BROWN UNIVERSITY



TWO HUNDRED AND FORTY-SEVENTH COMMENCEMENT

SUNDAY, MAY 24, 2015



In March 1764, the "General Assembly of the Governor and Company of the English Colony of Rhode Island" gathered to consider the charter that would establish Rhode Island College (renamed Brown University in 1804). Though founded during the reign of King George III, the college was dedicated to the "liberty of conscience," a core principle that continues to define our institution to this day. Brown's 250th Anniversary is being celebrated on College Hill and throughout the world through May 2015. The semiquincentenary provides an opportunity to acknowledge Brown's academic excellence while exploring new ways of collaborating across disciplines; reflect on the challenges Brown has confronted over time; and imagine Brown's future in an ever more complex global environment.

Brown University

PROVIDENCE, RHODE ISLAND MAY 24, 2015

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Commencement Summary (all times are estimated)

Seating on the College Green is on a first-come basis outside the center section.

Seniors line up on Waterman Street. 9:30 A.M. Procession begins through Faunce Arch. 9:45 A.M. 10:15 A.M. Graduate School Ceremony on Simmons Quadrangle. 10:15 A.M. Medical School Ceremony at the First Unitarian Church. 12:10 P.M. College ceremony on First Baptist Church grounds begins (simulcast). Seniors begin to arrive back on the College 12:35 P.M. Green to be seated in the center section. • Half arrive through the north (Hope College) gate. • Half arrive through the south (Rhode Island Hall) gate. 1:00 P.M. University ceremony on College Green begins. Senior orations Honorary degrees Symbolic degrees 2:00 P.M. University ceremony on College Green ends. Diploma ceremonies begin. 2:15 P.M. A listing of the locations appears on page 36 of the program.

The day begins with a procession during which the candidates for degrees march across the College Green, led by the chief marshal party, Brown band, presidential party, Corporation, senior administration, and faculty. In addition, alumni who have returned for reunions march with their classes. Once the last person is through the Van Wickle Gates on the front green, the procession inverts and continues down College Street with each participant applauding the others.

The Medical School adjourns to the First Unitarian Church on Benefit and Benevolent streets. The Graduate School procession ends on Simmons Quadrangle, where a tent accommodates spectators; additional seating is available in Metcalf Friedman Auditorium, with viewing by simulcast.

The senior class marches down College, Benefit, and Waterman streets to the First Baptist Church in America and assembles on the lawn. Family and friends wait on the College Green, where large screens afford a continuous view of the proceedings. Afterward, the seniors walk up the hill and take seats on the College Green for the University ceremony.

Parents, relatives, and friends of seniors are advised to find seats on the College Green during the opening procession. The best opportunity to take photographs of graduating seniors is at the diploma ceremonies in the afternoon. In addition, the Van Wickle Gates will remain open for photographs until 6:00 p.m. on Monday.

The Graduate School Ceremony

SIMMONS QUADRANGLE

10:15 A.M. (estimated)

Seating is limited; a simulcast can be viewed in Metcalf Friedman Auditorium.

PRESIDING

Peter M. Weber Dean of the Graduate School, Professor of Chemistry

PROCESSIONAL

INVOCATION The Reverend Kirstin C. Boswell Ford Associate University Chaplain for the Protestant Community

STUDENT ADDRESS Mateus Bruno Baptista '15 A.M. *Urban Education Policy* "Intellectual Responsibility: A Culture of Critique"

AWARDING OF THE MASTER'S AWARDS*

PRESENTERS: Don Operario Associate Dean for Master's Education, Associate Professor of Public Health

Vanessa Ryan Associate Dean of the Graduate School, Assistant Professor of English

AWARDING OF THE JOUKOWSKY FAMILY FOUNDATION OUTSTANDING DISSERTATION AWARD*

PRESENTERS: John Tyler Associate Dean of Academic Affairs, Professor of Education

Jabbar R. Bennett Associate Dean of the Graduate School, Associate Dean, Division of Biology and Medicine, Clinical Assistant Professor of Medicine

AWARDING OF THE HORACE MANN MEDAL*

PRESENTER: Peter M. Weber

PRESENTING MASTER'S CANDIDATES

MASTER OF ARTS Don Operario

MASTER OF ARTS IN TEACHING Kenneth K. Wong Chair, Education Department, Walter and Leonore Annenberg Professor of Education Policy MASTER OF FINE ARTS Stephen Berenson Director of Graduate Study, Brown/Trinity Repertory Acting and Directing programs, Clinical Professor of Theatre, Speech and Dance

MASTER OF PUBLIC AFFAIRS MASTER OF PUBLIC POLICY James A. Morone John Hazen White Professor of Public Policy, Professor of Political Science and Urban Studies, Director of Public Policy

MASTER OF PUBLIC HEALTH Terrie T. Wetle Dean of the School of Public Health

MASTER OF SCIENCE Don Operario

MASTER OF SCIENCE IN INNOVATION MANAGEMENT AND ENTREPRENEURSHIP ENGINEERING Eric Suuberg Professor of Engineering, Co-Director, Program in Innovation Management and Entrepreneurship Engineering

EXECUTIVE MASTER OF HEALTHCARE LEADERSHIP Karen H. Sibley Dean of the School of Professional Studies, Vice President for Strategic Initiatives

CONFERRING OF MASTER'S DEGREES Peter S. Voss '68 Board of Fellows

PRESENTING DOCTOR OF PHILOSOPHY CANDIDATES Peter M. Weber

CONFERRING OF DOCTOR OF PHILOSOPHY DEGREES Peter S. Voss

BENEDICTION

Adrian Adnan Wood-Smith Associate University Chaplain for the Muslim Community

RECESSIONAL

The audience is asked to remain standing while the platform party, faculty and graduates exit by section and row to allow those who wish to attend the University ceremony to move to the College Green.

* Names of recipients are on page 27.

The Warren Alpert Medical School Ceremony

THE FIRST UNITARIAN CHURCH 10:15 A.M.

PRESIDING Jack A. Elias Dean of Medicine and Biological Sciences

PROCESSIONAL

NATIONAL ANTHEM *Medical Records*

INVOCATION Angela Howard-McParland Interim Associate University Chaplain for the Catholic Community and Director, Brown-RISD Catholic Community

GREETINGS Jack A. Elias

Introduction by Honora Burnett '15 MD Luba Dumenco, MD, FACP Director, Preclinical Curriculum Alpert Medical School of Brown University "Learning from those who touch our lives: Reflections on teaching and inspiration from patients, students, colleagues, and families"

Introduction by Sarah Rapoport '15 MD Carolyn Luppens '15 MD *"The anti-checklist manifesto"*

Plaque Presentation by Tracey Martin '15 MD

MUSICAL INTERLUDE

MUSIC L. Frederick Jodry V Senior Lecturer in Music, Organist

Aaron Lindo *Highland piper*

George Caldow Highland drummer

THE PHYSICIAN'S OATH

Now being admitted to the high calling of the physician, I solemnly pledge to dedicate my life to the care of the sick, the promotion of health, and the service of humanity.

In the spirit of those who have inspired and taught me, I will seek constantly to grow in knowledge, understanding, and skill and will work with my colleagues to promote all that is worthy in the ancient and honorable profession of medicine.

The health and dignity of my patient will ever be my first concern. I will hold in confidence all that my patient relates to me. I will not permit considerations of race, gender, sexual orientation, religion, nationality, or social standing to come between me and my duty to anyone in need of my services.

This pledge I make freely and upon my honor.

PRESENTATION OF DEGREE RECIPIENTS Allan Tunkel, MD, PhD, MACP *Associate Dean for Medical Education*

CONFERRING OF MASTER OF PUBLIC HEALTH DEGREES Mark S. Blumenkranz '72, '75 M.D., '76 M.M.S.

CONFERRING OF MEDICAL DEGREES Mark S. Blumenkranz *Board of Fellows*

CONFERRING OF DOCTOR OF PHILOSOPHY DEGREES Mark S. Blumenkranz

AWARDING OF MEDICAL SENIOR CITATION* PRESENTER: Grayson Armstrong '15 MD

BENEDICTION Rabbi Michelle Dardashti Associate University Chaplain for the Jewish Community and Rabbi of Brown RISD Hillel

RECESSIONAL

The audience is asked to remain standing until the end of the recessional. The assembly will then proceed to the Hope Club for a reception.

The College Ceremony

THE GROUNDS OF THE FIRST BAPTIST CHURCH IN AMERICA 12:10 P.M. (ESTIMATED)

PRESIDING Christina H. Paxson *President*

THE NATIONAL ANTHEM John Brakatselos '15

INVOCATION The Reverend Janet Cooper Nelson *Chaplain of the University*

CONFERRING OF THE BACCALAUREATE DEGREES Christina H. Paxson

At the conclusion of the exercises the assembly will move to the College Green for the University ceremony

THE MEETING HOUSE OF THE FIRST BAPTIST CHURCH IN AMERICA

The Meeting House, completed in 1775, was built "for the Publick Worship of Almighty God, and also for holding Commencement in." Central parts of the Brown Commencement ceremonies have been held here ever since. Moreover, during their tenure three Brown presidents were also ministers of this church, and all of the presidents who held office between 1764 and 1937 were Baptist clergy.

The University Ceremony

THE COLLEGE GREEN 1:00 P.M.

PRESIDING Christina H. Paxson *President*

PROCESSIONAL

SENIOR ORATIONS Michelle Bailhe '15 *"I Don't Know"*

Lucas Johnson '15 *"School Spirit"*

CONFERRING OF HONORARY DEGREES* PRESENTERS: Joseph M. Pucci

Professor of Classics and Comparative Literature

Stephen Merriam Foley '74 Secretary of the Faculty, Associate Professor of English and Comparative Literature

PRESENTATION OF BACCALAUREATE DEGREE RECIPIENTS Maud S. Mandel Dean of the College **PRESENTATION OF MASTER'S DEGREE RECIPIENTS** Peter M. Weber *Dean of the Graduate School*

PRESENTATION OF M.D. DEGREE RECIPIENTS Jack A. Elias *Dean of Medicine and Biological Sciences*

PRESENTATION OF PH.D. DEGREE RECIPIENTS Peter M. Weber

CONFERRING OF MASTER OF ARTS DEGREES, ad eundem** PRESENTER: Kevin McLaughlin Dean of the Faculty

RECOGNITION OF OFFICERS EMERITI**

PRESENTATION OF FACULTY TEACHING EXCELLENCE AWARDS‡ PRESENTER: Kevin McLaughlin

PRESENTATION OF THE SUSAN COLVER ROSENBERGER MEDAL OF HONOR PRESENTER: James A. Morone

Chair of the Faculty/Faculty Executive Committee, John Hazen White Professor of Political Science and Public Policy and Director of the Taubman Center

BENEDICTION

The Reverend Janet Cooper Nelson *Chaplain of the University*

THE ALMA MATER

tune: "Araby's Daughter," George Kiallmark (1781-1835)

text: "Alma Mater," James Andrews DeWolf, class of 1861 (1839-1909)

Alma Mater! We hail thee with loyal devotion And bring to thine altar our offring of praise;

Our hearts swell within us with joyful emotion As the name of Old Brown in loud chorus we raise.

The happiest moments of youth's fleeting hours We've passed 'neath the shade of these time-honored walls;

And sorrows as transient as April's brief showers Have clouded our life in Brunonia's halls.

THE ALMA MATER 250

RECESSIONAL The audience is requested to remain at seats until the end of the recessional.

DIPLOMA CEREMONIES

At the conclusion of the ceremony on the College Green, seniors, their family, and guests are requested to go to the locations designated for the distribution of diplomas. MUSIC Brown University Commencement Band Matthew McGarrell, *Director*

THE ALMA MATER 250 Vocalists: William Martin Finn MFA'15, Florence Elise Hudson MFA'15, Michael Jennings Mahoney MFA'15, Ian McNeely MFA'15, Sebastián Otero '18, Andrew Joseph Polec MFA'15, Whitney Clair White MFA'15, Max Holiner Wolkowitz MFA'15

Musicians: Roomful of Blues

Score: Joseph Butch Rovan, Chair, Department of Music

Stage Direction: Curt Columbus, Artistic Director, Trinity Repertory Company

Schedule in the Event of Storm Conditions

THE PAUL BAILEY PIZZITOLA MEMORIAL SPORTS CENTER 12:00 P.M.

PRESIDING Christina H. Paxson *President*

THE NATIONAL ANTHEM John Brakatselos '15

INVOCATION The Reverend Janet Cooper Nelson *Chaplain of the University*

SENIOR ORATIONS Michelle Bailhe '15 *"I Don't Know"*

Lucas Johnson '15 *"School Spirit"*

CONFERRING OF HONORARY DEGREES* PRESENTERS: Joseph M. Pucci *Professor of Classics and Comparative Literature* Stephen Merriam Foley '74 Secretary of the Faculty, Associate Professor of English and Comparative Literature

CONFERRING OF THE BACCALAUREATE DEGREES Christina H. Paxson

PRESENTATION OF BACCALAUREATE DEGREE RECIPIENTS Maud S. Mandel Dean of the College

CONFERRING OF MASTER OF ARTS DEGREES, ad eundem** PRESENTER: Kevin McLaughlin Dean of the Faculty

RECOGNITION OF OFFICERS EMERITI**

PRESENTATION OF FACULTY TEACHING EXCELLENCE AWARDS‡ PRESENTER: Kevin McLaughlin

PRESENTATION OF THE SUSAN COLVER ROSENBERGER MEDAL OF HONOR

PRESENTER: James A. Morone Chair of the Faculty/Faculty Executive Committee, John Hazen White Professor of Political Science and Public Policy and Director of the Taubman Center

THE ALMA MATER

BENEDICTION The Reverend Janet Cooper Nelson *Chaplain of the University*

RECESSIONAL

The audience is requested to remain standing until the end of the processional.

DIPLOMAS

Seniors, their family, and guests are requested to go to the locations designated for the distribution of diplomas. A listing of the locations appears on page 36 of the program.

COMMENCEMENT 2015 STORM PLAN

In the event of severe weather conditions on Sunday, the Commencement storm plan will be enacted by 6:00 a.m. The decision to move to the storm plan will be communicated via the Brown University home page, the Commencement website, a message will be recorded on (401) 863-3100, and a text will be sent to all graduating students.

If the Commencement storm plan is enacted, the procession will be cancelled. Should graduating students want to pass through the Van Wickle Gates, they will remain open until 6:00 p.m. on Monday.

The College and University ceremonies will be combined, moved indoors, and begin at

noon. Undergraduates should report directly to the Pizzitola Sports Center between 11:00 and 11:30 a.m. Family and guests of seniors may view a simulcast of the ceremony in Meehan Auditorium, Salomon Center for Teaching, or Sayles Hall. Doors will open at 11:00 a.m. and seating will be limited in all locations. The ceremony will also be live streamed at www. brown.edu/web/livestream which can be accessed from most mobile devices. Diploma ceremonies will be held in the assigned locations following the University ceremony.

Ph.D. recipients should report directly to the ground level of Lyman Hall and master's recipients should report to the basement of Metcalf Research Lab by 9:00 a.m. to line up for the procession to the Graduate School ceremony on Ruth J. Simmons Quadrangle. Guests of graduate students should go to the tent on Simmons Quad for the 10:15 a.m. ceremony. The ceremony will be simulcast in Friedman Auditorium (Metcalf Research Lab) and in MacMillan Hall Rooms 115 and 117. Doors will open at 9:00 a.m. in all locations. The ceremony will also be live streamed at www.brown.edu/ web/livestream which can be accessed from most mobile devices.

Medical School degree recipients should report directly to the Parish House behind the First Unitarian Church by 9:00 a.m. for the class photo. The procession will begin lining up at 9:30 a.m. in the Parish House. Guests of medical students should go to the First Unitarian Church for the 10:15 a.m. ceremony. Doors will open for guests at 9:30 a.m.

Brown University's 19th President



CHRISTINA H. PAXSON

Christina Paxson is the nineteenth president of Brown University and Professor of Economics and Public Policy. She assumed the role of president on July 1, 2012. As president, she has worked with students, faculty and staff to develop Building on Distinction, a strategic plan

for Brown that will inform the University's next decade of growth and progress. The plan seeks to build on the progress of the last decade and provides a vision and set of broad goals to achieve higher levels of distinction as a university that unites innovative education and outstanding research to benefit the community, the nation and the world. It calls for targeted investments to attract and support the most talented and diverse faculty, students, and staff; capitalize on existing strengths; and provide the environment to foster rigorous inquiry and discovery across the disciplines. The plan highlights the need to keep a Brown education affordable for talented students from all economic backgrounds and to sustain a community with the diversity of thought and experience required for excellence.

Prior to her appointment as President in July 2012, she was dean of the Woodrow Wilson School of International and Public Affairs and the Hughes Rogers Professor of Economics and Public Affairs at Princeton University.

