior, as well as managerial perspectives to help students understand the context of business. Students develop critical analytical thinking skills, expand leadership abilities and develop innovative thinking. The school also enrolls about 67 students with professional experience in the one-year Stanford Sloan Management Program, leading to an MS degree. There are more than 50 certificate programs for executives. Each year, there are about 100 doctoral students in residence. Faculty members include three Nobel Prize winners. The GSB is located in the environmentally sustainable Knight Management Center, eight buildings around three quads designed to support innovation and collaboration. The new Stanford Institute for Innovation in Developing Economies was launched in 2011 to help alleviate global poverty. Visit <http://www.gsb.stanford.edu> or call (650) 723-2146.

## School of Earth Sciences

Dean: Pamela Matson

The School of Earth Sciences is home to departments and programs that focus on the study of the planet Earth. Distinguished faculty teach and conduct research in areas including geology, the environment, energy, natural hazards, continental dynamics, oceans and climate, biogeochemical cycles, Earth surface processes and fresh water. Faculty and students examine the Earth's solid and fluid components from atomic size to global, and from the age

### DEPARTMENTS

Energy Resources Engineering  
Environmental Earth System Science  
Geological and Environmental Sciences  
Geophysics

### INTERDISCIPLINARY PROGRAMS

Earth Systems Program  
Emmett Interdisciplinary Graduate  
Program in Environment and Resources

of the Earth to the near-term past and immediate future. They address the development and use of resources, the consequences of human activities on the environment and our understanding of global systems. The school has 55 faculty, 150 undergraduates and 350 graduate students. It offers Bachelor of Science, Master of Science, Engineer, and Doctor of Philosophy degrees. Visit <http://earthsci.stanford.edu> or call (650) 723-2544.

## School of Education

Dean: Claude Steele

The Stanford University School of Education, with an enrollment of about 400 graduate students, is a leader in groundbreaking, cross-disciplinary research and analysis that help shape educational practice and policy. Faculty integrate practice and research by working collaboratively with administrators, teachers and policy leaders around the world, and they contribute to theoretical and methodological innovations in the social sciences. The school develops the knowledge, wisdom and imagination of its students to enable them to take leadership positions as teachers, researchers, administrators and policymakers. School of Education students benefit from an exposure to real-world challenges and involvement in problem-solving collaborations with practitioners and policymakers. The School of Education runs East Palo Alto Academy, its own public charter school in the neighboring East Palo Alto community. The school also has sustained collaborations with organizations serving youth in several Bay Area communities and ongoing partnerships with district and school leaders. The School of Education offers the Doctor of Philosophy, Master of Arts and Master of Arts with teaching credential. Call (650) 723-2109 or visit <http://ed.stanford.edu/>.

### MASTER'S PROGRAMS

Stanford Teacher Education Program  
Policy, Organization and Leadership Studies  
International Comparative Education  
International Educational Administration and Policy Analysis  
Learning, Design and Technology Curriculum and Teacher Education  
Joint MA in Education/MBA  
Joint MA/JD in Law and Education  
Individually designed MA in Education

### DOCTORAL AREAS OF STUDY

Social Sciences, Humanities and Interdisciplinary Policy Studies in Education  
Developmental and Psychological Sciences  
Curriculum Studies and Teacher Education  
Cross-Area Specialization: Learning Sciences and Technology Design

### OTHER ACADEMIC OPPORTUNITIES

Concentration in Education and Jewish Studies  
Quantitative Methods Certificate Program  
Stanford Interdisciplinary Doctoral Training Program in Quantitative Education Policy Analysis

## School of Engineering

Dean: James Plummer

More than 4,400 students are enrolled in the School of Engineering. The school has nine departments, more than 240 faculty members and some 89 laboratories, centers, institutes and affiliates programs. Entrepreneurship education is offered through the Stanford Technology Ventures Program. Most departments offer degree programs at all levels of study. Undergraduates are admitted to the university, not the school, and may choose engineering as a major by their junior year. Graduate students are evaluated and admitted by each department; closing dates for filing applications vary by department. Coterminal students are admitted early to a graduate program and can study for both bachelor's and master's degrees simultaneously. Call (650) 723-3938 or visit <http://soe.stanford.edu>.

### DEPARTMENTS AND DEGREE PROGRAMS

Aeronautics and Astronautics  
Bioengineering  
Chemical Engineering  
Civil and Environmental Engineering  
Computer Science  
Electrical Engineering  
Management Science and Engineering  
Materials Science and Engineering  
Mechanical Engineering  
Architectural Design Program  
Institute for Computational and Mathematical Engineering  
Joint Program in Product Design  
Energy Resources Engineering  
Science, Technology and Society

## School of Humanities and Sciences

Dean: Richard Saller

The School of Humanities and Sciences is Stanford's largest school, awarding nearly 80 percent of undergraduate degrees. The school has more than 50 departments and interdisciplinary degree programs that span the humanities, arts, languages and literatures, social sciences, mathematics and the physical and life sciences. The school's graduate programs lead to Doctor of Philosophy, Doctor of Musical Arts, Master of Arts, Master of

### DEPARTMENTS

Anthropology  
Applied Physics  
Art and Art History

Biology

Chemistry

Classics

Communication

Division of Literatures,  
Cultures and Languages

*Comparative Literature*  
*French and Italian*

*German Studies*

*Slavic Languages  
and Literatures*

*Iberian and Latin  
American Cultures*

Drama

East Asian Languages and  
Cultures

Economics

English

History

Linguistics

Mathematics

Music

Philosophy

Physics

Political Science

Psychology

Religious Studies

Sociology

Statistics

#### INTERDISCIPLINARY DEGREE PROGRAMS

African and African American Studies	Feminist Studies	<i>Russian, East European and Eurasian Studies</i>
American Studies	Financial Mathematics	Mathematical and Computational Science
Archaeology	Human Biology	Modern Thought and Literature
Biophysics	International Comparative and Area Studies	Public Policy
Comparative Studies in Race and Ethnicity	<i>African Studies</i>	Science, Technology and Society
<i>Asian American Studies</i>	<i>East Asian Studies</i>	Symbolic Systems
<i>Chicana/o Studies</i>	<i>Ford Dorsey International Policy Studies</i>	Urban Studies
<i>Comparative Studies</i>	<i>International Relations</i>	
<i>Native American Studies</i>	<i>Latin American Studies</i>	

Science, Master of Public Policy or Master of Fine Arts degrees. Programs and research centers in the school include the Abbasi Islamic Studies Program, Cantor Arts Center, Clayman Institute for Gender Research, Film and Media Studies Program, Jasper Ridge Biological Preserve, Hopkins Marine Station, Institute for Research in the Social Sciences, Martin Luther King Jr. Research and Education Institute and the Moghadam Program in Iranian Studies. Visit <http://humsci.stanford.edu>.

