

REED COLLEGE

ONE
HUNDRED
AND
SIXTH
COMMENCE-
MENT
SUNDAY
JUNE 12
2022

The Program

PROCESSIONAL*

WELCOME & INTRODUCTORY REMARKS

Audrey Bilger, President

ALUMNI WELCOME

Jinyoung Park '11

REED COLLEGIUM MUSICUM

“The Road Home”

Stephen Paulus (1949–2014)

COMMENCEMENT ADDRESS INTRODUCTION

Audrey Bilger, President

ADDRESS

Adonia Lugo '05

RECOGNITION OF THE DEGREE OF BACHELOR OF ARTS

Audrey Bilger, President

RECOGNITION OF THE DEGREE OF MASTER OF ARTS IN LIBERAL STUDIES

Audrey Bilger, President

RECESSIONAL*

MARSHALS

Commencement Marshal

Janis Shampay, Howard Vollum Professor of Biology

Graduate Marshals

Chris J. Koski, Professor of Political Science and Environmental Studies

Noelwah Netusil, Stanley H. Cohn Professor of Economics

Matt Pearson '92, Professor of Linguistics

Faculty Marshal

Nigel J. Nicholson, Walter Mintz Professor of Greek, Latin, and Ancient
Mediterranean Studies and Humanities

**The audience is requested to rise for the processional and recessional.*

Please remain in place during the recessional until the faculty and class of 2020 have left. Sign language interpretation is provided by Access Services Northwest. Our bagpiper is John Goff. Graduates and guests are invited to a reception after the ceremony in the Gray Campus Center Quad.

Adonia Lugo '05

Cultural anthropologist Adonia E. Lugo, PhD, is a leading voice in the growing movement for mobility justice. Her work has helped to expose the link between infrastructure and injustice and has cleared new paths for multiracial and minoritized communities to shape conversations about transportation reform.

After graduating from Reed College in 2005, Adonia earned an MA and PhD in anthropology from UC Irvine. During this time her growing involvement in the world of Los Angeles bicycle advocacy led to the creation of CicLAvia, a vibrant open streets event that temporarily transform city streets into public parks. Her memoir, *Bicycle/Race: Transportation, Culture, & Resistance* (Microcosm Publishing, 2018), draws from these experiences as well as her childhood as a Mexican-American woman growing up in Orange County, California.

Adonia has been involved in founding and contributing to several other mobility activism projects over the years, including People for Mobility Justice, the Untokening, Bicultures, the Bike Equity Network, Pueblo Planning, and the Mobility Justice Research Network.

Adonia chaired the Urban Sustainability Department at Antioch University Los Angeles from 2019 until this spring, when she joined the team at UCLA's Institute of Transportation Studies to advance social equity through sustainable transportation.

Music by Rose City Brass Quintet

Logan Thane Brown, trumpet

Lars Campbell, trombone

JáTtik Clark, tuba

Joseph Klause, trumpet

Daniel Partridge, horn

PRELUDE

Opening Fanfare for Brass Quintet

Anders Hillborg (1954)

Portland, Mvt 2. NE

Joey Sellers (1962)

Written for the Rose City Brass Quintet

Heyr, himna smiður

Porkell Sigurbjörnsson (1938–2013)

Arranged for the Rose City Brass Quintet by Daniel Partridge

Buoyancy

Lars Campbell (1978)

Written for the Rose City Brass Quintet

Brass Quintet, Mvt 1. Moderato

Axel Jørgensen (1881–1947)

PROCESSIONAL

Pomp and Circumstance no. 4, Opus 39

Sir Edward Elgar (1857–1934)

Arranged for the Rose City Brass Quintet by Lars Campbell

RECESSIONAL

Dances from “The Danserye”

Tylman Susato (1510/15–after 1570)

Arranged and edited by John Iverson

Collegium Musicum

SHOHEI KOBAYASHI

Assistant Professor of Music

Soprano

Jesse Ehrenberg '20

Naama Friedman '22

Nina Matthews '20

Maria Wilkerson '21

Tenor

Arthur Lawson '22

Jay Lee '19

Alto

Violet Burns '25

Maya Nesbitt-Schnadt '20

Jules Oh '20

Naomi Smith '25

Bass

Ruairi O'Mahony '20

Tieran Sweeny-Bender '22

Luz Liliana Vazquez '24

“The Road Home”

Stephen Paulus (1949–2014)

Tell me, where is the road
I can call my own,
That I left, that I lost
So long ago?
All these years I have wandered,
Oh when will I know
There's a way, there's a road
That will lead me home?