A 1982 honors graduate of Swarthmore College, Phi Beta Kappa, Paxson earned her graduate degrees in economics at Columbia University (M.A., 1985; Ph.D., 1987). She began her academic career at Princeton University in 1986, becoming assistant professor of economics and public affairs the next year. She became a full professor in 1997 and was named the Hughes-Rogers Professor of Economics and Public Affairs in 2007. While at Princeton, Paxson also served as associate chair (2005-2008) and chair (2008-2009) of the Department of Economics and was the founding director of a National Institute on Aging Center for the Economics and Demography of Aging. In 2000, she founded the Center for Health and Wellbeing, an interdisciplinary research center in the Woodrow Wilson School. The center established multidisciplinary graduate and undergraduate certificate programs in health and health policy. She served as the center's director until 2009.

Initially working on international economic problems of labor supply, mobility, savings, inequality, and aging, Paxson focused increasingly on the relationship of economic factors to health and welfare over the life course, particularly on the health and welfare of children. She has been the principal investigator on a number of research projects supported by the National Institutes of Health, including a study of adversity and resilience after Hurricane Katrina. She has authored or co-authored numerous journal articles, was elected vice president of the American Economic Association in 2012, and is a member of the Council on Foreign Relations.

Brown Commencement Traditions

Commencement day at Brown University is a time of great ceremony, pageantry, and rejoicing, much of it representing traditions that are centuries old. These notes on the history, setting, and action of the Brown Commencement are offered in the hope that they will add to your enjoyment of this unique academic celebration.

COMMENCEMENT HISTORY

The seventh-oldest college in the United States, Brown was founded in 1764 as the College of the Colony of Rhode Island under the leadership of the Rhode Island Baptists.

The first Commencement was held on September 7, 1769, in what was then the College's home, the Baptist Meeting House in Warren, Rhode Island, 10 miles south of Providence. Seven young men were awarded degrees. The institution moved to Providence the following year, and in 1804 it acquired its present name in honor of a major benefactor, Nicholas Brown of Providence, class of 1786.

For the six years prior to the Declaration of Independence, Commencement ceremonies were held in Father Snow's Meeting House in downtown Providence, now Beneficent Congregational Church. In 1776 the ceremony moved to the First Baptist Meeting House, built in 1774-75 to house the oldest Baptist church in America, founded by Roger Williams in 1638, the second year of his exile from the Massachusetts Bay Colony. The meeting house was erected "for the publick Worship of Almighty GOD and also for holding Commencement in." A National Historic Landmark, it was completely restored in 1958 through a gift from the late John D. Rockefeller Jr., class of 1897.

In the early days Brown's Commencement was known as "the festival of Providence," widely attended by enthusiastic townsfolk. So disorderly was their conduct that in 1791, the Rhode Island General Assembly passed a law requiring the high sheriff of Providence County to attend all Commencements "to preserve the peace, good order, and decorum in and about the Meeting House." The law still stands and the sheriff still marches, identifiable by full evening dress, high silk hat, blue sash, and sword.

During the 20th century, members of Brown's alumni classes began to hold their five-year reunions to coincide with Commencement weekend. Today more than 4,000 alumni and their families return to campus each year for a series of events capped by the Commencement procession on Sunday morning.

THE PROCESSION

Sunday morning, while the Commencement procession passes through Faunce Arch onto the College Green, the Brown Band begins to play the lilting "Brown Commencement March," arranged by the late Wally Reeves. The music is punctuated by the pealing of the College bell, which has rung from the cupola of University Hall since 1791; it is joined by the Meeting House bell, imported from England in 1775.

As the procession marches from the campus down College Hill to the Meeting House, it passes through the Van Wickle Gates, which swing open only twice a year: inward to admit the first-year class at Opening Convocation in the fall and outward on Commencement Day to discharge the degree candidates.

The procession is led by the chief marshal, a member of the 50-year reunion class, the deputy chief marshal, a member of the 25-year reunion classes, and by the chief and assistant chief of staff. They are followed by the color guard and alumni aides and marshals from various reunion classes. The men traditionally dress in top hats and tails, while women wear academic robes. The faculty, thousands of alumni, the graduating seniors, medical students, and graduate students, members of the Brown Corporation, invited guests, and the presidential party round out the procession. At one point, the procession stops and forms an inversion to allow each marcher to pass by all the others, to mutual applause.

THE OFFICERS

Prominent among the marchers are members of the Brown Corporation, the University's governing body, consisting of 12 fellows and 42 trustees. They can be identified by their large, floppy "trencher" hats, which were approved for use by the Brown Corporation in 1912 to provide a distinctive alternative to the traditional academic cap. Other colleges and universities have subsequently adopted the style. Robes, designed and adopted in 1968, are of the University's colors: seal brown and cardinal red, with black velvet trim.

Invited guests include candidates for honorary degrees, U.S. senators and congressional representatives from Rhode Island, the governor of Rhode Island, and the mayor of Providence. The presidential party – the president, the senior fellow, the chancellor, the vice chancellor, and the chaplain – is led by a mace bearer who is a faculty member and a Brown alumnus.

THE MACE

Once a weapon used to crush an opponent's armor, the mace has evolved into a symbol of authority. Brown's mace, which weighs more than 20 pounds, was given to the University in 1928. It is adorned with symbols from Brown's past and with the names of its presidents and prominent 19th-century alumni. The mace is carried in processions at the opening of the academic year, at Commencement, and at ceremonies where honors or degrees are to be awarded.

ACADEMIC REGALIA

The president's academic gown, and the golden chain and pendant that adorn her neck, became the official presidential regalia during the University's bicentennial celebration in 1964–65; the robe was designed by the late Anne S.K. (Mrs. John Nicholas) Brown, an expert on military and ceremonial dress. The caps, gowns, and hoods of others in the procession represent a tradition of academic dress that began in the 12th and 13th centuries, when cold stone buildings housed medieval universities. The gowns were an adaptation of clerical garb.

ACADEMIC HOODS

A scholar's hood, worn around the neck and hanging down the back, denotes degree, field, and alma mater. The band of velvet circling the outer edge of the hood varies in width according to the highest degree attained: narrow for the bachelor's degree, medium for the master's, and broad for the doctorate. The color represents the field of scholarship: arts and letters, white; economics, copper; education and pedagogy, light blue; engineering, orange; humanities, crimson; law, purple; medicine, kelly green; music, pink; philosophy, blue; science, gold; and theology, scarlet. The hood is lined with the colors of the institution attended by the wearer. A Brown University hood is lined in seal brown crossed by a broad band of cardinal red.

THE CANE

The cane carried by the president of the Brown Alumni Association serves as the symbol of that office. It is made of oak taken from University Hall when the building was reconstructed during the 1880s.

COMMENCEMENT SPEAKERS

Unlike most colleges and universities, Brown imports no Commencement speaker for the College ceremonies. On the College Green on Commencement morning, two members of the senior class, selected by a faculty committee, deliver short orations.

CONFERRING OF DEGREES

The conferring of bachelor's degrees is accomplished verbally on the grounds of the Meeting House, and the presentation of symbolic diplomas comes later on the College Green. Still later in the day, the seniors receive their actual diplomas at separate disciplinary ceremonies.

The words spoken by the president on the grounds of the Meeting House are:

Socii honorandi: Juvenes quos ad gradum Baccalaurei idoneos comperimus, vobis praesentamus, et eos ad hunc gradum promovere liceat rogamus. Candidati ad gradum Baccalaurei auscultabunt. Auctoritate mihi commissa vos ad gradum Baccalaueri admitto, omniaque jura ac privilegia ad hunc gradum pertinentia, vobis concedo. In huius rei testimonium diplomata vestris conlegis in Collegii Gramine tradam.

continued on page 8

Honorable Fellows: The youths whom we have found to be qualified for the bachelor's degree we now present to you, and we ask that they may come forward for the awarding of the degree. May the candidates for the bachelor's degree listen attentively. Through the authority entrusted to me I admit you to the bachelor's degree, and all the rights and privileges associated with this degree I confer upon you. In testimony thereof I will presently deliver your diplomas to your representatives on the College Green.

After the president pronounces the awarding of the bachelor's degrees, all degree recipients return to the Green for the University Ceremony.

The Graduate School and Medical School have separate convocations for the awarding of master's degrees, Ph.D.s, and M.Ds.

THE UNIVERSITY CEREMONY

The president takes her seat in the centuries-old Manning Chair, which once belonged to Brown's first chancellor, Stephen Hopkins, a signer of the Declaration of Independence and an early Rhode Island governor. It was used by Brown's first president, James Manning, and has seated successive presidents at their inaugurations and on Commencement Day.

The university ceremony held on the College Green begins with the senior orations followed by the conferring of honorary degrees.

The president then bestows symbolic degrees on representatives of each category of degree and then speaks this admonition: Videte igitur ut probe, integreque, in emolumentum rei publicae et in Dei honorem, ut decet eos hoc gradu honoratos vos geratis. "Take care that you conduct yourselves, with probity and integrity to the credit of the state and the honor of God, as befits those who have been honored with this degree."

A benediction concludes the ceremony.

Directly following the university ceremony separate diploma ceremonies, inaugurated in 1974, are conducted by department chairs. Each ceremony is attended by the faculty of the department, the degree recipients, and their families and guests. A listing of the locations appears on page 36 of the program.

Candidates for Baccalaureate Degrees

BACHELOR OF ARTS

Marianne Abbott Hasbun ‡ Midoriko Grace Abe ‡ Sarah Hadassah Abelman Jonathan Alexander Abrams ‡ Alejandro Acero Murillo Crystal Acevedo Brook Jacy Achterhof Haley Susan Adams Sagar Rajesh Adani Olutoye Adeolu Adegboro ‡ Janet Oluwasesan Adeniji Claire Robin Adler Elizabeth Grunwald Adler Steven Joel Goldberg Adler * $$\Phi$ Prateek Agarwal Shubh Agrawal $\ddagger \Sigma$ Sonia Alicia MacLeod Ahmed Zainab Noor Ahmed Jennifer Belgrave Aitken Ngange Robert Akale Roxanne A. Alaghband Walter Donovan Albee Kyle Joseph Albert *‡Φ Andrew Lee Alexander ‡ Faisal Sate Ma Kh Al Husry Meher Siddique Ali *‡¢ Paige S. Allen William Gabriel Allen-DuPraw Alexi Almonte Dulamtseren Altan Haley Marisa Alvarez Christina Michelle Ames Chloe-Alcestes Anastasiades Brett Joseph Anders * ϕ Lars Henly Andersen * Albert John Anderson Jeffrey Paul Anderson Nicole Andre Georgia Mintaka Angell Peter Andre Aranha Jose Luis Araujo Abdala Race Cassimeris Archibold Stephen Michael Ark Eric McCoy Armagost Amelia Elizabeth Armitage *‡ Corina Arnal ‡ Michael Jesse Arnold Zoe Rebecca Aron Tarek Abdulghani Aryani Linda Asante Adam David Asher ‡ Daniel Robert Audette Tara Avril-Tucker *‡¢

* magna cum laude

- ‡ honors in concentration
- $\Phi\,$ Phi Beta Kappa (elected senior year)
- φ Phi Beta Kappa (elected junior year)
- Σ Sigma Xi
- T Tau Beta Pi

Gabriel Baggio Thomaz Millicent Dianne Bailey Peter Cameron Bailey Michelle Maire Bailhe $\ddagger \Sigma$ Henry Kirkhope Baker $\ddagger \Sigma$ Nicholas Spencer Baker * Rebecca Stewart Balton Vivienne Joo Won Bang Taylor Catherine Bantle Samuel Rafael Barber ‡ Robert Vincent Barone Brian William Barr David Issac Barrera Emma Rose Barrett Mariya Dmitriyevna Bashkatova ‡ Jeffrey Steven Baum Jordan Riley Beard *Φ Andrew Lawrence Beers * Hannah Mae Begley *‡Φ Lauren Cecilia Behgam Viktoria Vencislavova Belberova Kirsten Sylvia Belinsky Hannah Alyssa Benenson Omar Tarek Oakes Ben Halim Cassidy Joan Bennett ‡ Lukas Alexander Bentel ‡ Madeline Pia Klaimitz Berg *Φ Lee Meredith Bernstein ‡ Clara Sternoff Beyer Manit Bharany Divya S. Bhatia ‡ Karishma Haresh Bhatia Avinash Sunil Bhavnani Yelena Margaret Bidé ‡ Sophia Allison Bikofsky Natasha Winslow Blackadar Reed Lovinggood-Lewi Blair Colin Kirk Francis Blake Jr. Emma Frances Blake Σ Leila Ann Blatt ‡ Joshua D. Bloom Natasha Phelps Bluth ‡ Brisa Lua Bodell Alexander Taylor Bok Philip John Bold * Katherine Elizabeth Bommarito Cale Michaels Bonderman ‡ Emily L. Boney Corbin Mackenzie Booker Madeline Claire Borges ‡ Anna May Boughtwood Elaina Robi Boutte Abigail Elizabeth Braiman ‡ John Theodore Brakatselos Gregory Jonathan Brandt Jennifer Megan Brant David Benjamin Braun Kimberly Anne Brazier Samuel Theodore Bresnick ‡ Victoria Ann Briody Emma McAllen Brody * Kira Anne Bromwich * Φ Chesley Dalton Brooks Andrew Bearden Brown Andrew John Brown Ashley Lynn Brown Victoria Elizabeth Brown Margaret Brigham Browning ‡

Matthew David Brundage *‡ Jarret Jonn-Albert Bryan Raquel Marisol Bryant Kelly Barbara Buckley Gabrielle Bufrem Victoria Catherine Buhr Abigail Catherine Bunting Maria Dolores Burgos Christopher Michael Burke Georgiy Burkovskiy Marissa Elizabeth Bych Anna Hyunah Byon Lais Paola Cabrera ‡ Cassius Marcellus Cade V Vivien Perkins Caetano Celeste Nicole Cahn Abigail Louise Cain $^{*}\Phi$ Katherine Claire Caine Lucinda Caldwell Elizabeth Joyce Callas Ian Benjamin Callender ‡ Deniz Cam Zakary Adam Campbell Nia Danielle Campinha-Bacote Spencer Philip Caplan Amy Rose Carle Cassandra Mary Carothers Julia Stanton Carrellas Rebecca Michal Carrol Chandler Clay Carter Kevin Patrick Carty ‡ Jennifer Ellen Casey Wendy Anel Castillo Walter Harry Caulfield IV Shelby Leah Centofanti *‡ Kyu Yong Cha Harrison Reed Chad Alisa Chalerychit Audrey Chang Gregory McGuire Chatzinoff Trista Nicole Chavez Eric Liangde Chen * $\Phi\Sigma$ Ingrid Chuen-Neng Chen Kevin Yan Chen Lingyu Chen Michelle Crystal Chen ‡ Susan Morgan Barbara Chen ‡ Tian Chen Lauren H. Cheng Marcus Mingshao Cheng Abeba Teferi Cherinet Jessica Lauren Cherness Michael D. Chernin * Benjamin Drosnin Chesler Lauren Nicole Cheung Tsun Yiu Edward Cheung Andrea Christine Chiang ‡ Lauren Elizabeth Childress ‡ Andrea Terrie Chin Audrey Yongju Cho ‡ David Emmett Chodakewitz Sue Jung Choe Christina Young Choi Kristy Hyunsoo Choi Daniel Choo Clavton Elizabeth Christus Beatrix Ping Chu *‡¢ Augusta Ballou Clarke Edward Arellano Cleofe

Caryn Brianna Christianna Cobb ‡Σ Nicholas Morrison Codrea Bryna Peebles Cofrin-Shaw *‡Φ Gadi Cohen Jacob Maximillian Cohen * Jonathan Benjamin Cohen Austin Kristopher Cole ‡ Kerri Leigh Colfer Lauren Eleanor Colwell * ${}^{*}\Phi$ Jeffrey Scott Compton Melissa Peyton Conant Rosa Elinor Congdon ‡ Gerianne Proulx Connell Σ Kathryn Ann Conner Jason Hathaway Connor Rafael Eduardo Contreras * Alexandra Tzimopoulos Conway ‡ William Wilds Austin Conway Eliza Justine Coogan * Daniel David Louis Coppersmith $\ddagger \Sigma$ Kendra Lysandra Cornejo-Munoz ‡ Gabriella Rose Corvese *‡ Mary J. Costa ‡ Elizabeth Diane Cox Kalena Janelle Crafton ‡ Caleb Cragle Evan Alexandra MacGregor Penne Cranston Φ Briel L. Crespi Brienna Malia-Ka'anani Crimmins Jamila Rasheed Crossman Josue Francisco Crowther ‡ Andres Gustavo Cruz Kayla Renee Cruz Trevor Devlin Culhane ‡ Katherine Elizabeth Cusumano *‡ Stefan Reiss Dabroski Tyler Cameron Daelemans * Sophia Madride Dalce Catherine Tuyet Mai Dang ‡ Huy Gia Dao . Supriya Das Ryan Mitchell Davenport Samuel Asher Davidoff-Gore ‡ Alexander James Davies *Φ Christina Noelle Davis Elizabeth Ann Davis ‡ Kathleen Yukiko Davis ‡ Lawrence Antonio Davis Jr. Sarah Day Sarabia Dayon ‡ Nicholas Ryan Deaver Joseph Tito de Concilys Christopher Robert Dederick * Simon Paul de Jesus Rodrigues Daniel James Delaney Elizabeth Ivoynne Del Castillo Sage William deLisser Jordan Nicole DeLoach ‡ Charlotte Delpit Hacke Michael Zhiyuan Deng * Φ Nathaniel McCullough Dennett *‡ Matthew Paul DeRenzi