#### Law School

Dean: Larry Kramer

Stanford Law School combines classic and innovative education to prepare students for an interconnected, global world. There are 70 faculty members, including clinical, senior lecturers and emeriti, and 180 new J.D. students annually. The student-to-faculty ratio is 7.5 to 1. The school offers 21 joint degree programs in such areas as Bioengineering, Business, Computer Science, Economics, Education, Electrical Engineering, Environment and Resources, Health Research and Policy, History, International, Comparative and Area Studies, International Policy Studies, Management Science and Engineering, Medicine, Philosophy, Political Science, Psychology, Public Policy and Sociology as well as countless customized joint degrees. Joint degree programs are also offered with Princeton's Woodrow Wilson School of Public and International Affairs and Johns Hopkins' Nitze School of Advanced International Studies. Ten clinical programs allow students to undertake the roles and responsibilities of practicing lawyers, and more than 20 programs and centers offer opportunities for research and policy-oriented study. The Master of Laws (LL.M.), Master of Legal Studies (M.L.S.),

Master of the Science of Law (J.S.M.) and Doctor of the Science of Law (J.S.D.) degrees are offered. Call (650) 723-2465 or visit <http://law.stanford.edu>.

### **School of Medicine**

Dean: Philip Pizzo

The School of Medicine, the oldest medical school in the West, encourages intellectual diversity in students interested in developing a scholarly, investigative approach to problems in medicine and science. The school has more than 850 faculty, 1,450 postdoctoral scholars and residents, 456 M.D. students and 546 Ph.D. and M.S. candidates. Medical students gain clinical experience at Stanford Hospital and Clinics and at Lucile Packard Children's Hospital (see page 45). Ph.D. programs offer interdisciplinary research opportunities with faculty from throughout the university. Each year, faculty receive grants and contracts totaling more than \$375 million in support for research, teaching and patient care. Call (650) 723-6861 or visit <http://med.stanford.edu>.

### **Stanford Continuing Studies**

Dean: Charles Junkerman

Each quarter, Continuing Studies offers more than 90 courses, workshops and events to more than 2,500 adult members of the Stanford and surrounding communities. Courses range from liberal arts and sciences to creative writing to professional and personal development. It also offers the Master of Liberal Arts Program, a Stanford graduate degree program for adults who seek a broad, interdisciplinary course of study in the liberal arts. The program, taught by Stanford faculty, takes four to five years to complete. Call (650) 725-2650 or visit <http://continuingstudies.stanford.edu>.

**Summer Session** The Summer Session is the only academic quarter during which Stanford offers open enrollment for university classes. Joining current Stanford undergraduate and graduate students in the Summer Session are exceptional high school juniors and seniors and visiting college and university students from around the world. About 2,000 students enroll in Summer Session. Call (650) 723-3109.

#### **DEPARTMENTAL DEGREE PROGRAMS**

Biochemistry  
Developmental Biology  
Genetics  
Microbiology and Immunology  
Molecular and Cellular Physiology  
Chemical and Systems Biology  
Structural Biology

#### **INTERDISCIPLINARY DEGREE PROGRAMS**

Bioengineering  
Biomedical Informatics  
Biophysics  
Cancer Biology  
Epidemiology  
Health Services Research  
Immunology  
Neurosciences

# The Stanford Faculty

**D**AVID STARR JORDAN WAS APPOINTED PRESIDENT IN MARCH 1891, and by June his first faculty—15 men of “youth and scholarly promise”—had accepted appointments. Jordan sought professors who combined abilities for teaching and research, and he wrote, “Mr. Stanford wants me to get the best. He wants no ornamental or idle professors.”

Today, Stanford has 1,934 tenure-line faculty, senior fellows and center fellows at specified policy centers and institutes, and Medical Center-line faculty. Fifty-five percent of the faculty have earned tenure. Faculty at Stanford are expected to be among the best teachers and researchers in their fields. There are 513 faculty members appointed to endowed chairs. Stanford faculty have won 27 Nobel Prizes since the university’s founding.

## Living Nobel Laureates

**Kenneth J. Arrow**, Professor Emeritus in the Department of Economics, 1972, Economics

**Gary S. Becker**, Senior Fellow at the Hoover Institution, 1992, Economics

**Paul Berg**, Professor Emeritus in the Department of Biochemistry, 1980, Chemistry

**Steven Chu**, Professor Emeritus in the Departments of Physics and Applied Physics, 1997, Physics

**Andrew Fire**, Professor in the Departments of Pathology and of Genetics, 2006, Physiology or Medicine

**Roger Kornberg**, Professor in the Department of Structural Biology, 2006, Chemistry



**Robert B. Laughlin**, Professor in the Department of Physics, 1998, Physics

**Douglass North**, Senior Fellow at the Hoover Institution, 1993, Economics

**Douglas Osheroff**, Professor Emeritus in the Department of Physics, 1996, Physics

**Martin Perl**, Professor Emeritus at the SLAC National Accelerator Laboratory, 1995, Physics

**Burton Richter**, Professor Emeritus at the SLAC National Accelerator Laboratory, 1976, Physics

**Thomas Sargent**, Senior Fellow at the Hoover Institution, 2011, Economics

**Myron S. Scholes**, Professor Emeritus at the Graduate School of Business, 1997, Economics

**William Sharpe**, Professor Emeritus at the Graduate School of Business, 1990, Economics

**A. Michael Spence**, Professor Emeritus at the Graduate School of Business, and

**Joseph E. Stiglitz**, Professor Emeritus in the Department of Economics, 2001, Economics

**Richard E. Taylor**, Professor Emeritus at the SLAC National Accelerator Laboratory, 1990, Physics

### **Stanford Pulitzer Prize Winners**

**David M. Kennedy**, 2000, History

**Jack Rakove**, 1997, History

**James Risser**, 1976, 1979, National Reporting

**Carl N. Degler**, 1972, History



Felix Bloch won Stanford's first Nobel Prize in 1952.