After wind, after rain,
When the dark is done,
As I wake from a dream
In the gold of day,
Through the air there's a calling
From far away,
There's a voice I can hear
That will lead me home.

Rise up, follow me,
Come away, is the call,
With the love in your heart
As the only song;
There is no such beauty
As where you belong;
Rise up, follow me,
I will lead you home.

Graduating seniors are listed alphabetically under each of Reed's five academic divisions, followed by interdisciplinary majors that cross the divisions and master's graduates. The listing includes the academic department in which the student majored. The title of the student's thesis is listed, except for students who completed one of Reed's combined degree programs in place of the thesis year at Reed.

The Arts

AZIZA AFZAL

Theatre

The short play: a brief moment in a radical structure

BAILEY BAST

Art

Art of materiality: the allure of the body in matter

EZRA BERGMANN

Art

Reverie machines

SAGA DARNELL

Theatre-Dance

Our beds are islands: creating queer intimacy through physical theatre in the age of streaming media

SOPHIA FARMER

Art

The sensational offerings of the ocean: coral: eat a great amount and very well

AKIM FARROW

Art

Monsters we make

SAM GRIFFIN-ORTIZ

Music

Mystery alive: Arca, Haraway, Harman, Gurdjieff, and the beauty of nonsense

LAURA KENNEDY

Dance

The spaces between

COLE KIBEL

Music

Coal on a platter

DUNCAN KING

Art

Beyond the photo album: families in photography books

ELI KNOWLES

Music

Aaron's night on earth (everywhere): an exploration of structure and function in long form jazz

ISABEL LEWIS

Art

Consider the vacant lot on 32nd and Roswell Street: a study in urban gardens

INDEX MARCUS

Theatre

Physical theatre as an approach to staging gender

MAYA NAJERA EVANS

Dance

Valuing the dance marathon

JULES OH

Music

Reaching inward, facing outward: nationalism, globalism, and the people in K-pop's Korea

ABBY SHRADER

Theatre

The practice of being together: an investigation of audience participation in the theatre

CHRISTOPHER WOLFE

Theatre

Life as it is, not as it should be: Stanislavski, Brecht, and their commensurability through *Man of La Mancha*

TATIANA ZANCAJO-LUGO

Art

For an aestheticization of nausea in virtual reality

History & Social Sciences

HAYFA ACHOUR

Political Science

Between destruction and preservation of meaning: meaningful vandalism and resistance

SOHA AHMED

Economics

The impact of China's BRI on FDI flows to sub-Saharan Africa

CHARLOTTE ANDERSEN

Anthropology

Preying on precarity: socially mediated manipulation and alienation within multilevel marketing companies

NOLAN ANDERSON

Economics

Global effects of schooling in early stage entrepreneurship

CALEB ASWAD

Economics

Render unto Caesar: an economic analysis of the Islamic Republic of Iran and the Kingdom of Thailand

SARA ATIYEH

History

Red power and creations of pan-indigeneity

JACK BEARDSLEE

Political Science

Helter skelter: far right terrorism and agenda setting

BRENDAN BENDER

History

Obscured by clouds: the Weather Underground and manipulation of image, memory, history, and legacy

NOAM BENTOV

History

Raider's land: violence and state power on the Black Sea steppe, 1475-1718

SAMRATH BHATTACHARYA

History

A silence in the partition museum: the absence of the state and its complicity in the violence of partition

KD BOND
Political Science
Strangled by Russia, haunted by Europe: energy dependency and state security in 21st century Ukraine

JUNE CARTER
Anthropology
A meditation on blackness in the Chicago rap scene

KARINA CERON
Anthropology
Favorable conditions: the social-environmental world of indigenous South America

ALICE CHANG
Sociology
Race, criminality, and legal advocacy for justice reform

HENRY CONRAD-POOR
Anthropology
A multiplicity of canons: authenticity, affordances, and commercialism in a community of fan authors

REBECCA COSTER
Political Science
Family comes first: family values rhetoric in contemporary US anti-trafficking movements

ALYSE CRONK
Economics
Correlates and the will to pay: a Mexican micro-loan case study

KY DESMARAIS
Economics
The case for privatizing the republic of Korea's social security system

SARAH DIAB
Economics
Lowering information asymmetry in the organ procurement system