Shyam Ishvar Desai *‡Σ Max Aaron Deutsch * Φ Eliza Ann Dexter Cohen ‡ Alyssa Catherine DiBona Faith Evelyn Dees Dickerson Baxter Lawrence DiFabrizio ‡ Ana Nicole DiPrete Olivia Elizabeth DiPrete Joseph David DiZoglio Jr. ‡ Mary Doerr . Rafael Donatti Alves Maia Martin Alexander Donoyan Matthew George Dorros Michael Anthony D'Ortenzio Jr. *Φ Steven William Dowd Phoebe Frances Draper Alex L. Drechsler Φ Abraham Ephraim Dube Colin Peter Duffy Eleanor Chandler Duke Hannah Daniels Duncan *‡ Hannah Faith Duron *‡ Nicholas Masao Wong Ebisu Isabelle Nicole Edwards * Leah Anne Eickhoff ‡ Patricia Edet Ekpo *‡ Jo'Nella Queen Ellerbe Zakia Michelle Elliott Katherine Victoria Elliott-Moskwa Brienne Sarah Ellis *‡ Gregory Isaac Ellner Anneke Jo Elmhirst Dara Alexandrea Emery Guo Jin Daryl Eng *‡Φ Amanda Claire Engelhardt Zakaria Delwin Enzminger * Dominic Ranz Ebarle Errazo Hannah Denton Estlund Alexander Kiehner Eve Joshua Gray Ezickson Nicholas Danforth Fair Jessica Marie Faraj *‡Σ Christopher Jason Farrow Perry Jacobs Feldman Claudine Gisele Fernandez * William Bowie Fesperman * Daniel Pravit Fethke ‡ Zoe Mulvey Fieldsteel ‡ Evan Jeffrey Finkle ‡ Shane Amir Fischbach * Σ Cody Rand Fitzgerald *‡Φ Edward John Fitzpatrick IV Claire Covne Flanagan Daniella Flores Alvarez Daniel D. Flowers Sophie Carol Flynn Eric Alexander Foreman Nicholas Joseph Fornaca Skylar Cameron Fox Noah Harrison Fradin Natasha Simone Freeman Alexander Herrlinger Friedland Kathryn Anne Friedlander Casev David Friedman Edward Samuel Friedman *‡Φ Oliver Brett Friedman Emily Kaufman Fuller

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- ‡ honors in concentration
- $\Phi\,$ Phi Beta Kappa (elected senior year)
- $\varphi\,$ Phi Beta Kappa (elected junior year) $\Sigma\,$ Sigma Xi
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Simon Carlo Hunegs Carmen Hung ‡ Taylin Im Zachary Ross Ingber *‡Φ Dillon James Ingham Samantha Isman ‡ Meiling Imani Jabbaar Aasha J. Jackson ‡ Timothy Samuel Jacob Michaela Evelina Jacobs * $\Phi\Sigma$ Hillary Erica Jacobson Ryan A. Jacobson Rafael Harpo Marchand Jaeger Erin McKinsey James Katherine Anne James ‡ Natoya Rebbie James William Sandler Janover * ${}^{*}{}^{\oplus}\Phi$ Arun Janssens Leonardo Karl Johansson-Lebron ‡ James Lion Johnson Lucas Pierre Johnson Nathan Albert Johnson * Σ Taylor Nicole Johnson William Samuel Johnson *Φ Abigail Huntress Jones Dane Iones Gillian Maris Jones *‡ Marguerite McCray Joutz Ross Tyler Julian Alexander Gregory Anders Jusdanis *‡Φ Emily Lindsay Kabalkin Alexa Diane Kaczmarski Ifeoma Camille Kamalu Tsuzuki Kanaoka Sarah Michelle Kandath Lee-Sien Kao *‡Φ Alexander Solly Kaplan Andrew Nathaniel Kaplan *‡ Max Mattleman Kaplan * Φ Bayram Kaan Kariksiz Katherine Emma Kartheiser $* \ddagger \Phi \Sigma$ Karoliina Kase ‡ Samuel Miller Kase Olivia Jane Kasmin ‡ Celine Jade Katzman ‡ Mira Bernstein Kaufman ‡ Aimie D. Kawai Damon Chizuru Kawamoto *Σ Krishnanand Kelkar Erin Malaika Kelley Louisa Dorothy Kellogg ‡ Amanda Paige Kelly ‡ Julia Louise Kelly Kevin Joseph Patrick Kelly Adam R. Kemerer Margot Olivia Kempczynski *‡ Chloe Chantelle Kempf Σ Kaitlyn Carly Keon Hannah Margaret Kerman $\ddagger \Sigma$ Abdullah Yahia Khalayleh Faiz Ahmed Khan Salaar Rehman Khan ‡Σ Anisa Silvia Khanmohamed Zein Samir Khleif

Erin Kelly Kilduff

Carol JiEun Kim *Φ

Christopher Felix Kim *‡ Clare Kim * Dong Joo Kim E-Soo Kim HyunKyu Kim * Jungkeun Kim Sally Gunhee Kim ‡ Young Min Kim ‡ Hannah J. Kimmel Anna Kate Kingston ‡ Hayley Ann Kirman Alison Rose Kirsch *Φ Alex Robert Kleiman Annika Jill Klein ‡ Emily Marie Klein Charles Blane Kleinrichert Jr. Galina Vladimirovna Klimova Joshua Shayne Knight Matthew Calvin Joseph Knowlton Bennett William Knox *‡ Milan Robert Koerner-Safrata Elizabeth Rhee-Young Koh Alexandra Sofia Kordas Zachary Alexander Korol-Gold ‡ Jules Kiril Kortenhorst ‡ Haley Robinson Kossek * Φ Rajan Prakash Kothari Ken Cai Kowalski ‡ Alexander William Krotow Sophia Elizabeth Krugman Arjun Mehra Kukreja Laura Marie Kulowski Tomonobu Kumahira ‡ Gregory Will Kurtzman *‡ Seyda Kutlu Michelle Long Ting Kwok Meygan J. Lackey Aleyna Elizabeth La Croix Alain Luigi Laforest Ho Ching Myron Lam ‡ Matthew Cheuk Lam Massimo Adrian Lamacchia Ekaterina Dafni Lambadariou Sasha Ellora Land ‡ Tyler Matthew Landis Taylor Ashley Lanzet Iustin Michael Lardani Josette Helen Larochelle Daniel Edward Larson Tanner Edwin Larson Jacob Myles Laser Christopher Winslow Latham * Nicholas George Lawley Clyde Max Lawrence Gae E. Leanza Jacob David Leavitt Paul Lebot Lauren Anne Ledingham $\ddagger \Sigma$ Ariana Gharib Lee David Isaac Lee ‡ Justina Jinsook Lee Kaden Kyungwon Lee Kayla Marie Lee Matthew Hyundohng Lee Nicole Francis Lee ‡ Tae Gone Lee * Hunter Aymer Leeming Victoria Kathryne Leonard *

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Stone Mak Ng Natasha Kristine Nguyen ‡ Giulia Costanza Nicita Margaret Elizabeth Nickens Margaret McCrann Nickerson *Φ Brittany L. Nieves Evelyn Karina Nimaja Morales Gregory Schuster Nissan *‡ Arjun R. Nukal Alexandra Victoria Nuttbrown Perry Ellen Oasis Keil Matthew Rose Oberlander ‡ Matthew Thomas O'Brien Meghan Rose O'Brien Patrick Gaughan O'Callahan *‡Φ Angie Nathaly Ocampo *‡ Richard Dillon O'Carroll Oyeleye O. Odewunmi Daniel Y. O'Donnell ‡ Meghan Hanlon O'Donnell Eli Madison Okun *φ Vitor F. Oliveira ‡ Elizabeth Lanier Olsson Patrick Maximino O'Neill Hanna Gray Organschi Rachel Courtney Ossip ‡ Maria Eugenia Pabon *‡ Samuel Piero Paci Madeline Anne Page Jennifer Guo Pan Vanndy Pan Jane J. Park Kathryn Soonwoo Park *‡ Sora Myong Park * ϕ Gordon Lancaster Parker Sarah Elizabeth Parker *‡ Φ Alexander Brett Pascal Σ Madeleine Rose Pasquariello Σ Timothy Rode Patchen Ilkania Mercedes Paulino Cenit Andreas Constantine Pavlou Σ Bryan Bruce Payton Ariel Sydney Peak Theo Akira Peck-Suzuki ‡ Jessica Janet Perales Sarah Ellen Perelman *‡
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‡ Φ Thomas John Pesce Cassandra Ferchaud Pestana Christian Lydgate Petroske ‡ Huyen Thi Thanh Phan William McKinley Phillips IV Antonia Cravath Piccone ‡ Lauren Rollins Pierce Danielle Hanna Pietro *‡ Φ Christopher Michael Piette Camen Rogue Piho Miguel Pimentel Nicholas Alexander Piroli Elias Samuel Pitegoff ‡ Dylan Charles Platt Anna Rose Plumlee **Emory Dominique Polley** Anna Wai Poon ‡

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Anna Rotman ‡ Elizabeth Heather Ruben Allison SookHee Rubenstein Zachary Isaac Rubin *‡Φ Ezra Jonathan Rudman Whitney Dutcher Ruhlin Christine Glatz Rush Katie Ann Rushton Emma Blue Russo Xavier Farrow Russo Judge Alphonsus Ryan Adriana Saavedra Gizem Sabanci Kelly Ilene Sabatino Alon Michael Sacks Joseph Kaufman Sacks Nadia Ambreen Saeed * Caroline Augusta Saine * \$\phi\$ Connor Philip Sakwa Camila Patricia Salazar Alexandra Sarita Salinas Elizabeth Zopfi Saltonstall Nicole Kimberly Salvador Shoshana Rivka Salzberg * Eleni Samara Alexander John Sammon Karina Sanchez Lopez Zeve Nori Sanderson Mary Rose Sandza Jacob Raphael Sapon * Lara Yvette Savenije Siddharth Saxena Sarah R. Schade ‡ Laura Arimond Scheff *‡ Robert P. Schenck Madeline Cherie Schlissel Ionathan David Schmidt Matthew Steven Schmitz Jakob F. Schneider Jordan Andrew Schochet Corinne Frost Schoeller Scott M. Schubert Thomas Peter Schubert *#Φ Emilie Dowd Schurenberg Dana Jae Schwartz Erin Garfield Schwartz *‡ Φ Alexandra Argabright Seclow Jacob Alexander Seib Anisha Kriva Sekar Ignacio Javier Semerene Barreiro ‡ Sophia Alexis Sepulveda ‡ Daniela Serna Ishaan Sethi Julia Jenny Suzanne Sevy Chase Shaffar-Roggeveen ‡ Priyanka A. Shah Mina Rachel Shakarshy ‡ Qianshun Shao Ankita Sharma Supreeti Sharma Timothy Sharng David Gordon Sheinfeld Alexandria J. Sheng Pierce Hunter Shipp Anne Margaret Sholar ‡ Tarek Ikram Shoukri Sarah Huang Shrader Uday Shriram

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* magna cum laude

- ‡ honors in concentration
- Φ Phi Beta Kappa (elected senior year)
- φ Phi Beta Kappa (elected junior year)
- Σ Sigma Xi T Tau Beta Pi
- I Tau Deta FI

Evan Michael Sweren William Coughlin Swindell Valerie Jill Sydnor * $\pm\Sigma$ Liliana Andrea Sykes Philip Charles Tabak Nicolas Girard Talbott Hazel Su-Yin Tan ‡ Jian Shen Tan Zachary Gavin Tanenbaum Karin Nicola Jiahui Tang Natalie Tarr ‡ Alexandra Edison Taylor Daniel Cooper Taylor Julia G. Telzak ‡ Margaret Ayers Tennis *‡Φ Joseph Felix Tettey ‡ Keith Robert Thomas *‡Φ Leigh Rachel Thomas * Christopher Michael Thompson *‡Φ Heather Anne Thompson Julia Pryde Thompson Zoë Leigh Thompson Margaret Marie Thorsen *‡ Dorothy St. Claire Thurston ‡ Georgia Faye Tollin Robert Brent Tomlinson Gabrielle K. Tomson Adam Jerome Toobin Danielle Elizabeth Torres Melitzi Mariel Torres Samuel James Torres Philip Anthony Webb Trammell *‡ Alexander Hung Tran Jessica L. Tran Phuong Linh Tran Vu ‡ Taylor Daniel Travassos-Lomba Spencer Townsend Traver John Griffin Traynor Sarah Elizabeth Tropp *‡¢ Edle Astrup Tschudi ‡ Philip Anthony Tsoukanov Rafael Donato Tua-Caraccia Henry Carleton Richard Tufnell Kayla Marie Tyrrell Karla Kokoa Tytus Nimita Devi Uberoi Takahisa Uemura ‡ Juliana Marie Unanue Banuchi William David Underwood Jr. *‡Ф Jay Upadhyay *Φ Nathalie Pierrepont Urry Scott Bradley German Usatorres Jackson Alfred Usher Thaya Uthayophas *‡Φ Mark Anthony Valdez Aaron Dobrow Vale * \$ Margaret Rose Valerio Maryl Teresa Vanden Bos * William Medearis Van Deren Denise Yi-Ling Van Der Goot Katrina Dreessen Van Laan Joseph William Van Wye Soleil Vaughn Simran Nirmal Vazirani Alan Vazquez

Leila Nirvan Veerasamy

Jessica Michael Velasquez ‡

Jeffrey M. Velez Lauren Francesca Vella Julia Elizabeth Verbrugge * Victor Hugo Vergil Heather Lynn Vermillion Clemente Benjamin Vila Mark Abueg Villanueva Maansi Vohra Huong Ngoc Vong Jonathan Toan-Thien Vu Lewis Waide Emily Rose Waitt Dockery Keith Walker Catherine Stuart Wallace *‡ Φ Jiayi Wang Jing Wang *‡φΣ **Rigzom Wangchuk** Alexander Scott Warstadt *‡φΣ Anika Stephenson Wasserman Lauren Phelps Waterbury Adam Nathan Waters *‡¢ Michelle Diane Watt William David Watterson ‡ Jacob Philip Weber *‡¢ William Randolph Weber * Nicholas Wight Weeden Ioshua David Weinstein Michael Ian Weinstein ‡ Anders Chase Weiss Sarah Anna Weiss ‡ Ksenia Maria Weisz Drew Elizabeth Weitman *‡ Elana Michelle Wenger Marlees Rachel West Mina Whangbo Alexandra LaBonte White Hannah Elizabeth White Jonathan Wilcox White Lydia Todd Whiteford Zachary David Whitman * Φ Hannah Kunlin Wichmann ‡ Kevin Kahng Wiesner Christopher Michael Wilbur Lauren Cristina Williams Revad Mohammed Williams Taylor Brooke Williams ‡ Susannah Leigh Williamson ‡ Shelby Katherine Wilson ‡ Htut Arkar Win Sara Lynn Winnick * Allison Marie Wong Christopher Timothy Wong * ϕ Misa Janae Wong Shannon Cheuk-Ying Wong Elizabeth Sarah Emma Woodward *Φ Jerold Taylor Wright III Kenya Lynise Wright Lytisha Lynn Wyatt Talia Maryam Olayan Xefos Zhuofei Xu Koji Luke Yamamoto Mallory Ann Yant Kaiyi Ye Alexander Franklin Yih * Longji Steven Yiljep Thomas C. Yim Isabelle Joan Yisak Hyun Seung Yoo

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- ‡ honors in concentration
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DOCTOR OF PHILOSOPHY

Alexei Sisulu Abrahams **Economics** Essays in Urban Development Economics Angela S. Allan English Postmodern Realism and the Neoliberal Imagination Eduardo de Brito Almeida Engineering Revisiting Normalized Cross-Correlation for Accurate Camera Pose Estimation and Accurate Real-Time Multiple View Stereo Theresa Christine Anderson Mathematics A Framework for Calderón-Zygmund Singular Integral Operators on Spaces of Homogeneous Type

Sarah Hart Ashby Portuguese and Brazilian Studies Striking a Balance: An Analysis of Portugal's European and Lusophone Affiliations and Their Effect on the Evolution of Portuguese National Narratives Valentine Florence Balguerie French Studies Démasquer la Femme au XVIIème Siècle: Remise en Cause de la Personne Féminine dans les Nouvelles Historiques Eyal Bar-Kochba Engineering Three-Dimensional Kinematic Measurements of Nonlinear Deformations in Cellular Biology James Christopher Beaver English Material Encounters of the English Renaissance Timothy Edward Bellay Neuroscience Ongoing Dynamics of Layer II/III Pyramidal Neurons Organize as Neuronal Avalanches Nicholas W. Bellono Molecular Pharmacology and Physiology Ionic Signaling in Pigmentation Thomas David Belulovich Mathematics Absolute Homotopy Limits Heather Lynn Bennett Molecular Biology, Cell Biology, and Biochemistry Loss of Notch or JNK Signaling Results in FOXO Dependent Compensatory Sleep in C. elegans Sarah Elizabeth Bernthal French Studies Last Words on the Scaffold: "Condemned" Speech as Romantic Revolt Bryan Betancur Hispanic Studies Fathers and Daughters in Early Modern Spanish Theater Alison Marie Biercevicz **Biomedical Engineering** A Translational Method to Quantify Anterior Cruciate Ligament Healing Using Magnetic Resonance Imaging for Research and Clinical Applications Octavian Biris Engineering Compression of 2-D and 3-D Dynamic Scenes