### **Stanford's current community of scholars includes:**

- 17 Nobel laureates
- 4 Pulitzer Prize winners
- 24 MacArthur Fellows
- 18 recipients of the National Medal of Science
- 2 National Medal of Technology recipients
- 263 members of the American Academy of Arts and Sciences
- 150 members of the National Academy of Sciences
- 94 National Academy of Engineering members
- 64 members of the Institute of Medicine
- 31 members of the National Academy of Education
- 51 American Philosophical Society members
- 7 Wolf Foundation Prize winners
- 6 winners of the Koret Foundation Prize
- 3 Presidential Medal of Freedom winners

## Faculty Profile 2011

(Some percentages may be rounded)

<b>TOTAL FACULTY</b> (Full- and part-time)	1,934*	
Members of Academic Council	1,492	
Graduate School of Business	107	(5%)
School of Earth Sciences	51	(3%)
School of Education	55	(3%)
School of Engineering	233	(12%)
School of Humanities and Sciences	540	(28%)
School of Law	54	(3%)
School of Medicine	842	(44%)
Other (SLAC, FSI, Independent Labs)	52	(3%)
<b>TENURE STATUS/APPOINTMENT LINE</b>		
Tenure Line, Tenured	1,061	(55%)
Tenure Line, Not Tenured	289	(15%)
Non-Tenure Line	136	(7%)
Medical Center Line	437	(22%)
<b>TENURE-LINE FACULTY</b>		
Professors	839	(62%)
Associate Professors	246	(18%)
Assistant Professors	265	(20%)
Faculty Appointed to Endowed Professorships	513	
Faculty Holding Highest Degree in Their Field	1,917	(99%)
<b>SEX</b>		
Women	510	(26%)
Men	1,424	(74%)
<b>RACE/ETHNICITY</b>		
African American/Black	53	(3%)
Asian	301	(15%)
Hispanic	75	(4%)
Native American	5	(<1%)
Non-Minority	1,451	(75%)
Unidentified	49	(3%)

\* Includes tenure-line faculty, senior fellows and center fellows at specified policy centers and institutes, and Medical Center-line faculty.

# Research and Innovation

**T**HE SYNTHESIS OF TEACHING AND RESEARCH IS FUNDAMENTAL TO STANFORD. All faculty do scholarly research, most often in association with graduate students or advanced undergraduates. Stanford is noted for multidisciplinary research within its schools and departments, as well as its independent laboratories, centers and institutes. Several national research centers are located at Stanford, including the Department of Plant Biology in the Carnegie Institution of Washington and the National Bureau of Economic Research.

There are more than 5,100 externally sponsored projects throughout the university, with the total budget for sponsored projects at \$1.2 billion during 2011–12, including the SLAC National Accelerator Laboratory. Of these projects, the federal government sponsors approximately 84.1 percent, including SLAC. In addition, nearly \$193 million in support comes from non-federal funding sources. There are nearly 2,000 post-doctoral scholars involved in research at the university.

Stanford's Office of Technology Licensing (OTL) brings technology created at Stanford to market. In 2010–11, Stanford received \$66.8 million in gross royalty revenue from 600 technologies. Thirty-two of the inventions generated \$100,000 or more in royalties. Six inventions generated \$1 million or more. In 2010–11, OTL concluded 101 new licenses and evaluated about 450 new invention disclosures.

## AMONG THE INVENTIONS LICENSED BY OTL:

**Digital sound synthesis:** John Chowning developed FM sound synthesis for digitally generating sounds in the late 1960s, leading to the music synthesizer.

**Disease management:** The Stanford Patient Education Research Center programs have been licensed to more than 500 organizations in 17 countries.

**DSL:** In the 1980s, John Cioffi and his students realized that traditional phone lines could be used for high-speed data transmission, resulting in patents used in asymmetric digital subscriber lines.

**Email security:** Identity-based encryption, developed by Dan Boneh and Matt Franklin, offers an efficient way to encrypt and protect email.

**Functional antibodies to treat disease:** In the 1980s, Leonard Herzenberg, Vernon Oi and Sherie Morrison invented functional antibodies, which led to the development of many valuable medical products.

**Genome sequencing:** Two tools assist in the sequencing of DNA: CHEF electrophoresis, invented in 1987 by Ron Davis, Gilbert Chu and Douglas Vollrath; and Genscan software, developed by Christopher Burge.

**Google:** The world's most popular search engine got its start at Stanford when Sergey Brin and Larry Page developed the page-rank algorithm while they were computer science graduate students.

**Optical fiber amplifier:** This invention by John Shaw and Michael J.F. Dignonnet enabled the bandwidth explosion in optical communications and telecommunications essential to the Internet.

**Personalized medicine:** The gene chip, based on spotted microarray technology developed in the 1990s by Pat Brown and Dari Shalon, allows doctors to create genetic profiles of patients and their diseases.

**Recombinant drug production:** Recombinant DNA technology, developed in 1973 by Stanley Cohen and Herbert Boyer, laid the groundwork for modern genetic engineering.

## Research Centers and Institutes

### HOOVER INSTITUTION ON WAR, REVOLUTION AND PEACE

The Hoover Institution, devoted to the study of domestic and international affairs, was founded in 1919 by Herbert Hoover, a member of Stanford's Pioneer Class of 1895 and the 31st U.S. president. It is one of the largest archives and libraries in the world on political, economic and social change.

### SLAC NATIONAL ACCELERATOR LABORATORY

The SLAC National Accelerator Laboratory, a U.S. Department of Energy national laboratory operated by Stanford, explores the structure and dynamics of matter and the properties of energy, space and time—at the smallest and largest scales, in the fastest processes and at the highest energies. In 2010, the laboratory dedicated the Linac Coherent Light Source, beginning new research in physics, structural biology, energy science and chemistry, among other fields. Since 1962, six scientists have won the Nobel Prize for research carried out at the laboratory.

### OTHER SPECIAL STANFORD RESEARCH FACILITIES

Hopkins Marine Station  
Jasper Ridge Biological Preserve

Iris & B. Gerald Cantor Center for Visual Arts  
Stanford University Libraries

## Independent Laboratories, Centers and Institutes

Independent laboratories, centers and institutes account for about 20 percent of Stanford research, involving about 300 faculty members and 800 students.

### PHYSICAL SCIENCES

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Geballe Laboratory for Advanced Materials (GLAM), conducting research jointly with SLAC

E. L. Ginzton Laboratory

W. W. Hansen Experimental Physics Laboratory (HEPL)

Kavli Institute for Particle Astrophysics and Cosmology (KIPAC), operated jointly with SLAC

PULSE Institute for Ultrafast Energy Science, operated jointly with SLAC

Stanford Institute for Materials and Energy Sciences (SIMES), operated jointly with SLAC

### ENVIRONMENTAL SCIENCES

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Precourt Institute for Energy, including the Global Climate and Energy Project (GCEP) and Precourt Energy Efficiency Center

Woods Institute for the Environment

### HUMANITIES AND SOCIAL SCIENCES

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Freeman Spogli Institute for International Studies at Stanford (FSI)

Center for the Study of Language and Information (CSLI)

Stanford Center on Longevity (SCL)

Stanford Humanities Center

Stanford Institute for Economic Policy Research (SIEPR)

Center for Advanced Study in the Behavioral Sciences

### BIOLOGICAL AND LIFE SCIENCES

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Spectrum

Bio-X, the interdisciplinary program related to bioengineering, biosciences and biomedicine

## Among the companies Stanford faculty and alumni have helped create:

Atheros Communications

Charles Schwab & Company

Cisco Systems

Cypress Semiconductor

Dolby Laboratories

eBay

E\*Trade

Electronic Arts

Gap

Google

Hewlett-Packard Company

IDEO

Intuit

Intuitive Surgical Inc.