JAMIL DITTER
Economics
Ways of measuring and quantifying gentrification in Portland, Oregon

SETH DUGAN-KNIGHT
Political Science
Weimar and Washington: Schmitt, Strauss and Trump

ALTANA ELINGS-HAYNIE
Political Science
The politics of the present: neoliberalism, gender, and the law

ALEXIS EPELSTEIN PERALTA
Political Science
On violence: a shooter, a quantum revolution and communism

AIDEN FOSTER-FISHMAN
Political Science
Violence and social movements: a case study of police violence against protesters in Santiago, Chile

GABE FRIEND
Economics
Alcohol, cigarettes, and crime: a state level analysis of excise tax rates and crime incidence

ABBY FRIESEN-JOHNSON
Anthropology
The apocalypse of reason

FRANK GAUNT
Economics
Undergraduate tuition relief programs' impact on college enrollment and graduate migration

JACOB GOLDSMITH
Economics
Exploring the relationship between age and formal bank account usage

CHRISTIAN HAHNEMANN
Political Science
Voter turnout in the Scandinavian context

SARA HANSEN
Anthropology
The thorns of Rose City: social and environmental pollution discourses in unhoused placemaking and neighborhood response

ADITYA HARIHARAN
Economics
Innovation in the sleeping giant: an examination of factors that influence provincial innovation in China

AUSTEN HARTWELL
History
The origins of American faith in technological transcendence: finding a key to progress in the antebellum industrial boom

SHEP HEATON
Sociology
Structural mortgage discrimination: denial and subprime lending during the housing boom

CHELSEA HERNÁNDEZ MCINTOSH
Anthropology
Examining depression and suicide
in a dynamic site of Maya identity: a
case study of mental health in Yucatán,
Mexico

MARCUS HIBBELN
History
From seeds to subjects: the London
Missionary Society, religious
education for Africans, and the settler
state of southern Rhodesia, 1898-1923

KENOBI HOLMES
History
Homicide in New York City from
1963-1966 and its effect on crime
prevention policy of mayor John
Lindsay

EMILY HOWARD
History
Federal Indian policy and the rising
tide of colonial ambivalence: a case
study of the Blackfeet Reservation,
1855-1964

SALMA HUQUE
Economics
Even further beyond the pleasure
principle: a hedonic price model of
property development constraints in
Portland, Oregon

TOM KALAMPONO IKEDA
Political Science
A primer on nation building: a
conceptualization of an independent
Hawai'i

LUCKY JACKSON
History
The battle of Kosovo: mythicizing a
historical truth to construct concepts
of an ethnic identity

GINNY JENKINS
Anthropology
Ka'ahumanu: a study of kinship and
power within early 19th century
Hawai'i

DAVID KERRY
History
*Westward the Course of Empire Takes Its
Way*: the American racial imaginary and
finding Indians in the Philippines

RYAN KIM
Economics
Zoning and its effects on urban sprawl:
a case study of Seattle and Portland

MAYAKI KIMBA
Political Science
Civilized beings and the idea of social
citizenship

HENRY KNOPF
Economics
Applying discrete choice experiments
to video games

ANNE LARKIN
History
"He didn't know what he was up
against": gendered state violence and
nationalist women's politicization
during the Troubles

MIRANDA LEONG-HUSSEY
Political Science
How is education policy passed?: an
exploration of universal pre-K

TESS LEWIS
History
Growing community from seed
to table: the dynamic, radical, and
romantic ideology of local organic
agriculture

VALEN LIM
Political Science
Effects of Three Mile Island on news
media discourses of nuclear power

JACKSON LUCKEY
Economics
Social and economic determinants of
the fatal overdose rate in Ohio

ELI MIZOCK
History
Postwar Jewish memory: the myth of
the shtetl in 1950s America, or, How
I accidentally read everything David
G. Roskies has published

KYLE MONCRIEFF
History
Three settlements in the American
west: a history of early Mormon
settler colonialism, 1847-1858

ANAÏS MOUTARLIER
History
Soldiers of humanity:
humanitarianism & Algerian
sovereignty (1954-1962)

SOPHIE NARANJO-RIVERA
Sociology
Started from the bottom now we're
here: examining representations of
black masculinity in popular music

ZOE NEFF
Anthropology
Bodies in the operating room: robots, surgeons, and the medical object

RUAIRÍ O'MAHONY
Anthropology
Process without peace: an ethnography of space, security, and subjecthood in Belfast