Andrew Stephen Blaeser Physics Optical Interrogation of the Spontaneous Dynamics of Prefrontal Cortical Networks Barbara A. Blythe Classics Petronius' Satyrica: A Novel of Mystic Initiation Adam S. Boss History Outsiders, Crisis, and the Remaking of Urban Community in Medieval France 1348-1500 Aron Maurice Buffen Earth, Environmental and Planetary Sciences On the Isotopic Composition of Nitrate in Andean and Antarctic Ice Cores as a Tracer of Climate and Atmospheric Chemistry Through Time Mark Jonathan Buller Computer Science Human Thermal-Work Strain Performance Optimization from Wearable Physiological Sensors Emily Button-Kambic Anthropology Navigating Difference: The Archaeology of Identities in an American Whaling Port Rocio P. Caballero-Gill Earth, Environmental and Planetary Sciences Reconstructing Orbital Scale Pliocene Paleoclimate from Deep Ocean Sediments: A New View from the Southern Hemisphere Irina Calciu Computer Science Concurrent Algorithms for Emerging Hardware Platforms Trần Thiên Camly Chemistry Chemistry of Iron-Sulfur Clusters and Their Role in Crosstalk Between Nitric Oxide and Hydrogen Sulfide Ariel Lorraine Camp Ecology and Evolutionary Biology Role of Axial Muscles in Powering the Suction Feeding of Centrarchid Fishes Jennifer Caitlin Cassidy Political Science See Jane Get Appointed: Gender, Representation, and Power in the American Federal Bureaucracy Clarissa J. Ceglio American Studies A Cultural Arsenal for Democracy: The War Work of

U.S. Museums, 1939-1946

I. Chen *Economics* Essays in Experimental Economics Jorn A. Cheney Ecology and Evolutionary Biology Flying with Membrane Wings: How Bats Shape Their Wings with Their Hindlimbs, Skin Mechanics, and Wing Membrane Muscles Xinxin Cheng Chemistry Ultrafast Charge Localization and Delocalization in Diamines Anda M. Chirila Molecular Pharmacology and Physiology Long-Term Potentiation of Glycinergic Synapses Triggered by Interleukin-1β Heyrim Cho Applied Mathematics High-Dimensional Response-Excitation PDF Methods for Uncertainty Quantification and Stochastic Modeling Waihong Chung Pathobiology Molecular Mechanisms of Hepatocarcinogenesis in ATX/ IRS Transgenic Mice Jeffrey Alexander Pierce Cockburn **Cognitive Science** What You Should Do (and What You Really Do) When You Don't Know What to Do: Information Seeking During Value Based Decision Making Corey Lynn Compton Chemistry A Multidiciplinary Approach for the Development of Novel Therapeutic Agents for the Treatment of Bacterial Infections Jeffrey Paul Covington English Security Breach: British Modernism and the Violence of Secrets Sarah Craft Archaeology and the Ancient World Pilgrimage Pragmatics: Travel Infrastructure, Movement, and Connectivity in Late Roman and Early Byzantine Cilicia Megan Ashley Creighton Engineering Implications of Surface Functionalization and Geometry on the Applications of Carbon Nanomaterial Colloids

Sarah Corman Crosby Ecology and Evolutionary Biology Salt Marshes in a Changing Climate Sean Phillip Curran Biomedical Engineering The Effects of ABCG2 Transporter in Three Dimensions Tianran Dai Economics Fertility Policies and Human Capital Investment in China Valery Ann Danilack Epidemiology Understanding the Effect of Labor Induction on the Risk of Cesarean Delivery Dibakar Datta Engineering Topics in Nanomechanics, Energy Storage Systems, and **Emerging Nanomaterials** Justin Anthony DeBrabant Computer Science Anti-Caching and the Use of Non-Volatile Memory in **OLTP** Databases Zeynep Demiragli Physics Search for New Physics in Final States with Low Transverse Energy Photon and Missing Transverse Energy in Proton-Proton Collisions at $\sqrt{s} = 8 \text{ TeV}$ Deepak Dhingra Earth, Environmental and Planetary Sciences Integrated Mineralogy and High Resolution Geologic Context of Lunar Impact Melt Deposits: Implications for Crustal Diversity and the Impact Cratering Process Scott Jared DiGiulio Classics Aulus Gellius, the Noctes Atticae, and the Literary Logic of Miscellany under the High Roman Empire Yu-Ting Liu Dingle Biomedical Engineering In Vitro Modeling of the Central Nervous System: Towards Optimized Cell-Based Therapies Christopher M. Dodson Engineering Near-Infrared Magnetic **Dipole Emission** Calculating, Quantifying, and Resolving Dipolar Emission in Lanthanide Ions

Nicholas James Dygert Earth, Environmental and **Planetary Sciences** Experimental and Field Constraints on the Physicochemical Evolution of the Lunar and Terrestrial Mantles Alexandra Mareike Effenberger Economics Essays on the Effects of Health Policies on Labor Supply and Health Care Utilization Dianne Louise Escalante Economics Estimating the Link Between Industry Tenure and Wages Katherine Diane Etter Health Services Research The Effect of Device Characteristics on the Rate of Total Hip Replacement Revisions in the Veterans Health Administration Rebecca Stephens Falcasantos **Religious Studies** "A Land Cleansed of Heretics" Cult Practice and Contestation in the Christianization of Late Antique Constantinople Daniel Lawson Felch Neuroscience Cross-Modal Interactions in the Optic Tectum of Xenopus laevis Tadpoles Martin Fiszbein Economics Economic Development in Historical Perspective Jessica Fitzpatrick-Collins Chemistry The Reactivity of Iron Nitrosyl Complexes and Insight into the Repair of Nitric Oxide-Modified Iron-Sulfur Proteins Patrick William Flanigan Engineering Plasmonic Interferometry in Systems with Single or Multiple Scatterers: Experiments, Simulations, and Applications Andrea Elizabeth Flores Anthropology Succeeders: Latino Youth Learning to Belong Patricia Michelle Fogerson Neuroscience Output Streams of Intrinsically Photosensitive Ganglion Cells: Distinct Types Supply Different Visual and Limbic Networks Alessandra Franco Italian Studies The Conservatorio di Santa Caterina della Rosa: Sheltering and Educating Women in Early Modern Rome

Brent Akio Fujioka American Studies Four-Color Creatures: Japanese Monstrosity in American Comic Books, Manga, and Popular Culture, 1938-1970 Jonathan C. Gentry History Sound Bodies: Biopolitics in German Musical Culture, 1850-1910 Nicole Torian Gercke Italian Studies Representations of Hybridity: Science, *Techne* and the Human in the Works of Alberto Savinio Amanda Getsinger Earth, Environmental and **Planetary Sciences** The Rheology of Amphibolite Soumya Ghosh **Computer Science** Bayesian Nonparametric Discovery of Layers and Parts from Scenes and Objects John Kimbell Golden **Physics** Cluster Polylogarithms and Scattering Amplitudes Elena Lorence Gonzales American Studies Museums Working for Social Justice: Resonance and Wonder Timothy Andrew Goudge Earth, Environmental and Planetary Sciences Paleolakes on Mars: Insights into Timing, Morphology, and Mineralogy Rebecca Naomi Greenberger Earth, Environmental and **Planetary Sciences** High Temperature Aqueous Alteration and Diagenesis: Unexpected Insights with Imaging Spectroscopy from Microns to Meters Yuzhen Guan Egyptology and Assyriology The Treatment of Eclipses in Early Chinese Astral Sciences Jie Guang Chemistry Synergistic Effect of X-Ray Crystallography and Solution NMR on Structural Characterization of Organolithium Complexes Joshua Morse Guilford Modern Culture and Media Homeless Movies: The Redemptive Project of the New American Cinema

Eni Halilaj Biomedical Engineering Image-Based Analysis of Thumb Carpometacarpal Joint Biomechanics in Health and Early Osteoarthritis Kirk Donald Haltaufderhyde Molecular Pharmacology and Physiology Transcriptomic Investigation of Human Pigmentation Eunsun Celeste Han History All Roads Lead to San Francisco: Black Californian Networks of Community and the Struggle for Equality, 1849-1877 Emily Holladay Handlin *History of Art and Architecture* Moving Beyond Vision: Eadweard Muybridge in Philadelphia Hunter Reed Hargraves Modern Culture and Media Viscerally Uncomfortable TV: Affective Spectatorship and Televisual Neoliberalism David Neil Hauser Neuroscience Studies on the Parkinson's Disease Associated Protein DJ-1 in the Context of Mitochondrial DNA Damage Christopher J. Havlin Earth, Environmental and **Planetary Sciences** Dynamics of Melt-Lithosphere Interaction Ynes Antonios Helou Molecular Pharmacology and Physiology Dissection of T Cell Receptor-Mediated Signaling Pathways Using Quantitative Phosphoproteomics Scott Herrick Neuroscience Co-expression of Chemoreceptors in the Murine Olfactory System Wade Michael Hindes Mathematics Galois Uniformity in Arithmetic Dynamics Kathryn Elizabeth Howley Egyptology and Assyriology The Royal Pyramid Tombs of Nuri Cultural Interaction between Nubia and Egypt in the Middle Napatan Period Yara Jarallah Sociology Marriage Patterns and Family Formation in Comparative Perspective: The Case of Two

Extremes from the Middle East

Qinqin Ji Chemistry Quantitative Phosphoproteomic Analysis to Unravel T Cell Signaling Pathways Mingming Jiang Physics Reusable Electrostatic Self-Assembly of Quantum Emitter Nanoparticles Wenyan Jiang Engineering Processing and Thermoelectric Properties of Thick Film Based Oxide Composite Materials Courtney Michele Johnson Pathobiology Molecular Mechanisms Underlying the Human Neutrophil Response to Fungal Beta-Glucan in the Context of the Extracellular Matrix Protein Fibronectin Dane Michael Johnson **Applied Mathematics** Moderate Deviations and Subsolution-Based Importance Sampling for Recursive Stochastic Algorithms Daniel Christopher Laidlaw Johnson Applied Mathematics Combinatorial and Geometric Structure in the Self-Assembly of Polyhedra Stephen Knox Jones Jr. Molecular Biology, Cell Biology, and Biochemistry Pheromone Signaling, Mating and Biofilm Formation in Candida Species Anja Jovic-Humphrey *Comparative Literature* Black and Balkan: A Comparison of Caribbean, African, African-American and Balkan History, Theory and Art Ilyong Jung Physics Investigations of Swimming Microorganisms under Variable Apparent Weight Robert E. Kambic *Ecology and Evolutionary* Biology Hind Limb Joint Function in the Helmeted Guineafowl Anna Wilson Kane Neuroscience The Role of Gli3 in Establishment and Maintenance of the Postnatal Neurogenic Niche

Sean Michael Keck English Reverb: American Literature and Sonic Media, 1876-1952 James Alan Kelley Computer Science Secure Data Compression and Error Correcting Codes for Networks and Cloud Storage Philipp Maximilian Ketz Economics Inference When the True Parameter Vector Is Near or at the Boundary of the Parameter Space Changho Kim Applied Mathematics Analysis and Simulation of Molecular Systems: Memory Function Approach and Uncertainty Quantification Peter Taylor Klein Sociology The Struggle for Voice in Brazil's Democratic **Development State:** Participation, Protest, and the Belo Monte Hydroelectric Facility Bryan Vincent Knapp History "The Biggest Business in the World": The Nestle Boycott and the Global Development of Infants, Nations and Economies, 1968-1988 Erin Katherine Krafft Slavic Studies Reading Revolution in Russian Women's Writing: Radical Theories, Practical Action, and Bodies at Work Jingguo Lai Mathematics Two Weight Problems and Bellman Functions on Filtered **Probability Spaces** Christine Ricalo Langlois Molecular Biology, Cell Biology, and Biochemistry Insights into Prion Biology: Mechanistic Contributions and Phenotypic Consequences of Oligopeptide Repeats Peter Hong Ung Lee Pathobiology Skeletal Muscle Atrophy in **Bioengineered Skeletal Muscle:** A New Model System Alexander Rivinus Leydon Molecular Biology, Cell Biology, and Biochemistry Three MYB Transcription Factors Coordinate Expression of an Array of Secreted Proteins that Promote Pollen Tube Identity and Reproductive Cell Signaling

Dongfang Li Physics Quantifying and Controlling the Magnetic Dipole Emission of Erbium at Telecom Wavelengths Weili Li Chemistrv Photoelectron Spectroscopy Investigation of Boron and Boride Clusters: The Foundation of New Boron Nanostructures David Chang Yi Liao English Dictators: Ethnic American Narrative and the Strongman Genre Thayse Leal Lima Portuguese and Brazilian Studies Latino-Americanizando o Brasil: Intercâmbios Intelectuais e a Transnacionalização da Literatura Brasileira Alexander J. Loosley Physics The Mechanics of Cell Motility and a Unifying Theory for Characterizing Directed Motion Michael Lopez Biostatistics Causal Inference for Multiple Treatments Xu Luo Physics Thermodynamic Studies of Phase Transitions and Emerging Orders in Unconventional Superconductors Ningning Ma **Mathematics** Tropicalization of the Dimer Model Qingqing Ma Chemistry Geodesic Theory and Inherent Dynamics of Hard Sphere Liquids Byron D. MacDougall Classics Gregory of Nazianzus and Christian Festival Rhetoric Alex Dale MacIntosh Chemistry Carbon Dioxide as a C1 Source: The Activation of Carbon Dioxide with Molybenum and Iron Complexes Karina Mascorro Italian Studies Experimental/Experiential Voices: Unheard Stories from the Afro-Italian Diaspora

Brandon Asher Mayer Engineering Duration Dependent Hidden Markov Models and Change Point Geometry for Video Surveillance Anne Isabel McDonald Classics Plutarch and the Philosophical Dialogue Angus James McMullen Physics Translocations of Stiff Filamentous Viruses through Solid-State Nanopores Michele J. Mericle History Expanding the Realm of the Possible: Gender and Crypto-Judaism in Seventeenth-Century New Spain Wang Miao Physics Nonlinear Transport in Solid-State Nanopores Ryan James Michney Physics Quality-Selected Lensing Analysis of Galaxy Clusters in Subaru Telescope Fields Jadrian J Miles Computer Science A Multi-Scale Model of Brain White-Matter Structure and Its Fitting Method for Diffusion MRI Stephan Michael Moore *Computer Music and* Multimedia Diacousticon: Curation, Audience, and the Listening Machine Tara Lvnn Mulder Classics Fetal Actors, Female Bodies: Childbirth in the Roman Empire John Connor Mulligan English Romantic Experiment: The Second Scientific Revolution and Nineteenth-Century **English Literature** Dahlia Nadkarni Applied Mathematics The Incidental Parameter Problem in Network Analysis for Neural Spiking Data Kumud Nepal Engineering New Directions for Design-Space Exploration of Low-Power Hardware Accelerators Sarah Elizabeth Newman Anthropology Rethinking Refuse: A History of Maya Trash

James Edward Niemeyer Neuroscience The Effect of Natural Vision on Perception and V1 Neural Activity Andrew Thomas Lawrowycz Nixon **Applied Mathematics** On Numerical Models of Calcium-Induced Calcium Release Catalina Ocampo Londoño *Comparative Literature* Critical Fictions in Latin America Layla Kathleen Oesper Computer Science Computational Characterization of Heterogeneity and Rearrangements in Cancer Ronald Shem Odhiambo Okoth Chemistry Probing Carbohydrate -Carbohydrate Interactions (CCIs) Using End-Labeled Glycopolymers and the Determination of Deuterium Isotope Shifts (DIS) of Selected Methyl D-Glycosides in Methanol Christine C. Pemberton Chemistry Reaction Paths of Photoinduced Electrocyclic **Ring-Opening:** 1,3-Cyclohexadiene and a-Terpinene Paris Georgios Perdikaris Applied Mathematics Data-Driven Parallel Scientific Computing: Multi-Fidelity Information Fusion Algorithms and Applications to Physical and Biological Systems Laura Ann Perille History "A Mirror to Turke": "Turks" and the Making of Early Modern England Mary Elizabeth Peterson Earth, Environmental and Planetary Sciences Geochemistry of the Galápagos Archipelago: Unraveling Deep Mantle Signatures from the Influence of Shallow Level Processes Zachary Allen Piazza Chemistry Determination of the Geometric Structures of Anionic Boron Clusters via Cartesian Walking and the Emergence of Competing Global Minima as a Ubiquitous Phenomenon