Kiva

LinkedIn

Logitech

Mathworks

MIPS Technologies

Nanosolar Inc.

Netflix

Nike

NVIDIA

Odwalla

Orbitz

Rambus

Silicon Graphics

Sun Microsystems

SunPower Corp.

Taiwan Semiconductor

Tensilica

Tesla Motors

Varian

VMware

Whole Earth Catalog

Windham Hill Records

Yahoo!

Zillow

# Stanford Libraries

**S**TANFORD'S 19 LIBRARIES SUPPORT THE UNIVERSITY'S MISSION OF TEACHING, LEARNING AND RESEARCH by making information and knowledge accessible now and in the future. Fourteen libraries and several service units constitute the Stanford University Libraries and Academic Information Resources (SULAIR).

The libraries' collections of books, journals, scores and printed reference works comprise more than 8.5 million physical volumes, as well as 1.5 million e-books, nearly 1.5 million audiovisual materials, more than 75,000 serials, thousands of other digital resources and nearly 6 million microform holdings.

In 2010-11, Stanford librarians taught more than 900 workshops and answered more than 150,000 reference questions.

Special Collections and University Archives include about 260,000 rare or special books and 59 million pages of unpublished materials, including the manuscripts, papers and correspondence of luminaries, scholars, technologists and writers; thousands of archival photographs; corporate records and archives, with emphasis on Silicon Valley and California history; and resources in Stanford history. These primary-source and historical resources are available by prior request for use in the Field Special Collections reading room in Green Library. Undergraduates are encouraged to conduct research among these collections. More than 135 classes are held annually in Special Collections.

SULAIR's Academic Computing Services division helps students, faculty and staff use technology tools and resources for teaching, learning and research. Services include:

- Technology-rich classrooms and study spaces, public computing and printing services.
- IT/multimedia help and equipment in 80 residences and Meyer Library.
- Consulting for faculty on technology for teaching, research and digital humanities, including scholar-technicians in eight academic departments or programs.
- CourseWork, Stanford's enterprise learning management system, which supports about 1,200 courses per quarter.
- The Digital Language Lab, which partners with the Stanford Language Center to support learning in 44 languages for more than 2,500 students per quarter.



Green Library

### **Stanford University Press**

Founded in 1925, Stanford University Press publishes about 175 books per year. About two-thirds are scholarly monographs and textbooks in the humanities and the social sciences, notably history, literature, philosophy, religion, Asian studies, Middle East studies, politics, sociology, anthropology and education. The remaining third are textbooks, professional reference works and monographs in law, business, economics, security studies and public policy. Tenure monographs account for about 20 percent of the press' scholarly output, and translations account for about 12 percent. Stanford University Press titles are available on a range of digital platforms, including the Kindle, Apple's iBooks, Nook and Kobo. Ebooks are also available directly from the Stanford University Press website. Readers may purchase and download PDF editions, rent ebooks and receive special bundle discounts.

### **HighWire Press**

Established by SULAIR in 1995, Stanford's ePublishing platform, HighWire Press, works with more than 140 independent publishers, societies, associations and university presses to produce and host online versions of more than 1,600 peer-reviewed journals, books, reference works, conference proceedings and other scholarly publications. HighWire content is used by students, researchers, clinicians and others daily: More than 600 billion requests and nearly 53 terabytes of data are transferred every month from the Stanford-based servers. The HighWire Portal's searching, browsing and other tools help readers discover information from nearly 7 million full-text articles and allow them to access content on mobile devices, create customized alerts, follow toll-free links, search PubMed, connect to the Semantic Web and easily download citations.

# Computing at Stanford

**S**TANFORD HOUSES ONE OF THE MOST EXTENSIVE COMPUTING ENVIRONMENTS OF ANY UNIVERSITY. Services include email, web hosting, distributed file systems, wireless and remote Internet access, courseware and research and high-performance computing facilities.

SUNet, the Stanford University Network, includes more than 150,000 computers with assigned

Internet protocol addresses. About 60,000 are active on any given day. More than 9.5 terabytes of data flow between SUNet and the Internet each day. Stanford has 40,000 email accounts and delivers about 2 million incoming mail messages daily on systems supported by Information Technology Services.

Students are not required to own computers at Stanford, although an estimated 99 percent own at least one, with about 95 percent owning laptops. All residences on campus have a cluster of computers for use day or night.

Stanford has been a leader in computer use, research and instruction. A high-speed electronic calculator was installed on campus in 1953, and the university's first computer was installed in 1956. The first faculty member specializing in computers joined the Mathematics Department in 1957, and the Computer Science Department was founded in 1965. In 1968, researchers debuted the computer mouse and hypertext linking. In 1984, trenches were dug for SUNet and, in 1988, Stanford's network was one of the first to connect to the Internet. In 1987, Stanford established the first residential computing program in the country. In 1991, the Stanford Linear Accelerator Center created the first U.S. website. In 2005, Stanford was the first university to launch a public site on iTunes U. In 2011, the university celebrated its 40 millionth download.



The William Gates Computer Science Building was built in 1996.

# Stanford's Campus Life

## Stanford Student Housing

**S**TANFORD UNIVERSITY IS A RESIDENTIAL TEACHING AND RESEARCH UNIVERSITY. As of Autumn 2011, 6,306 undergraduates and 4,768 graduate students live on campus, allowing for a blending of academic and residential life. Undergraduate campus housing is guaranteed for four years for entering freshmen. Approximately 96 percent of all undergraduates registered and residing at the home campus live in on-campus housing.

The undergraduate housing system includes 80 diverse residential facilities, including academic-focus, language and culture, and cross-cultural houses; student-managed row-type houses; apartments; suites; and traditional residence halls. Faculty or senior staff serve as live-in resident fellows in residences that house first-year students, in academic-focus houses and in some houses for upperclass students. About 25 percent of students join one of the 17 fraternities and 13 sororities recognized on campus. Six fraternities and three sororities offer housing.

Graduate students are guaranteed housing their first year when they apply by the spring deadline. Graduate housing ranges from studios to four-bedroom apartments. About 56 percent of graduate students eligible for housing live on campus.

## Student Organizations and Student Government

About 650 organized student groups are recognized at Stanford, covering a range of interests: academic, international, political, environmental, religious, ethnic, social, community service and recreational. Student publications include *The Stanford Daily* newspaper. The Associated Students of Stanford University is the representative government for Stanford students.