YUKI OYAKAWA
Economics
Decision making under uncertainty: loot boxes

MICHAELA PARK
Political Science
Feminist topographies: the politics of #metoo and feminist political terrains

LYN PETERSON
Political Science
Toxic politics: the feedback effects of living near a Superfund site on political participation and attitudes

LILLYANNE PHAM
Sociology
Feminisms and Instagram in "Asian America"

KIARA PIAZZA
Economics
The economics of sex work

GIO RAMÍREZ
Economics
Measuring the resiliency of US foreign direct investment to currency crises

JESSICA RIAÑO
Sociology
Feminism on the frontlines: understanding feminism's influence on domestic violence direct service work

MEREDITH RILEY
Sociology
Boxing up biological race: racial frameworks in the consumption of genetic ancestry technologies

TEO ROGERS
Political Science
Trade in a network

NAT RUBIN
Political Science
Competitiveness in district attorney elections

TAREQ SAGHIE
Anthropology
Learning a new nationalism: ideology, natural disaster, and resistance in Puerto Rico

EVAN SAMEL
Economics
When pigs die: the structural mismanagement of African swine fever in China

ASHLEY SAN MIGUEL
Political Science
Gendering the quality of democracy

LAUREL SCHUSTER
Anthropology
In the shadows of the Reserva Ecológica Costanera Sur

JANET SEBASTIAN-COLEMAN
History
La force noir and "La voix de l'afrique": a comparison of ideological factors in the recruitment of West African soldiers in the First World War

NOAH SOLNICK
Economics
Evolutionary or revolutionary: how blockchain has changed and where it may be headed

BEN THOMAS
Economics
State policy shocks and inter-jurisdictional commuting

DANIELLE THOMPSON
History
Birth matters: the evolution of childbearing in the United States during the 1970s

EILEEN VERT
Economics
Monopolistic and monopsonistic behavior in online platforms funded by targeted advertising: evidence from Facebook and Google

SLATER WARD
Economics
Portland charter schools' effect on the black-white student achievement gap

NOAH WASS
History
Portland 1945-1949: a postwar history

NICK WEIG

Political Science

Between two poles: a contemporary study of polarization and electoral competition in the U.S. House of Representatives

LUNE WHITLOCK

Anthropology

Fire dancer: authenticity, tradition, and the history of fire spinning

XANTHIA WOLLAND

Political Science

Consultation or collaboration?: consensus-based governance and inclusion of tribal nations in assessment of the Portland Harbor Superfund Site

VICTORIA WAGNER WOODS

Political Science

In the shadows of the Manhattan Project: a critical study of superfund's legacy

JOE YALOWITZ

History

Growth and its discontents: Portland and the problem with good planning

Literature & Languages

LUNA ALBERTINI

Comparative Literature

Refracted bodies: doubling and redoubling self in *L'enfant de sable* and *La mucama de Omicunlé*

MAYA ARIGALA

Comparative Literature

Postimperial melancholia and migrant communities in *The Lonely Londoners* and *The Buddha of Suburbia*

IO BLANCHETT

Comparative Literature

Who looks?: reimagining film as a medium for feminist art

MARY BRADY

Comparative Literature

Open it up: a critical exploration of the globalization of Chinese and American hip-hop

JAKE BUCK

Chinese

Tales to crack a smile: a translation & analysis of *Qǐyán lù*

HAYLEY CURTIS

Classics

The Cento probae: creative appropriation in late antiquity

JACEY DE LA TORRE

English

Ghost stories: discovering and disintegrating homespace

JILLIAN DE LA TORRE

English

I felt myself a phantom: spacemaking and radical self-representation in the literature and filmmaking of homeless Bay Areans

RAQUEL DIAZ

English

Love you for 10,000 years: how Wong Kar-wai contextualizes love and desire in three films