Allison Marly Porman Molecular Biology, Cell Biology, and Biochemistry Identification and Regulation of White-Opaque Phenotypic Switching in Candida tropicalis Michael Powers German Studies Clouds: Walter Benjamin and the Rhetoric of the Image Tabb Christopher Prissel Earth, Environmental and **Planetary Sciences** Ancient Phases of Our Moon: Application of Experimental and Igneous Petrology to the Formation History of the Lunar Highlands MG-Suite Wanming Qi Physics Statistical Approaches to Two-Dimensional Turbulence Lauren Elizabeth Quattrochi Molecular Pharmacology and Physiology The M6 Cell: A Small-Field Bistratified Photosensitive Ganglion Cell Anne Meredith Rabe Classics Innovation and Invective in Cicero's Violent Metaphors Jason J. Ramirez Psychology Alcohol Cue Exposure Effects on Craving and Attentional Bias Among Underage Drinkers Lindsay Schakenbach Regele History Manufacturing Advantage: War, the State, and the Origins of American Industry, 1790-1840 Kevin Wilson Rio Cognitive Science Mapping the Visual Coupling between Neighbors in Real and Virtual Crowds Michael D. Rodríguez-Muñiz Sociology Temporal Politics of the Future: National Latino Civil Rights Advocacy, Demographic Statistics, and the "Browning" of America Michela Ronzani Italian Studies "Melodramma," Market and Modernity: Opera in Late Nineteenth-Century Italy John Matthew Rosenberg History Spear Carriers for Empire: The Alliance for American Militarism after the Vietnam War, 1967-1988

Samantha R. Rosenthal Epidemiology Social and Behavioral Risk during the Transition to Adulthood **Evangelos** Routis Mathematics Weighted Compactifications of Configuration Spaces Michael Ernest Sawyer Africana Studies Homo Liminalis: The Tears of the Caterpillar Elizabeth Ellice Searcy History The Subconscious Mind in America, 1880-1917 Katerina Gonzalez Seligmann *Comparative Literature* Constructing the Caribbean: Regional Discourse and Literary Practice on the Edge of World War II Kaitlin Nicole Sidorsky Political Science One Way or Another? Understanding Women's Paths to Appointed and Elected Office Iazmín Sierra Political Science Partners at Home and Abroad: How Brazil Globalized State-Led Development Joseph Michael Silva *History of Art and Architecture* Thuscorum et Ligurum Securitati: Cosimo I de' Medici and the Visual Program for the Order of Saint Stephen in Pisa and Florence Tutanon Sinthuprasith **Physics** Search for New Physics in 8and 10-Jet Final States at $\sqrt{s} = 8$ TEV with the CMS Experiment Kelsey Mae Skodje Chemistry Dioxygen Reactivity and Nitric Oxide Donor Capabilities of Nitrogen-Ligated Dinitrosyl Iron Complexes Alexander Joel Smith Archaeology and the Ancient World Indigeneity and Colonial Response: The Metamorphoses of Balearic Culture in the Late Iron Age Eric Michael Sodomka **Computer Science** Prediction and Optimization Abstractions in Market Games

Altar Sorkaç Neuroscience A Survey of Notch Signaling Genes at the *C. elegans* Neuromuscular Junction Reveals Regulaton of GABAergic Synapses by the LIN-12 Notch Receptor Timothy L. Squires Economics The Impact of Access to Electricity on Education and Other Essays in Spatial Economics Akash Srivastava Molecular Biology, Cell Biology, and Biochemistry Transdifferentiation of Liver to Pancreas Arthur Ulrich Sugden Molecular Biology, Cell Biology, and Biochemistry Diverse Subtypes of Fast-Spiking Inhibitory Neurons in Neocortex Steven Zachary Swartz Molecular Biology, Cell Biology, and Biochemistry Germ Line and Somatic Cell Divergence in Animal Development Timothy David Syme Philosophy Everyday Life and the Demands of Justice Alexander Tarvo Computer Science Automated Performance Modeling of Multithreaded Programs Jill Caroline Thorson Cognitive Science The Development of Intonation and Information Structure: Perceptual and Productive Investigations Andrew Brent Tobolowsky **Religious Studies** The Sons of Jacob and the Sons of Herakles: Myth, Genealogy, and the Construction of Identity Anton V. Tokranov Engineering In Situ Investigations of Solid Electrolyte Interphase Formation and Properties in Lithium Ion Batteries Anika Marsha Toorie Pathobiology The Role of Hypothalamic Sirt1 in the Regulation of the Hypophysiotropic Adrenal and Thyroid Axes Jahn Ramon Torres Jove Engineering Adhesion in Hydrogel Contacts

Jennet Toyjanova Engineering The Effect of Confinement on Neutrophil Force Generation Minh-Hoang Tran **Mathematics** Weil-Étale Cohomology and Special Values of L-Functions of 1-Motives Colleen Marie Tripp American Studies Pacific Sensations: Seeing Yellow in Nineteenth-Century American Print Culture Julia Dawn Troche Egyptology and Assyriology Origins of Apotheosis in Ancient Egypt Alexandrina Tzanova Earth, Environmental and **Planetary Sciences** Linking Late Miocene-Pliocene Sea Surface Temperatures, **Terrestrial Biome Transitions** and Intensification of Glaciation Using Alkenone Paleothermometry Martin Ulirsch **Mathematics** Tropical Geometry of Logarithmic Schemes Láura Aguilar-Milano Vares Anthropology Keeping It All Together: Changing Perspectives on Marriage, Family, and Career among Older Italian Women Fabien Bertrand Paul Wagner Neuroscience Dynamics of Epileptic Seizure Transition Investigated with Intracortical Microelectrode Arrays and Optogenetic Neuromodulation Melissa Brietta Walsh Molecular Biology, Cell Biology, and Biochemistry The Role of Plastin in Motor Neuron Diseases and Identifying Genetic Modifiers of Spinal Muscular Atrophy Kristin Marie Webster Neuroscience Characterizing Neuronal and Cardiac Isoforms of Voltage-Gated Cav1.2 CACNA1C Calcium Channels Matthew Christopher Wellenbach Classics Choruses for Dionysus: Studies in the History of Dithyramb and Tragedy Thomas V. Wiecki Psychology Computational Psychiatry: Combining Multiple Levels of Analysis to Understand Brain

Disorders

Miel Mason Wilson American Studies At the Roots: Genealogy, Genetics, and Race in American Popular Culture Dale Alan Winter **Mathematics** Mixing Properties of Flows on Geometrically Finite Hyperbolic Manifolds Alexandra Elisabeth Witthoft Engineering Models of Neurovascular Coupling in the Brain Wei Pin Wong Mathematics Height Functions and the Specialization Map for Families of Elliptic Curves David Henderson Wood Ethnomusicology A Mixed-Methods Study to Affective Difference in the Old-Time Music Revival in Appalachian Virginia and North Carolina Lei Wu **Applied Mathematics** From Kinetic Theory to Fluid Mechanics: Viscous Surface Wave and Hydrodynamic Limit Sheng Xie Physics Numerical Studies of Self-Assembled Colloidal Membranes Hongwei Xu Chemistry Mechanistic Consideration of C-C Bond Transformations at **Cobalt Complexes** Kun Yang Pathobiology Investigating the Function of MiR-365 Skeletal Development and Cartilage Degeneration Yinxuan Yang Engineering A Phenomenological Investigation of Metal-Metal Contacts at the Nanoscale for **RF MEMS Switch Applications** Lijing Yao Earth, Environmental and **Planetary Sciences** Closure Temperature and Closure Pressure in Bi-Mineralic Systems with Applications to REE-in-Two-Mineral Thermobarometers Xin Yi Engineering Effects of Elasticity and Geometry on Cellular Uptake of Nanoparticles

Lichao Yu Physics Defects in Two-Dimensional Colloidal Crystals Mohsen Zayernouri **Applied Mathematics** Spectral and Spectral Element Methods for Fractional PDEs Teng Zhang Engineering Fracture and Wrinkling in Graphene with Topological Defects Huaiyong Zhao Cognitive Science Locomotor Interception of a Moving Target: On-Line or Model-Based Control? Xiaoai Zhao Pathobiology Reduced Expression of the Proto-oncogene Myc Increases Mouse Longevity and Enhances Healthspan Mengdi Zheng **Applied Mathematics** Numerical Methods for Stochastic Systems Subject to Generalized Lévy Noise Mujun Zhou Sociology Civil Society and the Potential for Solidarity: Toward a Critical Sociology of Post-Socialist Chinese Society Huiyuan Zhu Chemistry Rational Synthesis of Monodisperse Nanoparticles for Catalytic Applications Stephen Richard Zins Pathobiology Human Defensins and Innate Immune Control of JC Polyomavirus Infection Michael A. Zompa Chemistry Synthesis and Application of a Phosphoserine-Mimic Activity-Based Probe for Protein Profiling of Complex **Biological Systems** Silvia Zuffi Computer Science Shape Models of the Human Body for Distributed Inference Kristen Zukosky Neuroscience Molecular Basis of Congenital Disorders of Muscle: From Genetic Diagnosis to Cellular Modeling of Actinopathies and Alpha-Dystroglycanopathies

Candidates for Honorary Degrees



ROBERT A. CORRIGAN *Doctor of Humane Letters*

A 1957 graduate of Brown University (A.B., American civilization), Robert Corrigan became one of the nation's foremost and longest-serving academic leaders. He was president of San Francisco State University for 24 years (1988-2012) and prior to that served the University of Massachusetts–Boston as chancellor for nine years (1979-88). After Brown, Corrigan continued his

studies at the University of Pennsylvania as a Carnegie fellow, earning a master's degree in American studies and working as a researcher at the Philadelphia Historical Commission. He was a lecturer in American literature and culture at the University of Gothenburg (Sweden) for three years before returning to Penn to earn his Ph.D.

He joined the faculty at the University of Iowa in 1964 in English and American civilization. In 1969, he received a National Endowment for the Humanities/Ford Foundation grant for a summer institute on the culture of black America, an area in which he worked both as a scholar and as an administrator. The NEH provided support that allowed Corrigan to organize further summer institutes on the Harlem Renaissance, Richard Wright, W.E.B. Du Bois, black women in America, and other themes. Also at Iowa, Corrigan founded one of the nation's earliest black studies programs.

Though he continued his teaching and scholarly interests, Corrigan entered higher education administration in 1973 as dean of the College of Arts and Sciences at the University of Missouri–Kansas City and then as provost for arts and humanities at the University of Maryland– College Park in 1974. He became chancellor of UMass–Boston in 1979.

Corrigan's interest in and unwavering commitment to social justice led to a storied tenure as president at SFSU, and his commitment to diversity drove significant demographic change throughout the University — faculty, staff, and students.

Tu, o praeclare alumne Universitatis Brunensis, magister, princeps civium, tuam per vitam reformandis studiis doctrinae se dedisti, excitans tuo exemplo permultos discipulos et magistros ex civitate nostra alios complecti et aliis occasionem dare atque servire. Te praeside quattuor et viginti annos, Universitas Publica in Sancto Francisco facta est exemplum quod nunc alia collegia aemulant. Confidens sensu communi omnium hominum rationem studiorum et facultatem et classem discipulorum et famam academicam in tua universitate amplificavisti. Praesertim tibi, si cuiquam, SFSU tantum progressum debet. Quod terminos rumpere, locos discendi commodiores eis qui scientiam adipisci student efficere, et beneficia non solum in regionibus quae Sinum Sancti Francisci circumdant sed etiam in orbe terrarum augere, assiduus laboravisti, Doctorem Litterarum Humanarum salutamus, honoris causa.



LOUISE LAMPHERE *Doctor of Humane Letters*

Louise Lamphere, distinguished professor emerita of anthropology at the University of New Mexico, began her academic career at Brown in 1968, when the field was becoming more prominently engaged in contemporary issues — health, employment, race, gender, feminism. Her early book, Woman, Culture and Society (1974), coedited with Michelle Zimbalist Rosaldo,

was a pathbreaking work in feminist anthropology and women studies and is now a classic.

She continued to do research on women and gender, including a study in Central Falls, R.I., From Working Daughters to Working Mothers (1987), and Sunbelt Working Mothers: Reconciling Family and Factory (1993). More than 40 years of research from her dissertation, published in 1977 as To Run After Them: The Social and Cultural Bases of Cooperation in a Navajo Community, to her most recent book, a biography of three Navajo women titled Weaving Women's Lives: Three Generations in a Navajo Family (2007), has also made her an expert on family and kinship among the Navajo.

Lamphere was elected to the presidencies of the American Anthropological Association, the American Ethnological Society, and the Association for Feminist Anthropology. The American Anthropological Association honored her as a "founding mother" of feminist anthropology whose work stretched the boundaries of existing anthropological theory and "quite literally transformed the entire discipline."

Lamphere was also a pivotal figure in the late-20th-century history of Brown University. Denied tenure in 1974, she filed a Title VII discrimination suit in 1975, which led to a settlement in 1977 and the Lamphere Consent Decree. That document governed faculty hiring and tenure decisions at Brown until it was vacated in 1992 by mutual consent — after a five-fold increase in women on the Brown faculty.

Lamphere moved to the University of New Mexico in 1986. In 2008, as she considered retirement, Lamphere sought to preserve the legacy of feminist scholarship by creating the Louise Lamphere Visiting Assistant Professorship in Gender Studies at Brown, established by the Corporation in May 2008.

O anthropologa, professor, scholastica praeclara, principio cursus tui apud universitatem nostram effecisti ut omnes professores Brunenses meritos honores aeque adipisci possent. Cum professores muliebres modo quinque et viginti essent, tu assidua Universitati Brunensi intendisti litem, ex qua prospera sequentibus quindecem annis femininarum professorum numeros Universitas quinquiplex augeret. Praeterea, ut emendatrix primi libri anthropologici de mulierum statu et praeses Collegii Anthropologici Americani, paupertatis valetudinisque familiarumque ampliorem investigationem qua difficiles nodi societatis solverentur poscebas. Exemplum operum tuorum et academicorum et pro bono publico quae facta apud Brunensem atque Novi Mexici Universitatem sunt sequentes inspirat ut hodie mulieribus consecutiones mutationum rerum melius intellegantur. Propter fortitudinem, aequitatis custodiam, investigationem anthropologiae urbanae eximiam, Doctorem Litterarum Humanarum te salutamus, honoris causa.



DAVID E. MCKINNEY *Doctor of Humane Letters*

After a 36-year career at IBM, which included service as senior vice president and a member of the Management Committee and Corporate Management Board, David McKinney retired as president and CEO of IBM Europe in 1992.

After a brief retirement, McKinney continued to explore a number of civic interests. In 1999, he became

president of the New York Metropolitan Museum of Art. As chief administrative officer, he applied his experience as a global executive to leading the museum's non-curatorial business operations: development, technology, legal affairs, finance, human resources, communications, government relations, construction, merchandizing, security and other areas. He has been a director of NYC & Company, the city's official marketing, tourism and partnership organization, and is a former director of the Philharmonic-Symphony Society of New York.

McKinney became formally involved with Brown University shortly before his retirement from IBM. He was elected to a six-year term on the Board of Trustees in 1990 and was two years into a second term when the Brown Corporation elected him to an 11-year term on the Board of Fellows in 1999.

McKinney has been associated with the Thomas J. Watson Jr. Institute for International Studies since its formal establishment at Brown in 1991. As a member and former chair of the Watson Institute's Board of Overseers, he helped establish the new institute, build its programs, and raise its profile on campus and beyond.

McKinney is president of the Thomas J. Watson Foundation and a trustee of the Paul and Daisy Soros Foundation. He is the father of three Brown graduates and grandfather of two current Brown students.

O praeclare dux, amice generi hominum, comes Universitatis Brunensis, tu doctrinam, scientiam et artes civiles non solum per civitatem nostram sed etiam per orbem terrarum auxisti. Triginta sex annos in societate, nomine "IBM", ex artibus vendendorum rerum, administrandorum systematum informationis et curandorum hominum sublimi vertice sidera feris. Te duce novae aetates et Museo in Novo Eburaco, nomine "The Met", et Universitati Brunensi satae sunt. Te praeside collegium, nomine Thomas J. Watson, sibi foedere et societate Universitatem Brunensem ad disciplinas iuris gentium, informaticae computatralis et mathematicae applicatae excolendas adiunxit. Pro rebus gestis, operis assiduis pro Universitate Brunensi et studiis doctissimorum instruendorum, te in Litteris Humanis Doctorem salutamus, honoris causa.



TRACEE ELLIS ROSS *Doctor of Fine Arts*

Tracee Ellis Ross, widely recognized for her comedic roles as Joan Clayton in Girlfriends and more recently as Dr. Rainbow Johnson in the series Black-ish, graduated from Brown University in 1994 with a bachelor's degree in theater arts. Ross made her film debut in 1996 in the independent feature Far Harbor, the first of eleven film roles. She starred in the 1998 made-for-television film Race

Against Fear: A Moment of Truth, playing a former high school athlete who had remained silent about abuse by a track coach. Her entry into comedy came in 2000 as a regular on The Lyricist Lounge Show, an MTV variety series. She began her 172-episode run on Girlfriends the same year.

Her performances have brought her more than a dozen nominations for national awards. She has won the NAACP's Image Award for Outstanding Actress in a Comedy Series four times (for Black-ish in 2015, for Reed Between the Lines in 2012, and twice for Girlfriends, 2007 and 2009). She also received a BET Comedy Award for Girlfriends in 2004.