The Band, performing with the Tree and the Stanford Dollies, is one of the most popular student groups at Stanford.

About 25,000 people annually attend Commencement in Stanford Stadium.



### **Lively Arts**

Stanford Lively Arts sponsors about 100 music, dance and theater performances (both free and ticketed) by world-famous artists annually, attracting about 30,000 visitors. It also offers master classes, residencies, workshops and community and student programs. Visit <http://livelyarts.stanford.edu> or call (650) 725-ARTS (2787).

### **Religious Life**

There are about 35 recognized religious organizations on the Stanford campus. In addition to a wide range of Christian groups, there are the Hillel Foundation and Chabad, the Islamic Society and Ismaili Student Association, Atheists, Humanists and Agnostics, the Baha'i Association, the Hindu Students Association, the Sikh Student Association, the Buddhist Community and the World Peace Buddhists. The Center for Inter-Religious Community, Learning and Experiences (CIRCLE) is located in Old Union. The university's support of the Office for Religious Life presumes that faith and spiritual quest are consonant with the academy's most vital pursuits of meaning and purpose. Call (650) 723-1762 or visit <http://religiouslife.stanford.edu>.

### **Public Service**

The Haas Center for Public Service provides service opportunities, including summer and postgraduate fellowships; integration of service experience with classroom learning; community-based research; public service leadership

training; community programs serving children and youth; and advising on national service options after graduation. The center supports nearly 20 staffed programs and many student organizations, and works with faculty who offer 75 service-learning courses and community-based research projects. Visit <http://haas.stanford.edu> or call (650) 723-0992.

More than 100 student organizations, special projects and school-based programs across campus provide undergraduates and graduate students with opportunities to serve. These range from law clinics, including the Community Law Clinic in East Palo Alto, to the Business School's Public Management Program, the Medical School's Office of Community Health and Athletics' Community Outreach program. Stanford's eight community centers and four ethnic theme houses offer outreach programs that provide educational services for underserved youth, language assistance and cultural events.

### **Campus Safety**

The Stanford University Department of Public Safety (SUDPS) is a multi-service agency providing law enforcement, security, safety, crime prevention and emergency services on the Stanford campus 24 hours a day. SUDPS employs sworn personnel holding the rank of deputy sheriff, sergeant, lieutenant and chief, as well as non-sworn community service and public safety officers, special events personnel and support staff. The *Stanford Safety, Security and Fire Almanac* is provided to the campus community in compliance with the Jeanne Clery Disclosure of Campus Security Policy and Crime Statistics Act. See <http://police.stanford.edu> for more information. Public Safety is located at 711 Serra Street, next to the Fire Station at the corner of Campus Drive and Serra Street. The business phone number is (650) 723-9633.

### **Getting Around**

Bicycling is one of the most popular forms of on-campus transportation, with an estimated 13,000 bikers on campus daily. In 2011, Stanford was named a "Bicycle Friendly University." Although freshmen may not bring cars to campus, the free Marguerite shuttle system provides connections to local transit, shopping and dining. Zipcar car sharing and Enterprise rentals are options. Call Parking & Transportation Services at (650) 723-9362 or visit <http://transportation.stanford.edu>.

### **Stanford Traditions**

**Big Game** The annual football game against the University of California-Berkeley Golden Bears is the Big Game. It is preceded by Gaieties, a student-produced musical follies.

**Full Moon on the Quad** Freshmen are kissed at midnight by seniors under the first full moon of Autumn Quarter.

# Cardinal Athletics

**S**TANFORD PROMOTES EXCELLENCE IN BOTH ACADEMICS AND ATHLETICS. Stanford has won the Directors' Cup, which honors the most successful program in NCAA Division I sports, the last 17 years. In 2010–11, Stanford won three national team championships, extending to 35 its consecutive record of winning at least one national championship annually. Three coaches were named national coach of the year. All 35 programs exceeded the NCAA's Academic Progress Rate. Stanford offers about 300 athletic scholarships. About 800 students participate in intercollegiate sports.

Stanford employs some 100 coaches and assistants. Ten current coaches have led their teams to one or more NCAA titles. Stanford maintains 1 million gross feet of indoor facilities and 94 acres of outdoor fields. Among

Stanford's facilities are the 50,000-seat Stanford Stadium; 6,786-yard Stanford Golf Course; the 7,329-seat Maples Pavilion; the 4,000-seat Sunken Diamond; the 14-court Taube Family Tennis Stadium; and the 2,500-seat, four-pool Avery Aquatic Complex.

The Department of Athletics offers 35 varsity sports—19 for women, 16 for men—plus 26 club sports. In addition, more than 9,000 students, faculty and staff participate each year in intramural sports. Each quarter, approximately 2,000 students enroll in 100 physical education courses, which include 30 different activities. Call (800) STANFORD.

Heisman Trophy runner-up Andrew Luck led Stanford to an 11–1 record and a Fiesta Bowl appearance, while setting new passing and scoring records.



## Women's Varsity Sports

Basketball  
Cross Country  
Fencing  
Field Hockey  
Golf  
Gymnastics  
Lacrosse  
Lightweight Rowing  
Rowing  
Sailing  
Soccer  
Softball  
Squash  
Swimming and Diving  
Synchronized Swimming  
Tennis  
Track and Field  
Volleyball  
Water Polo

## Men's Varsity Sports

Baseball  
Basketball  
Cross Country  
Fencing  
Football  
Golf  
Gymnastics  
Rowing  
Sailing  
Soccer  
Swimming and Diving  
Tennis  
Track and Field  
Volleyball  
Water Polo  
Wrestling

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## Home of Champions

Total national championships: 117

Total NCAA championships:  
102 (NCAA rank: No. 2)

Total men's NCAA championships:  
61 (No. 3)

Total women's NCAA championships:  
41 (No. 1)

Total individual NCAA  
championships: 423 (No. 1)

NCAA team championships  
since 1990: 69 (No. 1)

NCAA team championships  
since 1980: 92 (No. 1)

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## Olympic Medals 1976–2008

	GOLD	SILVER	BRONZE
<b>2008</b>	8	13	4
<b>2004</b>	3	7	7
<b>2000</b>	4	3	3
<b>1996</b>	16	1	1
<b>1992</b>	10	4	5
<b>1988</b>	8	6	3
<b>1984</b>	5	8	1
<b>1976</b>	5	2	0

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## The Cardinal

Cardinal has been the color of Stanford athletic teams since 1892. In 1930, Stanford adopted the Indian symbol and nickname for its teams. In 1972, the Indian mascot was dropped at the request of Native American students. Stanford teams are called the Cardinal in reference to the school color.

# The Stanford Lands

## The Founding Grant

**I**N 1876, LELAND STANFORD PURCHASED 650 ACRES OF WHAT HAD BEEN EL RANCHO SAN FRANCISQUITO for a country home and began the development of his famous Palo Alto Stock Farm for trotting horses. In 1885, a year and a half after the death of their only child, Jane and Leland Stanford executed a deed of trust conveying the farm, along with several other parcels of land, to the trustees for the founding of the Leland Stanford Junior University. The size and varied topography of the 8,180 acres of foothills and plains they left to Stanford in the center of the San Francisco Peninsula provide a rare opportunity for comprehensive land use and resource management. About 60 percent of Stanford's land today remains open.

## The Campus Plan

Jane and Leland Stanford traveled widely before founding Stanford and wanted the Main Quadrangle and the Palm Drive main entrance to reflect European Beaux Arts formalism. They engaged Frederick Law Olmsted, the foremost landscape architect of the time. The Stanfords' contentious collaboration with Olmsted and the architectural firm of Shepley, Rutan and Coolidge resulted in California Mission-inspired buildings of local sandstone with red-tiled roofs, surrounding a cloistered quadrangle with Memorial Church as its focus. The rectangular plan of the Main Quadrangle was designed to provide for expansion through a series of quadrangles developed laterally. The 1906 San Francisco earthquake, the Great Depression and World War II intervened. The university's campus planning today, however, has returned to the original concept of quadrangles and connecting malls in its design.

## Today's Campus

With more than 49 miles of roads, a 49-megawatt power plant, three separate water systems, three dams and lakes, 88 miles of water mains, a central heating and cooling plant, a high-voltage distribution system and a post office, the university is a self-sustaining community. Stanford also provides or contracts for its own fire, police and other services.

There are more than 690 major buildings at Stanford that incorporate over 14.7 million square feet. Ninety-five percent of undergraduates live on campus, as do about 56 percent of graduate students and 30 percent of faculty members. There are 850 owner-occupied housing units for faculty on campus, as well as 628 rental units for faculty and staff. Stanford is one of the most energy-efficient institutions among California research universities.

There are more than 43,000 trees on the Stanford campus, with the native California Coast Live Oak the most common. Many of Stanford's picturesque trees have survived a century or more of drought, flood and change. There are more than 800 species of plants on campus. The inner campus includes about 1 million square feet of shrubs, 580,000 square feet of groundcovers, 1.2 million square feet of green areas and 2,700 automatic irrigation valves. There are 25 fountains.

### **Stanford Research Park**

Stanford Research Park was created in 1951 in response to the demand for industrial land near university resources and an emerging electronics industry tied closely to the School of Engineering. Today, the park is home to more than 150 companies with about 23,000 employees in electronics, software, biotechnology and other high-tech fields. Research and development and supporting service companies occupy some 10 million square feet in more than 160 buildings spread over 700 acres.

### **Stanford Shopping Center**

In 1955, Stanford Shopping Center opened at the northern end of the campus in keeping with the Stanfords' goal of using their land to provide support for the university. The 70-acre development, anchored by five major department stores and 140 retail stores, is one of the nation's leading super-regional centers in revenue and sales per square foot. In 2003, the center was ground-leased to, and is now managed by, Simon Property Group Inc. The property provides rental revenue that supports the university's endowment.

### **Stanford and Its Neighbors**

Stanford's contiguous 8,180 total acres are in six governmental jurisdictions:

- 5,178 acres in Santa Clara County  
*4,017 acres in unincorporated Santa Clara County and 1,161 acres in Palo Alto*
- 3,002 acres in San Mateo County  
*2,701 acres in unincorporated San Mateo County, 114 acres in Woodside, 111 acres in Menlo Park and 76 acres in Portola Valley*

Stanford and its surrounding communities are interconnected. The university considers its relationship with those communities to be vital in jointly addressing such crucial issues as growth, transportation and economic development. Stanford has been a major contributor to the economic vitality of the region. In 2006, the combination of local spending by employees, visitors and students, sales and property tax payments, utility and other direct purchases contributed nearly \$2 billion to San Mateo and Santa Clara counties.

The academic campus is governed by a Community Plan and General

Use Permit, issued by Santa Clara County in 2000, that allows Stanford to add 2 million additional square feet of academic facilities and up to 3,000 new housing units on campus while preserving more than 2,000 acres of the campus foothills in Santa Clara County for 25 years.

### **Sustainable Stanford**

Stanford was again named one of the top universities for sustainability by the Sustainable Endowments Institute in 2011. The Sustainable Stanford program (<http://sustainable.stanford.edu>) continues to improve sustainable practices:

- In 2009, Stanford announced a Climate and Energy Plan that exceeds California's AB 32 Global Warming Solutions Act.
- Since 2002, energy retrofits of older buildings have resulted in an estimated savings of 176 million kilowatt hours of electricity—about eight months of the university's current use.
- A 22 percent reduction in domestic water use has been achieved since 2000, despite the addition of more than 1 million gross square feet.
- The recycling program diverts 64 percent of waste from landfills.
- About 55 percent of Stanford food is sustainably sourced from 200 local farms and 21 local manufacturers.
- Designated a Platinum-Level "Bicycle Friendly Community," Stanford boasts 13,000 bikes on campus daily and 12 miles of bike lanes.
- Employee drive-alone rate has been reduced from 72 percent in 2002 to 46 percent in 2011—compared to the national rate of 77 percent—and transit ridership is up from 8 to 28 percent.
- In 2011, six new electric vehicle charging stations were installed.

The transportation program includes the free 43-bus, 15-route Marguerite system running on biodiesel with two diesel-electric hybrid buses; the 8,000-member Commute Club; free transit on Caltrain, VTA, Dumbarton Express and AC Transit's Line U; Zipcar car sharing; commute planning; charter services; and a bike program.

Ridership on Marguerite buses climbed to 1,447,616 in 2010. In 2011, 54 percent of employees commuted via alternative transportation, compared with 24 percent in Santa Clara County.

The Marguerite buses at Stanford are free



# The Stanford Medical Center

**T**HE STANFORD MEDICAL CENTER INCLUDES the Stanford School of Medicine, Stanford Hospital and Clinics and the Lucile Packard Children's Hospital. The Medical Center is known for breakthrough technologies and treatments, including the first synthesis of biologically active DNA in a test tube, the first construction of a recombinant DNA molecule containing DNA from two different species, discovery of immune response genes and development of the microarray technology that allows researchers to see at once which genes of the thousands present in a cell are switched "on."

## **Stanford Hospital and Clinics**

Stanford Hospital and Clinics (SHC) is known worldwide for advanced treatment of complex disorders in areas such as cardiac care, cancer treatment, neurosciences, surgery and organ transplants. Consistently ranked among the nation's top hospitals, SHC is internationally recognized for translating medical breakthroughs into patient care.