In addition to her performing career, Ross has developed workshops for motivational presentations, including "Tapping Into Your Creative Well," a workshop that encourages participants to discover inner joys and strengths and use them to keep their lives on course. She is also involved in mentoring and helping teenage girls through volunteer work with Aviva Family and Children Services in Los Angeles and with the Big Brother Big Sister Program, for which she has conducted self-esteem workshops nationwide. For that work, the Los Angeles Urban League honored her as its 2004 Volunteer of the Year, and she received the 2009 Impact Award from Aviva.

O tu quae histrio praemiis perornata, scaena superata, quae suasor boni ex animo exhortata, quae ingenio impulsa impetu innisa necnon lingua lasciva, tute tibi viam munivisti in ipsam arcem artis. Inde velut omne punctum tulisti conspicua tuis virtutibus ex quo primum laudem meruisti ob fabulam tuam Girlfriends. Certe quocumque loco agis partes, naturam rerum humanarum audaciter scrutata, personas formasti perduraturas quae quidem latere non possint. itaque iam innotescente tua nova ABC comoedia Black-ish, plurimus te libenter spectat et audit. Voces vero et formas varii generis laude dignata compluribus etiam profuisti, quantopere niteris suadendo ut omnes, et praecipue puellae, fiant fortes animo necnon confirmati et contenti! gaudium mundo coniunxit te cum feminis omnis generis et effecit ut consilium praebere possis quamadmodum suus cuique cultus inveniri possit inter solitos tantum imitari. Pro personis tuis venustis et unicis, pro consilio et exemplo tuo puellis, postremo pro istis tuis semper novis omnis generis ausis, idcirco te Doctorem in Artibus Elegantibus salutamus, honoris causa.



SUSAN SOLOMON Doctor of Science

Susan Solomon is the Ellen Swallow Richards Professor of Atmospheric Chemistry and Climate Science at the Massachusetts Institute of Technology and is the founding director of MIT's Environmental Solutions Initiative. She has been at MIT since 2011.

A chemist by training (M.S. and Ph.D. in chemistry, University of California– Berkeley, specializing in atmospheric

chemistry), she served for three decades as a scientist with the National Oceanic and Atmospheric Administration in Boulder, Colo., where she led the Chemistry and Climate Processes Group.

It was Solomon who first proposed the theory that explained the appearance of ozone holes in the Antarctic — a reaction of ozone and chlorofluorocarbons on the surface of ice particles in high-altitude clouds. Her theory was borne out by the National Ozone Expedition to McMurdo Sound, which she led in 1986 and 1987. Her team found levels of chlorine oxides — released when ultraviolet radiation triggers decomposition of chlorofluorocarbons — that were 100 times higher than expected.

In addition to her many scientific papers, Solomon has written about the ill-fated 1912 expedition by Robert Scott, whose party of five reached the South pole but died of exhaustion and cold as they were returning to base camp. The Coldest March: Scott's Fatal Antarctic Expedition (Yale University Press, 2002) applied modern meteorological knowledge to records from Scott's expedition to understand why it ended in failure.

Solomon has been much honored for her work, including the U.S. National Medal of Science (1999), the Blue Planet Prize (Japan, 2004), the Grande Medaille (French Academy of Sciences, 2008), the Volvo Environment Prize (Royal Swedish Academy of Sciences, 2009), and the BBVA Foundation Frontiers of Knowledge Award (2012). In 1994, an Antarctic glacier and an Antarctic snow saddle were named in her honor.

Physica climatologiae clarissima, tu modum quo atmosphaeram nostram conservemus commutavisti in perpetuum, et pericula quae nobis minantur demonstravisti. Ut physica officium tuum pro republica sequens, itinera duo ad Terram Antarcticam explorandam fecisti, ubi tu prima explicavisti cur super plaga illa mundi appareret rima quaedam caeli. Investigationes tuae quae corpora hoc vitium faciant demonstraverunt. Postea dictis factisque tulisti opem illustrandi severitatem et implacabilitatem calefactionis globalis, et usquequaque investigas atque doces res varias ad commutationem climatis rapidam pertinentes. Annos quattuor abhinc, Massachusettense Institutum Technologiae te appellavit professorem chemiae atmosphaericae et climatologiae. Per hanc sellam eminentissimam educare physicos aetatis proximae potes. Inter egregiissimas laudes tuas sunt praemia suprema quae sodalitates eruditissimae ad honorem tuum contulerunt. Denique, ne omittatur illa moles glacialis Terrae Antarcticae quae e nomine tuo nominata est. Pro investigatione strenua tua, pro meritis tuis ubique comprobatis, et pro studio constantissimo ad valetudinem mundi nostri conservandam, te Scientiae Doctorem salutamus, honoris causa.



KATHRYN D. SULLIVAN *Doctor of Science*

In the same year that she earned her Ph.D. in geology (Dalhousie University, 1978), Kathryn Sullivan became one of the first six women selected to join the NASA astronaut corps. In a 15-year career with NASA, she flew on three shuttle missions, including the 1990 mission by Space Shuttle Discovery that launched the Hubble telescope. In all, she logged 532 hours in space and, aboard

Space Shuttle Challenger in 1984, became the first American woman to walk in space.

Following her service as an astronaut, Sullivan served as president and CEO of the Center of Science and Industry in Columbus, Ohio, among the nation's leading science museums. She was also the inaugural director of the Battelle Center for Mathematics and Science Education Policy in the John Glenn School of Public Affairs at Ohio State University.

Sullivan, currently administrator of the National Oceanic and Atmospheric Administration and under secretary of commerce for oceans and atmosphere, is a national leader in science administration and policy. Appointed chief scientist at NOAA in 1993, she oversaw a portfolio that included research in fisheries biology, climate change, satellite instrumentation, and marine biodiversity. President George W. Bush appointed her to the National Science Board in 2004, and in 2009 she began a three-year term as chair of the Section on General Interest in Science and Engineering for the American Association for the Advancement of Science.

President Barack Obama nominated Sullivan as assistant secretary of commerce in January 2011, and she was confirmed by the Senate in May. She began service as assistant secretary for environmental observation and prediction and deputy administrator for NOAA. She was appointed acting under secretary of commerce and acting NOAA administrator in February 2013 and was confirmed by the Senate to those positions in March 2014.

O excellens indagatrix veri, o astronauta americana, contemplans eas stellas, quas numquam ex hoc loco vidimus, et eas magnitudines planetarum, quas vix concipimus! At hic in terra, femina egregia, cum administratione nationali rerum et aeronaticarum et caelestium diligenter laboravisti. Prima femina americana caelo inambulavisti, illuc in machina ter volavisti et telescopium hubblense statuisti. Dehinc investigationes scientificas in administratione nationali marium aetherisque curabas. His rebus tuis celebratis, a senatoribus tam maxime probata es ut magistratus duos tibi mandarent. Nunc consilia tua a multis quaesita et a te omnibus hominibus munifice data sunt. Propter res gestas pro scientia et disciplina, et propter conservationem mundi nostri pro saeculis futuris, te Doctorem in Scientia salutamus, honoris causa.

Candidates for Master of Arts, *ad eundem*

PROFESSORS Joan Copjec Jack A. Elias Leela Gandhi Lenworth N. Johnson Chun Geun Lee Paul Yu Liu Abrar A. Qureshi Andrew Michael Schrank Allan Robert Tunkel David Wills

ASSOCIATE PROFESSORS David C. Anthony David Badre Kevin P. Charpentier Tamara Chin Eunyoung Cho Bum-Rak Choi Jonathan P. Conant Erika Maria Concetta D'Agata Geoffroy De Clippel Scott Alan Frickel Elizabeth Fussell Dragan Golijanin Françoise Nicole Hamlin Katrine Hansen Christopher Houck Elizabeth Lazarus Jessaca Bennett Leinaweaver Oing Lu Christopher Steven Muratore Paul T. Myoda Anthony M. Napoli Andriy Norets Michal Oklot Keisha-Khan Y. Perry Thangam Ravindranathan Thomas Schestag Lori A. J. Scott-Sheldon Tracy L. Steffes Marina Tolou-Shams Gregory Alexander Wellenius Samuel T. Zipp

SENIOR LECTURER Kurt Teichert

Officers Emeriti

William Cashore Professor Emeritus of Pediatrics Jerry D. Daniels Associate Professor Emeritus of Engineering Kathleen Hittner Clinical Professor Emerita of Surgery (Anesthesiology) Marida Hollos Professor Emerita of Anthropology Peter Kramer Clinical Professor Emeritus of Psychiatry and Human Behavior Henry Magendantz Clinical Associate Professor Emeritus of Obstetrics and Gynecology David Morris Professor Emeritus of Pathology and Laboratory Medicine Bonnie O'Connor Professor Emerita of Pediatrics (Clinical) Warren Prell Henry L. Doherty Professor Emeritus of Oceanography; Professor Emeritus of Earth, Environmental and Planetary Sciences William Rakowski Professor Emeritus of Behavioral and Social Sciences Gerald Shapiro Professor Emeritus of Music Peter Trafton Professor Emeritus of Orthopaedics

Citations and Awards

RECIPIENTS OF THE MASTER'S AWARDS ACADEMIC ACCOMPLISHMENT Elizabeth Noble Kinnard, '15 Sc.M. Behavioral and Social Sciences Intervention

PROFESSIONAL EXCELLENCE Christopher Godfrey '15 Executive Master *Healthcare Leadership*

ENGAGED CITIZENSHIP AND COMMUNITY SERVICE Amelia Tatum Grabowski '15 A.M. *Public Humanities*

RECIPIENTS OF THE JOUKOWSKY FAMILY FOUNDATION OUTSTANDING DISSERTATION AWARD HUMANITIES

Rebecca Stephens Falcasantos '15 Ph.D. *Religious Studies* "A Land Cleansed of Heretics" Cult Practice and Contestation in the Christianization of Late Antique Constantinople

LIFE SCIENCES Nicholas W. Bellono '15 Ph.D. *Molecular Pharmacology and Physiology* Ionic Signaling in Pigmentation

PHYSICAL SCIENCES Martin Ulirsch '15 Ph.D. *Mathematics* Tropical Geometry of Logarithmic Schemes

SOCIAL SCIENCES Sarah Elizabeth Newman '15 Ph.D. *Anthropology* Rethinking Refuse: A History of Maya Trash

RECIPIENT OF THE MEDICAL SENIOR CITATION Paul George, MD '05 Assistant Professor of Family Medicine

RECIPIENT OF THE HORACE MANN MEDAL Lynn Rothschild '85 Ph.D. Senior Scientist, NASA Ames Research Center

RECIPIENT OF THE SUSAN COLVER ROSENBERGER MEDAL OF HONOR Barrett Hazeltine Professor Emeritus for Engineering

RECIPIENTS OF THE BARRETT HAZELTINE CITATION FOR EXCELLENCE IN TEACHING, GUIDANCE AND SUPPORT At the President's reception for the class of 2015, held on May 18, 2015, Hazeltine Citations were awarded to:

Richard D. Bungiro, Jr. Ph.D. '99 Françoise N. Hamlin

MILITARY COMMISSIONS From the Army Reserve Officers'

Training Corps (ROTC) Phillip Allen Smith '15

From the Army Health Professions Scholarship Program (HPSP) Kelly MacDonald '15

From the Marine Corps Platoon Leaders Class (PLC) Walker Davis Mills '15

SENIOR CLASS GIFT

At the President's Reception for the Class of 2015, held on May 18, 2015, the Senior Gift Committee presented President Paxson with their Class Gift.

CLASS OF 2015 SENIOR

GIFT COMMITTEE COMMITTEE CO-CHAIRS Caleb Cragle Steph Hennings

events committee co-chairs Mary Reed Haley Alvarez

MARKETING AND PARTICIPATION CHAIR Jennifer Aitken

ATHLETICS CO-CHAIRS Liza Green Will Swindell

CARRIE TOWER CO-CHAIRS Alexander Kaplan Salaar Khan Giuliano Marostica Ana Rosenstein

INTERNATIONAL COMMITTEE CO-CHAIRS Roxanne Alaghband Jagrit Rai

ARTS COMMITTEE CHAIR Yiran (Elaine) Zhao

INVESTMENT IN DIVERSITY CHAIR Raquel Bryant

HONORARY COMMITTEE MEMBERS Samuel Kase Maahika Srinivasan Jonathan Vu ATHLETIC TEAM REPRESENTATIVES Trista Chavez Softball Alexandra Conway Cross Country/Track Chloe Cross Women's Soccer Alyssa DiBona Women's Lacrosse Meg Hassan Equestrian Danielle Hoffman Women's Gymnastics Stephanie Hsieh Women's Golf Abigail Jones Cross Country/Track Kaitlyn Keon Women's Hockey Daniel Kerr Men's Baseball Jacob Laser Men's Tennis Shannon McSweeney Field Hockey Walker Mills Men's Crew Nika Mosenthal Skiing Whitney Naylor Women's Crew Peter Rhodes Men's Track & Field Christine Rush Women's Basketball Jordan Schochet Men's Lacrosse Nicolas Talbott Men's Squash Daniel Taylor Men's Soccer Whiting Tennis Men's Crew Justin To Men's Tennis Nikita Uberoi Women's Tennis Maryl Vanden Bos Women's Volleyball William Watterson Men's Wrestling Jerold Wright Men's Baseball

GENERAL COMMITTEE MEMBERS Rachel Binder Christina Jimenez William Janover Neel Swami

Fellowships, Scholarships, and Grants Awarded to Graduating Seniors

Michelle Marie Bailhe Arthur Liman Fellowship Kira Anne Bromwich Fulbright Fellowship Eliza Ann Cohen Arthur Liman Fellowship Daniel David Louis Coppersmith Fulbright Fellowship Phoebe Frances Draper Fulbright Fellowship Hannah Daniels Duncan Truman Scholarship Hannah Faith Duron Fulbright Student Fellowship Patricia Edet Ekpo Mellon Mays Undergraduate Fellowship Mara Amelia Freilich Fulbright Student Fellowship Camisia Ianna Norma Glasgow Mellon Mays Undergraduate Fellowship Margaret Lowrey Hire Fulbright Fellowship Michael Thomas Gerard Hoffman Fulbright Fellowship Gillian Maris Jones Mellon Mays Undergraduate Fellowship Alexander Gregory Anders Jusdanis Fulbright Fellowship Abishek Kulshreshtha Rhodes Scholarship Gae Emilio Leanza Mellon Mays Undergraduate Fellowship Asia Beatrice Nelson Fulbright Fellowship Gregory Schuster Nissan Fulbright Fellowship Kate Ilana Nussenbaum Rhodes Scholarship Keil Matthew Rose Oberlander Mellon Mays Undergraduate Fellowship Tara Torabi Mitchell Scholarship Elena Nicole Venable Fulbright Fellowship Mellon Mays Undergraduate Fellowship

Special Recognition for Advanced Degree Candidates

Alexei Sisulu Abrahams '15 Ph.D. Economics NIH Fellowship Santiago Albán '15 MPA Public Affairs and Public Policy Social Innovation Fellowship (Brown University) Angela S. Allan '15 Ph.D. English Presidential Award for Excellence in Teaching (Brown University) Eduardo de Brito Almeida '15 Ph.D. Engineering NASA Fellowship, Space Act Award Theresa Christine Anderson '15 Ph.D. Mathematics NSF Graduate Research Fellowship Desiree Carla Bailey '15 M.F.A Literary Arts Poets & Writers Amy Award, Selected for inclusion in Best American Poetry 2015 Eyal Bar-Kochba '15 Ph.D. Engineering NSF Graduate Research Fellowship James Christopher Beaver '15 Ph.D. English Charlotte Beebe Wilbour Fellowship in Classical English (a University departmental award) Timothy Edward Bellay '15 Ph.D. Neuroscience NIH Graduate Partnerships Program Fellowship Nicholas W. Bellono '15 Ph.D. Molecular Pharmacology and Physiology NSF Graduate Research Fellowship Thomas David Belulovich '15 Ph.D. **Mathematics** NSF Graduate Research Fellowship Bryan Betancur '15 Ph.D. Hispanic Studies David and Ruth Kossoff Prize for Leadership in Language Teaching (a University departmental award) Carlos M. Bledt '15 Sc.M. Engineering National Defense Science and Engineering Graduate Fellowship

Adam S. Boss '15 Ph.D. History Council of Library and Information Resources Mellon Fellowship for Research in Original Sources, Medieval Academy of America Charles T. Wood Dissertation Research Grant, Peter Green Doctoral Scholarship (a University departmental award) Mark Jonathan Buller '15 Ph.D. **Computer Science** Science, Mathematics and Research for Transformation DoD Scholarship Lillian Patricia Burke '15 **Executive Master** Healthcare Leadership Baldrige Performance Excellence Program Board of Examiners Emily Button-Kambic '15 Ph.D. Anthropology American Philosophical Society Phillips Fund, Munson Institute Paul Cuffee Fellowship, John Carter Brown Library J.M. Stuart Fellowship Rocio P. Caballero-Gill '15 Ph.D. Earth, Environmental and Planetary Sciences NSF Graduate Teaching Fellows in K-12 Education, Minorities in Scientific Ocean Drilling Fellowship Irina Calciu '15 Ph.D. Computer Science Paris Kanellakis Fellowship (a University departmental award) Trần Thiên Camly '15 Ph.D. Chemistry NASA Fellowship, ACS Global Research Experience Exchanges and Training Program, Brown Executive Scholars Training (a Brown Graduate School program) Ariel Lorraine Camp '15 Ph.D. Ecology and Evolutionary Biology Society for Integrative and Comparative Biology Division of Comparative Biomechanics: Best Student Presentation, Society for Experimental **Biology Biomechanics Talk** Prize Francesca Cara Capone '15 M.F.A. Literary Arts Josef & Anni Albers Foundation Residency, Creative Arts Council Student Grant and Arts Initiative Grant (Brown University)

Tess Elaina Caswell '15 Sc.M. Earth, Environmental and Planetary Sciences NSF Graduate Research Fellowship

Clarissa J. Ceglio '15 Ph.D. American Studies Rockefeller Archive Center Grant-in-Aid for Research, Humanities, Arts, Science & Technology Alliance and Collaboratory Scholar

I. Chen '15 Ph.D. *Economics* Russell Sage Foundation Small Grant in Behavioral Economics, Association for Social Economics William R. Waters Research Grant Xinxin Cheng '15 Ph.D. *Chemistry*

William T. King Prize (a University departmental award)

Jeffrey Alexander Pierce Cockburn '15 Ph.D. *Cognitive Science*

Natural Sciences and Engineering Research Council of Canada Postgraduate Scholarship

Lauren Sumiko Combs '15 A.M. Urban Education Policy Ruth J. Simmons Urban Education Policy Scholarship (Brown University)

Corey Lynn Compton '15 Ph.D. *Chemistry* Cane-Nambiar Graduate Student Travelship (a University departmental award)

Morgan Congdon '15 M.P.H. *Public Health* Framework in Global Health Scholar (Brown University) Sarah Craft '15 Ph.D.