In 2011, SHC had 465 beds and 49 operating rooms. It had a medical staff of 1,907, a house staff of 1,044 residents and interns, and a nursing staff of 1,937 RNs, 17 LVNs and 154 nursing assistants. There were 25,360 inpatient admissions and 51,211 emergency patient visits. Volunteers committed about 83,000 hours of service. Visit <http://stanfordhospital.org>.

The Stanford Health Library is a free service used by about 30,000 people online monthly and by about 14,000 people annually at five locations. Visit <http://healthlibrary.stanford.edu>.

## **Lucile Packard Children's Hospital**

Celebrating its 20th anniversary in 2011, Lucile Packard Children's Hospital is ranked as one of the nation's best pediatric hospitals by *U.S. News & World Report* and is the only San Francisco Bay Area children's hospital with programs ranked in the U.S. News Top Ten. The 311-bed hospital is devoted to the care of children and expectant mothers and provides pediatric and obstetric medical and surgical services in association with the Stanford School of Medicine. Packard offers patients a full range of health care programs and services, from preventive and routine care to the diagnosis and treatment of serious illness and injury.

Its relationship with the School of Medicine and Silicon Valley provides Packard with the ability to use leading technology to improve patient care,

from the development of new vaccines and devices for cardiac intervention to breakthroughs in gene therapy.

In 2011, Packard Children's had a medical staff of 817 and 2,752 employees. Additionally, during the past year, the hospital had 81,830 patient days, 12,898 patient discharges and 4,574 births. There are 752 volunteers and 1,160 auxiliary members. Packard Children's also has outreach, clinical services and satellite facilities, including the Mobile Adolescent Health Services Program, which provides exams and free medications for homeless and uninsured youths. Visit <http://www.lpch.org>.

### **Stanford University School of Medicine**

The Stanford School of Medicine is a research-intensive medical school that improves health through leadership, collaborative discoveries and innovation in patient care, education and research (see page 27). Among the programs engaged in the transfer of ideas between laboratories and patient-care settings are:

Beckman Center for Molecular and Genetic Medicine

Department of Bioengineering

General Clinical Research Center

Howard Hughes Unit in Molecular and Genetic Medicine

Lucas Center for Magnetic Resonance Spectroscopy and Imaging

Program in Molecular and Genetic Medicine

Stanford Cancer Institute

Stanford Cardiovascular Institute

Stanford Institute for Immunity, Transplantation and Infection

Stanford Institute for Stem Cell Biology and Regenerative Medicine

Stanford Institute for Neuro Innovation and Translational Neuroscience

Stanford Program for Bioengineering, Biomedicine and Biosciences



The new Li Ka Shing Center for Learning and Knowledge at the Stanford School of Medicine

# Stanford Finances

**I**N 2011–12, STANFORD IS A \$4.1 BILLION ENTERPRISE. This figure represents the university's consolidated budget for operations, a compilation of all annual operating and restricted budgets that support teaching, scholarship and research, including the budgets of all schools and administrative areas and the SLAC National Accelerator Laboratory. It does not include the \$456 million capital budget and excludes the budgets for the Stanford Hospital and Clinics and the Lucile Packard Children's Hospital, which are separate corporations.

## SOURCES OF FUNDS FOR FY 2011–12

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29%	sponsored research
20%	endowment income
4%	other investment income
18%	student income
13%	health care services income
7%	expendable gifts and net assets released
9%	other income

## EXPENDITURES FOR FY 2011–12

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54%	salaries and benefits
30%	operating expenses
10%	SLAC National Accelerator Laboratory
6%	financial aid

## Endowment

Stanford's \$16.5 billion endowment (as of Aug. 31, 2011) provides an enduring source of financial support for fulfillment of the university's mission of teaching, learning and research. About 75 percent of the endowment is designated by donors for a specific purpose. There are nearly 7,000 endowed university funds.

Each year, a portion of investment return from the endowment is used to support annual operating expenses. The remainder of the return is reinvested in the endowment to maintain its value over time. The Stanford Management Company (SMC) was established in 1991 to manage

Stanford's financial and real estate assets. SMC is a division of the university with oversight by a board of directors appointed by the university Board of Trustees.

## **Fundraising**

Stanford University in 2010–11 raised \$709.4 million from 77,524 donors. More than 36 percent of undergraduate alumni made gifts to the university. The gifts included \$211.6 million for research, \$65.7 million in student aid, \$45.8 million for professorships and other faculty support and \$104.6 million for building projects.

Through Stanford's annual giving programs, alumni, parents and friends are encouraged to make expendable gifts for general university and school purposes. From time to time, individuals, foundations and corporations make major gifts to increase the university's endowment, to construct new buildings or to start new programs. In addition, some alumni and friends include Stanford in their estate planning or make arrangements for a deferred gift to the university. For more information, call (650) 723-8500 or visit <http://givingtostanford.stanford.edu>.

<b>FISCAL YEAR</b>	<b>GIFTS IN MILLIONS (\$)</b>
<b>2001</b>	469.0
<b>2002</b>	454.8
<b>2003</b>	486.1
<b>2004</b>	524.2
<b>2005</b>	603.6
<b>2006</b>	911.2
<b>2007</b>	832.3
<b>2008</b>	785.0
<b>2009</b>	640.1
<b>2010</b>	598.9
<b>2011</b>	709.4

# University Governance

**S**TANFORD UNIVERSITY IS A TRUST WITH CORPORATE POWERS UNDER THE LAWS OF THE STATE OF CALIFORNIA. The university is a tax-exempt entity under section 501(c)3 of the Internal Revenue Code. Under the provisions of the Founding Grant, the Board of Trustees (with a maximum membership of 35) is custodian of the endowment and all the properties of Stanford University. The board administers the invested funds, sets the annual budget and determines policies for operation and control of the university. Among the powers given to the trustees by the Founding Grant is the power to appoint a president. The board delegates broad authority to the president to operate the university and to the faculty on certain academic matters. The formal legal name is “The Board of Trustees of the Leland Stanford Junior University.”

The Stanford Hospital and Clinics and the Lucile Salter Packard Children’s Hospital at Stanford are nonprofit California corporations. They are separate from the university and from one another.

## Accreditation

Stanford University is accredited by the Accrediting Commission of Senior Colleges and Universities of the Western Association of Schools and Colleges.

## Board of Trustees (December 2011)

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**Isaac Stein**, President, Waverley Associates, Atherton, CA

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**Jerry Yang**, Co-founder and Chief Yahoo, Yahoo! Inc., Sunnyvale, CA

**Deborah A. Zoullas**, Private Investor, D Squared Holding LLC, New York, NY

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**David Jones**, Vice President for Human Resources

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**Martin Shell**, Vice President for Development

**Howard Wolf**, Vice President for Alumni Affairs and President of the Stanford Alumni Association

**Debra Zumwalt**, Vice President and General Counsel

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**John Raisian**, Director, Hoover Institution on War, Revolution and Peace

**Richard Saller**, Dean, School of Humanities and Sciences

**Garth Saloner**, Dean, Graduate School of Business

**Claude Steele**, Dean, School of Education

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## Staff

In 2011, 10,680 staff members supported teaching, learning and research at Stanford, including 5,500 managerial and professional staff, 2,845 clerical and technical staff, and 741 service and maintenance staff. There are 1,594 employees at the SLAC National Accelerator Laboratory. For more information about working at Stanford, visit <http://jobs.stanford.edu>.


# Stanford Alumni

**T**HERE ARE AN ESTIMATED 191,519 LIVING STANFORD DEGREE HOLDERS, including 75,183 undergraduate alumni, 97,367 graduate alumni and 18,969 dual-degree holders. Stanford alumni can be found in 143 countries, 20 territories and all 50 states and the District of Columbia. Some notable Stanford alumni include:

**Academic leaders:** Derek Bok, former Harvard University president; William Brody, Salk Institute president and former Johns Hopkins president; Nancy Cantor, Syracuse chancellor and president; France Córdova, Purdue president; Michael V. Drake, UC-Irvine chancellor; Pamela Eibeck, University of the Pacific president; Vartan Gregorian, former Brown president; the Rev. William Leahy, Boston College president; Richard Levin, Yale president; Robert Shelton, University of Arizona president

**Arts and entertainment:** Actors Jennifer Connelly, Ted Danson, Fred Savage and Sigourney Weaver; artists Richard Diebenkorn\* and Robert Motherwell\*; broadcasters Gretchen Carlson, Ted Koppel and Rachel Maddow; composer David Lang; directors David Chase, Alexander Payne and Jay Roach; pianist Jon Nakamatsu; producers David Brown,\* Roger Corman, Gale Anne Hurd, Edward Pressman, Jeffrey Skoll and Richard Zanuck

**Athletics:** Baseball player Mike Mussina; football players John Elway, John Lynch, Toby Gerhart and Jim Plunkett; golfers Tom Watson and Tiger Woods; Olympians Jennifer Azzi,



The Frances C. Arrillaga Alumni Center offers visiting alumni such amenities as a business center, cafe and library.

Janet Evans, Julie Foudy, Eric Heiden, Bob Mathias,\* Pablo Morales, Jessica Mendoza, Summer Sanders, Kerri Strug, Jenny Thompson and Kerri Walsh; tennis players Bob and Mike Bryan and John McEnroe

**Business:** Entrepreneurs Sergey Brin and Larry Page (Google), Doris Fisher (Gap), Reed Hastings (Netflix), William Hewlett\* and David Packard\* (Hewlett-Packard), Reid Hoffman (LinkedIn), Phil Knight (Nike), Scott McNealy, Vinod Khosla and Andy Bechtolsheim (Sun Microsystems), Charles R. Schwab (Charles Schwab Corp.), Peter Thiel (PayPal) and Jerry Yang and David Filo (Yahoo!); executives Steve Ballmer (Microsoft), Azim Premji (Wipro) and Jeffrey Bewkes (Time Warner)

**Government:** U.S. President Herbert Hoover\*; Supreme Court justices Stephen Breyer, Anthony Kennedy, Sandra Day O'Connor and William Rehnquist\*; U.S. Senators Max Baucus, Jeff Bingaman, Dianne Feinstein, Jeff Merkley and Ron Wyden; Jorge Serrano Elías, former president of Guatemala; Ricardo Maduro, former president of Honduras; Alejandro Toledo, former president of Peru; former prime ministers of Japan Taro Aso and Yukio Hatoyama; and Ehud Barak, former prime minister of Israel

**Science and engineering:** Inventors Vinton Cerf (the Internet protocol), John Chowning (synthesizer), Ray Dolby (noise-reduction system), Ed Ginzton\* (microwave technology), Ted Hoff (microprocessor), H. Taylor Howard\* (satellite dish), Ted Maiman\* (laser), Brad Parkinson (GPS), Brent Townshend (56K modem) and Russell Varian\* and Sigurd Varian\* (klystron); Nobel Prize winners Dudley Herschbach, Roger Kornberg and K. Barry Sharpless (chemistry) and Eric Cornell, Richard E. Taylor and Carl Wieman (physics)

**Creative writing:** Novelists Michael Cunningham, Jeffrey Eugenides, Ernest Gaines, Allegra Goodman, Alice Hoffman, Ken Kesey,\* Nicole Krauss, N. Scott Momaday, John Steinbeck,\* Vikram Seth, Scott Turow and Tobias Wolff; playwrights Maxwell Anderson,\* David Henry Hwang and Mark Medoff; poets laureate Robert Hass, Philip Levine and Robert Pinsky

**And more:** Episcopal Bishop Katharine Jefferts Schori; Nobel Prize-winning economists John Harsanyi\* and Oliver E. Williamson; information designer and statistician Edward Tufte; philanthropic leaders Jeff Raikes (The Gates Foundation) and Jessica Jackley and Matt Flannery (Kiva); Internet pioneer Stewart Brand; Firefox software developer Blake Ross; surgeon Atul Gawande; vintners Paul Draper and Robert Mondavi\*; and 17 astronauts, including the first American woman in space, Sally Ride

\* deceased

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## Stanford Alumni Association

Established in 1892 by members of Stanford's first graduating class, the Stanford Alumni Association works to reach, serve and engage Stanford alumni throughout the world. It offers programs and services including reunions, *Stanford* magazine, faculty-led travel and alumni networking. For more information, visit [alumni.stanford.edu](http://alumni.stanford.edu).

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## University Telephone Directory

### All numbers are in the (650) area code

Visitor and Campus Tour Information	723-2560
University Operator	723-2300
Emergency	from campus phone 9-911 from public phone 911
Admission, Graduate	723-4291
Admission, Undergraduate	723-2091
Athletics Tickets	723-1021
Business, Graduate School of	723-2146
Continuing Studies/Summer Session	725-2650
Development Office	723-8500
Disability Resource Center	723-1066
Earth Sciences, School of	725-1802
Education, School of	723-2109
Engineering, School of	723-3938
Financial Aid Office	723-3058
Humanities and Sciences, School of	723-2275
Law, School of	723-2465
Medicine, School of	725-3900
Memorial Church	723-1762
News Service	723-2558
Public Safety (business number)	723-9633
Stanford Alumni Association	723-2021
Stanford University Hospital	723-4000
Student Life, Office of	723-2733
Ticket Office	725-ARTS

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(Back cover) Memorial  
Auditorium as seen from the  
Hoover Tower observation deck.  
*Photo by Kate Chesley*



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