Archaeology and the Ancient World Jacob K. Javits Fellowship, Koç University Research Center for Anatolian Civilizations Junior

Fellowship Megan Ashley Creighton '15 Ph.D. *Engineering* Environmental Protection Agency Science to Achieve Results Fellowship

Sarah Corman Crosby '15 Ph.D. Ecology and Evolutionary Biology Environmental Protection Agency Science to Achieve Results Fellowship, National Estuarine Research Reserve Graduate Student Fellowship, George Melendez Wright Climate Change Fellowship

Sarah Elizabeth Davey '15 M.P.H. Public Health Framework in Global Health Scholar (Brown University) Yu-Ting Liu Dingle '15 Ph.D. **Biomedical Engineering** NASA Fellowship, NSF Graduate Teaching Fellows in K-12 Education, Brown Institute for Brain Science Graduate Research Award Stephanie Ann Dodson '15 Sc.M. **Applied Mathematics** NSF Graduate Research Fellowship Nicholas James Dygert '15 Ph.D. Earth, Environmental and **Planetary Sciences** NASA Fellowship, NASA Rhode Island Space Grant Graduate Fellowship Katherine Diane Etter '15 Ph.D. Health Services Research Agency for Healthcare Research and Quality (AHRQ) R36 Dissertation Award Andrea Elizabeth Flores '15 Ph.D. Anthropology NSF Graduate Research Fellowship, Ruth Landes Memorial Research Fund Grant, Jack Kent Cooke Foundation Dissertation Fellowship, National Academy of Education/Spencer Foundation Dissertation Fellowship, Presidential Award for Excellence in Teaching (Brown University) Patricia Michelle Fogerson '15 Ph.D. Neuroscience NSF Graduate Research Fellowship, Sidney E. Frank Fellowship (a University departmental award) Alexandra Gauss '15 M.F.A. Literary Arts Weston Graduate Prize, Feldman Prize in Fiction (University departmental awards) Nicole Torian Gercke '15 Ph.D. Italian Studies Umanesimo, Neoumanesimo, Post-Umanesimo Nell'Età dei Media Fellowship (Università di Bologna) Amanda Getsinger '15 Ph.D. Earth, Environmental and **Planetary Sciences** Mount Holyoke Alumnae Association Hannum-Warner Fellowship

Christopher Godfrey '15 Executive Master Healthcare Leadership Harvard Healthcare Innovation Challenge Award Finalist John Kimbell Golden '15 Ph.D. **Physics** Galkin Foundation Fellowship (Brown University) Emma Marie Gonsalves '15 Ph.D. American Studies Ford Foundation Fellowship Timothy Andrew Goudge '15 Ph.D. Earth, Environmental and **Planetary Sciences** Natural Sciences and **Engineering Research Council** of Canada Postgraduate Scholarship Joshua Morse Guilford '15 Ph.D. Modern Culture and Media Josephine de Karman Fellowship Paul Martin Buzar Gutierrez '15 A.M. Political Science Ford Foundation Fellowship Kirk Donald Haltaufderhyde '15 Ph.D. Molecular Pharmacology and Physiology NSF Graduate Research Fellowship, Pharmacia Fellowship Eunsun Celeste Han '15 Ph.D. History Huntington Library Short Term Award Fellowship Emily Holladay Handlin '15 Ph.D. *History of Art and Architecture* Henry Luce Foundation/ACLS Dissertation Fellowship in American Art David Neil Hauser '15 Ph.D. Neuroscience Sigma Xi Mark K. Ho '15 Sc.M. **Computer Science** NSF Graduate Research Fellowship Kathryn Elizabeth Howley '15 Ph.D. Egyptology and Assyriology Egypt Exploration Society Centenary Award Mariam Irshad '15 M.P.H. Public Health Brown Executive Scholar Training (a Brown Graduate School program) Dennis Johannssen '15 A.M. Philosophy **Open Graduate Education** (a Brown Graduate School program)

Courtney Michele Johnson '15 Ph.D. Pathobiology UNCF/Merck Graduate Science Research Dissertation Fellowship Stephen Knox Jones Jr. '15 Ph.D. Molecular Biology, Cell Biology, and Biochemistry NIH Ruth L. Kirschstein National Research Service Award Anja Jovic-Humphrey '15 Ph.D. *Comparative Literature* John Cargill MacMillan Fellowship (Brown University) Fabrice Daniel Kämpfen '15 A.M. Economics Fondation Zdenek et Michaela Bakala Fellowship Sean Michael Keck '15 Ph.D. English Cogut Center for the Humanities Graduate Fellowship (Brown University) Peter Taylor Klein '15 Ph.D. Sociology Fulbright Fellowship, NSF Graduate Research Fellowship Bryan Vincent Knapp '15 Ph.D. History Huntington Library Short Term Award Fellowship, Radcliffe Institute for Advanced Study Schlesinger Library Dissertation Grant, Dirksen Congressional Research Grant, Steinhaus/ Zisson Pembroke Center Research Grant (Brown University) Erin Katherine Krafft '15 Ph.D. Slavic Studies Pembroke Center Graduate Fellowship (Brown University), Marie J. Langlois Dissertation Prize (a University departmental award) Jingguo Lai '15 Ph.D. Mathematics NSF Graduate Research Fellowship Alexander Rivinus Leydon '15 Ph.D. Molecular Biology, Cell Biology, and Biochemistry Barry Jay Rosen Memorial Award (a University departmental award) Alexander J. Loosley '15 Ph.D. Physics Natural Sciences and Engineering Research Council of Canada Postgraduate Scholarship, NSF East Asian and Pacific Summer Institute Award

Michael Lopez '15 Ph.D. **Biostatistics** June Rockwell Levy Foundation Fellowship (a University departmental award), NIH Ruth L. Kirschstein National Research Service Award David Joshua Lowry-Duda '15 Sc.M. Mathematics NSF Graduate Research Fellowship Michael Jennings Mahoney '15 M.F.A. Theatre Studies: Acting Stephen Sondheim Fellow (Brown University) Ryan James Michney '15 Ph.D. **Physics** NASA Fellowship, NSF Graduate Teaching Fellows in K-12 Education Kristen Elizabeth Morgan '15 M.P.H. Public Health Framework in Global Health Scholar (Brown University) Mervl Roderick Moss '15 **Executive Master** Healthcare Leadership American College of Health Care Executives Regent's Award Tara Lynn Mulder '15 Ph.D. Classics American Association of University Women Dissertation Fellowship Sarah Elizabeth Newman '15 Ph.D. Anthropology Fulbright Fellowship, Dolores Zohrab Liebmann Fund Fellowship, John Carter Brown Library J.M. Stuart Fellowship, NSF Doctoral Dissertation Improvement Grant, Wenner-Gren Foundation Dissertation Fieldwork Grant Arielle Nicole Price Schilit Nitenson '15 Sc.M. Neuroscience NSF Graduate Research Fellowship, Open Graduate Education (a Brown Graduate School program) Layla Kathleen Oesper '15 Ph.D. **Computer Science** NSF Graduate Research Fellowship, Google Anita Borg Scholarship Katherine Pearl '15 M.F.A. Playwriting Lucille Lortel Playwriting Fellowship

Laura Ann Perille '15 Ph.D. History Brown/Wheaton Faculty Fellowship, Peter Green Doctoral Scholarship (a University departmental award) Mary Elizabeth Peterson '15 Ph.D. . Earth, Environmental and Planetary Sciences NSF Graduate Research Fellowship Allison Marly Porman '15 Ph.D. Molecular Biology, Cell Biology, and Biochemistry NIH Ruth L. Kirschstein National Research Service Award Individual Predoctoral Fellowship Michael Powers '15 Ph.D. German Studies Presidential Award for Excellence in Teaching (Brown University), DAAD Research Grant Tabb Christopher Prissel 15 Ph.D. Earth, Environmental and Planetary Sciences Geological Society of America Stephen E. Dwornik Student Award (Honorable Mention) Jason J. Ramirez '15 Ph.D. Psychology NIH Institutional National Research Service Award Lindsay Schakenbach Regele '15 Ph.D. History Hazeltine Fellowship for Graduate Research in Entrepreneurship (Brown University), American Antiquarian Society Kate B. and Hall J. Peterson Fellowship, Harvard Institute for Global Law and Policy Program on the Study of Capitalism Research Fellowship, Massachusetts Historical Society Marc Friedlaender Fellowship, John E. Rovensky Fellowship in U.S. Business or Economic History, Peter Green Doctoral Scholarship (a University departmental award) Kevin Wilson Rio '15 Ph.D. Cognitive Science NASA Fellowship, Link Foundation Fellowship

Michael D. Rodríguez-Muñiz '15 Ph.D. Sociology Ford Foundation Fellowship, NSF Doctoral Dissertation Research Improvement Grant, University of Chicago Provost's Career Enhancement Postdoctoral Scholarship John Matthew Rosenberg '15 Ph.D. History Watson Institute Graduate Fellow (Brown University) Patsorn Sangkloy '15 Sc.M. Computer Science Royal Thai Government Scholarship Christopher Osborn Schluter '15 M.F.A. Literary Arts Weston Graduate Prize (a University departmental award) Elizabeth Ellice Searcy '15 Ph.D. History Mellon/ACLS Dissertation Completion Fellowship Marina Ceilidh Shay '15 M.F.A. Theatre Studies: Acting Lotta Theatrical Fund Scholarship Jazmín Sierra '15 Ph.D. Political Science Social Science Research Council International Dissertation Research Fellowship Joseph Michael Silva '15 Ph.D. History of Art and Architecture Newberry Library Fellowship Sage Tivona Snider '15 A.M. Public Humanities Rhode Island State Council on the Arts Project Grant for Education Steven Zachary Swartz '15 Ph.D. Molecular Biology, Cell Biology, and Biochemistry NIH Ruth L. Kirschstein National Research Service Award Individual Predoctoral Fellowship, Barry Jay Rosen Memorial Award (a University departmental award) Anika Marsha Toorie '15 Ph.D. Pathobiology Endocrine Society Presidential Poster Award Colleen Marie Tripp '15 Ph.D. American Studies American Antiquarian Society Short-Term Research Fellow, California American Studies Association Graduate Paper Prize

Fabien Bertrand Paul Wagner '15 Ph.D. Neuroscience **Epilepsy Foundation** Predoctoral Research & Training Fellowship Denise M. Werchan '15 Sc.M. Psychology NSF Graduate Research Fellowship Whitney Clair White '15 M.F.A. Theatre Studies: Acting Lotta Theatrical Fund Scholarship Miel Mason Wilson '15 Ph.D. American Studies Social Science Research **Council Dissertation** Completion Grant Ella Getz Wold '15 A.M. Economics Presidential Fellowship (Brown University) Max Holiner Wolkowitz '15 M.F.A. Theatre Studies: Acting WISE Foundation Emerging Artist of the Year Xi Yang '15 Sc.M. Cognitive Science Brown/Wheaton Faculty Fellowship Mohsen Zayernouri '15 Ph.D. Applied Mathematics NSF Graduate Research Fellowship Yinsui Zheng '15 Sc.M. Earth, Environmental and **Planetary Sciences** Brown University/Marine Biological Lab Graduate Fellowship Mujun Zhou '15 Ph.D. Sociology Chiang Ching-kuo Dissertation Fellowship Huiyuan Zhu '15 Ph.D. Classics International Precious Metal Institute Gemini Graduate Student Award Stephen Richard Zins '15 Ph.D. Pathobiology NIH Ruth L. Kirschstein National Research Service Award Michael A. Zompa '15 Ph.D. Chemistry NSF Graduate Teaching Fellows in K-12 Education, William T. King Prize (a University departmental award)

Andrew R. Zullo '15 Sc.M. *Epidemiology* School of Public Health Nora Kahn Piore Award (Brown University), Population Studies and Training Center Summer Award (Brown University)

Faculty Recognition

AWARDS FOR EXCELLENCE IN SCHOLARSHIP

Nitsan Chorev Harmon Family Professor of Sociology and International Studies Presidential Faculty Award, Spring 2015

AWARDS FOR EXCELLENCE IN TEACHING

Alexandrina Algoro Visiting Instructor, American Studies Teaching with Technology Award Elizabeth Brainerd Professor of Medical Science Dean's Award for Excellence in Graduate and Postdoctoral Teaching and Mentoring in the Biological Sciences Jordan Branch Assistant Professor of **Political Science** Henry Merritt Wriston Fellowship Willoughby Britton Assistant Professor of Behavioral and Social Sciences (Research), Assistant Professor of Psychiatry and Human Behavior (Research) Public Health Dean's Award for Excellence in Mentoring Sciences Mark Cladis Brooke Russell Astor Professor of Humanities John Rowe Workman Award for Excellence in Teaching in the Humanities Melissa Clark Professor of Epidemiology and Professor of Obstetrics and Gynecology CareerLab's Comfort and Urry Prize for Leadership, Career Advising, and Motivation Theresa Devine Lecturer, Public Policy CareerLab's Comfort and Urry Prize for Leadership, Career Advising, and Motivation

Luba Dumenco Lecturer, Pathology and Laboratory Medicine 2014 Harriet W. Sheridan Award for Distinguished Contribution to Teaching and Learning James Head Professor of Geological Studies Teaching with Technology Award Elizabeth Hoover Assistant Professor of American Studies Dean's Award for Excellence in Teaching in the Humanities/ Social Sciences Odest Chadwicke Jenkins Associate Professor of Computer Science and Engineering Karen T. Romer Award for Excellence in Advising Christopher Kahler Professor of Behavioral and Social Sciences and Chair of the Department of Behavioral and Social Sciences Public Health Dean's Award for Excellence in Classroom Teaching Stephen Kidd Assistant Professor of Classics Henry Merritt Wriston Fellowship Eunsuk Kim Assistant Professor of Chemistry Dean's Award for Excellence in Teaching in the Physical/Life Sciences Dawn King Visiting Assistant Professor of **Environmental Studies** CareerLab's Comfort and Urry Prize for Leadership, Career Advising, and Motivation Monica Linden Lecturer in Neuroscience Teaching with Technology Model Course Award Brandon Marshall Assistant Professor of Epidemiology Henry Merritt Wriston Fellowship Lara Stein Pardo Post-Doctural Fellow, American Studies Teaching with Technology Award Andrew Pennock Lecturer, Public Policy Teaching with Technology Award

Joseph Pucci Professor of Comparative Literature, Professor of Classics CareerLab's Comfort and Urry Prize for Leadership, Career Advising, and Motivation Stéphanie Ravillon Ph.D. Lecturer, Department of French Studies 2014 Harriet W. Sheridan Award for Distinguished Contribution to Teaching and Learning, Karen T. Romer Award for Excellence in Advising Jonathan Readey Lecturer, English CareerLab's Comfort and Urry Prize for Leadership, Career Advising, and Motivation Seth Rockman Associate Professor of History William G. McLoughlin Award for Excellence in Teaching in the Social Sciences Nidia Schuhmacher Senior Lecturer in Hispanic Studies John Rowe Workman Award for Excellence in Teaching in the Humanities Katherine Smith Associate Dean of Biology Undergraduate Education; Assistant Professor of Ecology and Evolutionary Biology (Research) Dean's Award for Excellence in Undergraduate Teaching, Advising and Mentoring in the **Biological Sciences** Derek Stein Associate Professor of Physics and Engineering Philip J. Bray Award for Excellence in Teaching in the **Physical Sciences** Mark Suchman Professor, Sociology Teaching with Technology Showcase Award Sharon Swartz Professor of Biology and Engineering Elizabeth LeDuc Award for Excellence in Teaching in the Life Sciences Ian Wong Assistant Professor of Engineering and Assistant Professor of Molecular Pharmacology, Physiology and Biotechnology CareerLAB's Nathalie Rutherford Pierrepont '07 Prize for Leadership, Advising, and Motivation

FACULTY NEWLY APPOINTED TO ENDOWED AND NAMED PROFESSORSHIPS, JULY 1, 2014

Peter Andreas John Hay Professor of International Studies Robert Blair Joukowsky Family Assistant Professor of Political Science and International Studies Stephen Bush Manning Assistant Professor of **Religious Studies** Nitsan Chorev Harmon Family Professor of International Studies Jeff Colgan Richard Holbrooke Assistant Professor of Political Science and International Studies Eric Darling Manning Assistant Professor of Molecular Pharmacology, Physiology, and Biotechnology Richard Gaitskell Hazard Professor of Physics Leela Gandhi John Hawkes Professor of Humanities and English James Green *Carlos Manuel de Cespedes* Professor of Modern Latin American History Jo Guldi Hans Rothfels Assistant Professor of History Christopher Hill William Herbert Perry Faunce Professor of Philosophy Greg Landsberg Thomas Watson, Sr. Professor of Science Lawrence Larson Rush C. Hawkins Professor of Engineering Rose McDermott David and Marianna Fisher University Professor of International Relations Nicholas Miller Frank Stanton Assistant Professor of Nuclear Security and Policy Elias Muhanna Manning Assistant Professor of Comparative Literature Paul Nahme Dorot Assistant Professor of Judaic Studies David Rand Stephen H. Olney Professor of Natural History Massimo Riva Royce Family Professor of Italian Studies

Andrew Schrank Olive Watson Professor of Sociology and International Studies

Joseph Silverman Royce Family Professor of Mathematics

Prerna Singh Mahatma Gandhi Assistant Professor of Political Science and International Studies

Patrick Vivier Royce Family Associate Professor of Health Services, Policy, and Practice

SELECTED FACULTY HONORS, 2014-15

Walter Atwood Professor of Medical Science, Director of Cancer Signaling Elected Fellow of the American Academy of Microbiology, 2014 David Berson Sidney A. Fox and Dorothea Doctors Fox Professor of Ophthalmology and Visual Science Friedenwald Award of the Association for Research in Vision and Ophthalmology, 2014 Joaquin Blaum Assistant Professor of Economics Peter B. Kenen Fellow at Princeton, 2015-2016 Sheila Blumstein Albert D. Mead Professor of Cognitive, Linguistic, and Psychological Sciences Acoustical Society of America Silver Medal in Speech Communication, 2014 Mark Blyth Eastman Professor of Political Economy, Professor of Political Science and International Studies Hans-Matthofer-Preis fur Wirtschaftspublizistik, 2014 Kim Boekelheide Professor of Medical Science, Director of Superfund Research Lifetime Achievement Award from the Society of Toxicology, 2014 Phyllis Dennerv Sylvia Kay Hassenfeld Professor of Pediatrics Elected to the Association of American Physicians, 2014

John Donoghue Henry Merritt Wriston Professor of Neuroscience, Director of the Brown Institute for Brain Science Fellow of the National Academy of Inventors, 2014 Paul Dupuis IBM Professor of Applied Mathematics American Mathematical Society Fellow, 2015 Pedro Felzenswalb Associate Professor of Engineering and Computer Science Institute of Electrical and **Electronics Engineers** Computer Science Technical Achievement Award, 2014 Rodrigo Fonseca Assistant Professor of Computer Science National Science Foundation, CAREER Award, 2015 Yan Guo Professor of Applied Mathematics Simons Fellow in Mathematics, 2015 James Hays Manning Assistant Professor of Computer Science Alfred P. Sloan Research Fellow, 2015 Stephen Helfand Professor of Biology Glenn/AFAR Breakthrough in Gerontology (BIG) Award, 2014 Maurice Herlihy Professor of Computer Science National Academy of Inventors Fellow, 2014; American Academy of Arts and Sciences, 2015 Karla Kaun Assistant Professor of Neuroscience Smith Family Awards Program for Excellence in Biomedical Research, 2014 Richard Kenyon William R. Kenan, Jr. University Professor of Mathematics Simons Investigator Award, 2014 David Kertzer Paul R. Dupee, Jr. University Professor of Social Science, Professor of Anthropology and Professor of Italian Studies Pulitzer Prize for Biography, 2015

Philip Klein Professor of Computer Science Radcliffe Institute for Advanced Study Fellow, Harvard University, 2015 Kristie Koski Assistant Professor of Chemistry National Science Foundation, CAREER Award, 2015 Matthew Kraft Assistant Professor of Education William T. Grant Scholar, 2015 Tim Kraska Assistant Professor of Computer Science Air Force Office of Scientific Research, Young Investigator Grant, 2015 David Laidlaw Professor of Computer Science Institute of Electrical and Electronics Engineers (IEEE) Fellow, 2014 Heather Leslie Peggy and Henry D. Sharpe Assistant Professor of Environmental Studies Leopold Leadership Fellow of the Stanford Woods Institute for the Environment, 2014 Thomas Lewis Associate Professor of **Religious** Studies Laurance S. Rockefeller Visiting Faculty Fellowship, Princeton University Center for Human Values, 2015 Steven Lubar Professor of American Studies, Professor of Art and Architecture, Professor of History Guggenheim Fellowship, 2015 Edward Martin Clinical Associate Professor of Medicine Josefina B. Magno Distinguished Hospice Physician Award from the American Academy of Hospice and Palliative Medicine, 2015 Rose McDermott David and Marianna Fisher University Professor of International Relations, Professor of Political Science Distinguished Scholar Award, Foreign Policy Association, 2014 Stylianos Michalopoulos Assistant Professor of Economics Excellence Award in Global Economic Affairs, Kiel Institute for the World Economy, 2015

Kenneth Miller Professor of Biology Presidential Citation from the National Science Teachers Association, 2014 Susan Moffitt Mary Tefft and John Hazen White, Sr. Assistant Professor of Political Science and Public Policy Radcliffe Institute for Advanced Study Fellow, Harvard University, 2014 **Christine Montross** Assistant Professor of Psychiatry and Human Behavior Guggenheim Fellowship, 2015 .Jeffrey Morgan Professor of Medical Science, Professor of Engineering, Director of Biomedical Engineering Fellow of the National Academy of Inventors, 2014 Elias Muhanna Manning Assistant Professor of *Comparative Literature* American Council of Learned Societies Fellowship, 2015 Paul Nahme Dorot Assistant Professor of Judaic Studies and Assistant Professor of Religious Studies Herbert Katz Fellow, 2015 Itohan Osayimwese Assistant Professor of History of Art and Architecture Newhouse Center for the Humanities Fellow, 2015 Jill Pipher Elisha Benjamin Andrews *Professor of Mathematics* American Academy of Arts and Sciences, 2015 Sohini Ramachandran Assistant Professor of Biology National Science Foundation, CAREER Award, 2015 Lukas Rieppel Assistant Professor of History AAAS Fellow, 2015 Felipe Rojas Silva Assistant Professor of Archaeology and the Ancient World, Assistant Professor of Egyptology and Assyriology Institute for Advanced Study, Princeton, Scholar, 2015 Bjorn Sandstede Professor of Applied **Mathematics** Elsevier Jack K. Hale Award in Dynamical Systems and Differential Equations, 2015

Jerome Sanes Professor of Neuroscience Fulbright Fellowship, 2015-2016 John Savage An Wang Professor of Computer Science 2014 Professorial Fellow, East West Institute Susanne Schennach Professor of Economics Frisch Medal of the Econometric Society, 2014: Fellow of the Econometric Society, 2014 Hilary Silver Professor of Urban Studies and Sociology, Professor of Public Policy Fulbright Fellowship, 2014 Joseph Silverman Royce Family Professor of Teaching Excellence and Professor of Mathematics Elected to the American Mathematical Society Board of Trustees, 2015 Betty Vohr Professor of Pediatrics Landmark Award from the American Academy of Pediatrics Martin Weinstock Professor of Dermatology Presidential Citation from the American Academy of Dermatology Founders Award from the American DermatoEpidemiology Network Gregory Wellenius Associate Professor of Epidemiology RI State Climate Commission Terrie Fox Wetle Dean, School of Public Health Irving S. Wright Award of Distinction, American Federation for Aging Research Paul Williard Professor of Chemistry Fulbright Fellowship, 2015 Andre Willis Assistant Professor of Religious Studies Templeton Foundation Fellowship, 2015 Ira Wilson Chair of the Department of Health Services, Policy and Practice Co-Chair of the Rhode Island Task Force to Reinvent Medicaid Fellow of the American College of Physicians

See-Chen Ying Professor of Physics Fulbright Fellowship, 2015

Commencement Procession Aides and Marshals

CHIEF MARSHAL Nancy L. Buc '65 LLD'94 hon.

DEPUTY CHIEF MARSHAL Theresia Gouw '90

CHIEF OF STAFF Judith L. Sanford-Harris '74

ASSISTANT CHIEF OF STAFF Cayetano Sanchez III '80

FLAG BEARERS Jaime J. Ramirez '16 Ronald C. Scott, Jr. '17 Timothy J. Whalen '16

COLOR GUARDS Samuel Miller Kase '15 Jonathan T. Vu '15 MD'19

AIDES TO THE

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David Targan '78 Associate Dean of the College for Science Education

ASSISTANT MARSHAL

IN CHARGE Richard Bova Senior Associate Dean, Residential Life and Dining Services

MARSHALS FOR THE SENIOR CLASS Oludurotimi Adetunji

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Presidential Party

MACE BEARER Professor Rashid Zia '01

AIDES IN CHARGE Julie Liddicoet Meister '75 Richard W. Meister '75

PRESIDENT Christina H. Paxson

CHANCELLOR Thomas J. Tisch '76

VICE CHANCELLOR Jerome C. Vascellaro '74

CHAPLAIN The Reverend Janet Cooper Nelson

Division of Corporation and Invited Guests

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ASSISTANT MARSHAL IN CHARGE FOR HONORARY DEGREE CANDIDATES Andries Van Dam Professor of Computer Science

MARSHALS FOR THE CORPORATION Sara Leppo Savage '90 Alexandra E. Mandis '95

At the First Baptist Church in America

AIDE IN CHARGE Richard Marshall '71

AIDES

Jillian Barsalou Elizabeth Breidinger '03 Jennifer Cohen '98 Claire Gadrow David Keeffe Matthew Lee Matthew Lee Danielle Stockley

Graduate School

CHIEF MARSHAL

Joseph S. Meisel Deputy Provost

FACULTY MARSHALS FOR THE GRADUATE SCHOOL Stephen Berenson Director of Graduate Study, Brown/Trinity Repertory Acting and Directing programs, Clinical Professor of Theatre, Speech and Dance James A. Morone John Hazen White Professor of Public Policy, Professor of Political Science and Urban Studies, Director of Public Policy Karen H. Sibley Dean of the School of Professional Studies Vice President for Strategic Initiatives Eric Suuberg Professor of Engineering, Co-Director, Program in Innovation Management and Entrepreneurship Engineering Terrie T. Wetle Dean of the School of

Public Health Kenneth K. Wong Chair, Education Department, Walter and Leonore Annenberg Professor of Education Policy

HOODERS

Jabbar R. Bennett Associate Dean of the Graduate School, Associate Dean, Division of Biology and Medicine, Clinical Assistant Professor of Medicine Elizabeth O. Harrington Associate Dean for Graduate and Postdoctoral Studies, Division of Biology and Medicine, Associate Professor of Medicine (Research)

Medical School

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AIDES TO THE CHIEF MARSHAL

Pardon R. Kenney '72 MMS'75 MD'75 RES'80, P'03 Peter J. Panton '79 MD'82, PMD'15

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MD'05

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FACULTY MARSHALS

Luba Dumenco Paul George Dale Ritter Philip Gruppuso Jordan White

HOODERS

Luba Dumenco Dale Ritter Philip Gruppuso

Music for the Procession

Brown University Commencement Band – Matthew McGarrell, Director The Rhode Island Highlanders Pipe Band – Deborah Kane, Pipe Major

Officers of the University

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Public Health

The coat of arms on the stage is a gift from Mary Aguiar Vascellaro '74 and Jerome Vascellaro '74.

Locations for Diploma Ceremonies

- E-5 Africana Studies Churchill House, Rites and Reasons Theatre 155 Angell Street
- E-5 American Studies Tent, Norwood House, Sharpe Park 82 Waterman Street
- I-9 Anthropology Tent, Giddings House, Garden
 128 Hope Street
- **G-6** Applied Mathematics St. Stephen's Church 114 George Street
- G-4 Archaeology and the Ancient World Rhode Island Hall, Rooms 108 and 109 College Green
- A-8 Biology Pizzitola Memorial Sports Center, Gymnasium 235 Hope Street
- c-8 Business, Entrepreneurship & Organizations Tent, Pembroke Field Brook and Cushing Streets
- **G-7** Chemistry MacMillan Hall Starr Auditorium, Room 117 Thayer and George Streets
- F-4 Classics Manning Hall, Chapel Campus Green
- B-8 Cognitive, Linguistic and Psychological Sciences Meehan Auditorium 235 Hope Street
- **C-5 Comparative Literature** Alumnae Hall, Auditorium Pembroke Campus
- H-3 Computer Science First Unitarian Church 1 Benevolent Street
- H-7 Development Studies Tent, Starr Plaza 111 Thayer Street
- c-5 East Asian Studies Smith-Buonanno Hall, Room 106 Pembroke Campus

- **B-9 Economics** Olney-Margolies Athletic Center 235 Hope Street
- F-5 Education Salomon Center for Teaching, DeCiccio Family Auditorium, Room 101 Campus Green
- G-4 Egyptology and Assyriology Rhode Island Hall, Rooms 108 and 109 Campus Green
- E-1 Engineering First Baptist Church in America 75 North Main Street
- F-5 English Sayles Hall, Auditorium Campus Green
- F-4 Environmental Science and Environmental Studies Stephen Robert '62 Campus Center, Kasper Multipurpose Room 75 Waterman Street
- G-10 Ethnic Studies Tent, Aldrich House, Garden 110 Benevolent Street
- C-2 French Studies
 Tent, Rochambeau House,
 Garden
 84 Prospect Street
- D-5 Gender and Sexuality Studies Pembroke Hall, Room 202 172 Meeting Street
- F-7 Geological Sciences Tent, MacMillan Hall, Side Lawn Thayer and George Streets
- E-9 German Studies South Lawn 190 Hope Street
- C-2 Hispanic Studies Tent, Rochambeau House, Garden 84 Prospect Street

- D-10 History Central Congregational Church 296 Angell Street
- c-5 History of Art and Architecture Tent, Pembroke Green
- E-4 Independent Concentration Brown RISD Hillel, Social Hall 80 Brown Street
- **B-8** International Relations Tent, Ittleson Quad 235 Hope St
- **E-9 Italian Studies** South Lawn 190 Hope Street
- F-5 Judaic Studies Salomon Center for Teaching, Room 001 Campus Green
- H-7 Latin American and Caribbean Studies Tent, Starr Plaza - Watson Institute 111 Thayer Street
- **G-3** Literary Arts Tent, Front Green(in front of Rhode Island Hall)
- c-5 Mathematics Pembroke Hall, Room 305 172 Meeting Street
- D-10 Medieval Studies Central Congregational Church 296 Angell Street
- H-7 Middle East Studies Watson Institute, Joukowsky Forum 111 Thayer Street
- E-6 Modern Culture and Media Perry and Marty Granoff Center for the Creative Arts, Martinos Auditorium 154 Angell Street
- H-10 Music Grant Recital Hall Hope Street and Young Orchard Avenue
- **H-5** Neuroscience Tent, Wriston Quad

- F-2 Philosophy List Art Center, Room 120 64 College Street
- F-9 Physics Barus and Holley, Room 166 & 168 184 Hope Street
- E-5 Political Science Tent, South Walkway Between Angell and Waterman Streets
- G-7 Portuguese and Brazilian Studies Tent, Meiklejohn House, Garden 159 George Street
- F-6 Public Health Tent, Ruth J. Simmons Quadrangle
- F-3 Public Policy and American Institutions Tent, Front Green (in front of Manning Chapel)
- F-5 Religious Studies Salomon Center for Teaching, Room ooı Campus Green
- F-5 School for Professional Studies 85 Waterman St. Room 130
- C-5 Science and Society Alumnae Hall Crystal Room 194 Meeting Street
- F-7 Slavic Studies Marston Hall, Outside 20 Manning Walkway
- **G-5** Sociology Tent, Maxcy Hall Garden 112 George Street
- F-5 Theatre Arts and Performance Studies Catherine Bryan Dill Center for the Performing Arts, Stuart Theatre 77 Waterman Street
- H-4 Urban Studies Faculty Club, Huttner Room One Magee Street
- F-2 Visual Art Tent, List Art Center Lawn 64 College Street



★ Welcome/Information Center

- Main Functions and Restrooms are Accessible
- O Partial Accessibility
- W Water Station

For further information or assistance, please contact the Department of Public Safety at 863-3322 or visit the Welcome/Information Center located inside the Stephen Robert '62 Campus Center at Faunce House (access via the Faunce Arch).