BEATRICE DRUMWRIGHT

Comparative Literature

The empty center: fictions, documents, and the self

- LIAM DULANY**
Classics
Singing the unspeakable:
metapoetics and multivalence in
Lucan's *Bellum ciuile*
- JESSE EHRENBERG**
Comparative Literature
Birds in flight and cresting waves:
gesture in Olivier Messiaen and
Virginia Woolf
- DUNCAN FEIGES**
Classics
On the ruin of Britain: reassessing
the end of roman Britain 400-700 CE
- ELLA FISHER**
English
Laughing at some fucked up shit: an
investigation into the relationship
between trauma and stand-up
comedy
- LEANNA GITTER**
Comparative Literature
Reviving echoes: postmemory,
trauma, and the archive in Patrick
Modiano's *Dora Bruder* and W.G.
Sebald's *Austerlitz*
- DUNCAN HERB**
English
Wandering signifiers in traditional
literature
- ANNA LADOKHIN**
English
Sharing imagined space with
Shakespeare
- WENQIAN LIU**
Classics
Medical and cosmetic tools and
implements from Gabii
- PARKER MATIAS**
English
The matter of citation: historical
materialism and *The Arcades Project*
- MIRANDA MCGOUGH**
English
Lifting the "enigmatic veil":
uncovering the artist figure in the
life and writings of Mary Butts
- MAYA NESBITT-SCHNADT**
English
Hear/Here: Exploring Sound and
the Contours of Mastery and Desire
in *Ulysses*
- HADLEY PARRISH-COTTON**
English
Alligator dreams
- KELLY PAU**
Comparative Literature
The message is in the medium
- ZIA POLLIS**
English
How to eat a woman
- ALEX POSTON**
Classics
Traces of stoic philosophy in Cicero's
De legibus and *De re publica*
- KARLY QUADROS**
English
Watershed
- KASHAF QURESHI**
English
The self as text: Augustinian reading
and the legible corpus in Donne and
Milton
- TACK ROBINSON**
Comparative Literature
Apocalyptic redux: shifting cinematic
depictions of the Vietnam War
- CANSU SARAC**
Russian
Two short stories by Nadezhda Teffi:
translation and commentary
- CALEB SAUSSY**
English
Ars memoria and heteroglossia in
Christine de Pizan's *Book of the City
of Ladies*
- SHEA SEERY**
Comparative Literature
A Rancièrian reading on
contemporary art: Ai Weiwei's *Life
Cycle* (2018) and Kara Walker's *Fons
Americanus*
- RUGBY SIMON**
Comparative Literature
Rupturing with the past: aesthetics
and politics in the Chilean neo-avant-
garde
- EMMA SOUDERS**
Comparative Literature
Memory and identity in Aimé
Césaire's *Notebook of a Return to
the Native Land* and *Discourse on
Colonialism*

KAVI SUBRAMANIAN
Comparative Literature
Worlds between bits

TELINE TRAN
Comparative Literature
Carry over

SOFIA VALENCIA
English
Say tomorrow

ANALISA VENOLIA
English
Let's do a makeover!: an
examination of the modernization
of Jane Austen in *Clueless* and *The
Lizzie Bennet Diaries*

MOLIERE XU
Comparative Literature
Metatextuality, enchantment and
imaginative vision in Wu Mingyi's
The Stolen Bicycle, *Magician on the
Skywalk* and "The clouds are two
thousand meters up"

YEŞİM YILMAZ
Classics
Penelope, Klytaimnestra, Helen

JONATHAN ZISK
English
"Intermittently studded to be
alive": Jewish American authorial
reincarnation in Philip Roth's *The
Ghost Writer* and Nicole Krauss'
Forest Dark

Mathematics & Natural Sciences

ZESEAN ALI
Chemistry
Attempts to identify, extract,
and purify biologically active
compounds in lion's mane

SEBASTIAN ARRIZABALAGA
Chemistry
TerB, what it do?

GABY BAILEY
Chemistry
An exploratory adventure into
the ethanolysis, methanolysis,
and hydrolysis reactions of
atmospherically relevant
monoterpene compounds: a
carene, limonene, and perilllic
alcohol story

YUNJIA BAO
Physics
Understanding scattering
amplitudes through spinor helicity
formalism

THEODOSIA BARTASHEVITCH
Biochemistry and Molecular
Biology
PinX1 telomerase inhibitory
domain secondary structure

SOPHIE BENDER
Chemistry
Finding an ideal SERM: the
design, synthesis, and biological
evaluation of twenty-four estrogen
receptor modulators

MERCY BHAKTA
Computer Science
Colors in flux: rendering
iridescence arising from single-
layer thin films

HENRY BLANCHETTE
Computer Science
Purity and effect

ERIC BOETTNER
Computer Science
Keystroke encryption over USB
HID pathways

MAXINE CALLE
Mathematics
Morse theory and flow categories

LEXI CARLSON

Chemistry

Hydrogen gas production from an iridium-ruthenium hydride complex

NICK CHAIYACHAKORN

Mathematics

Three easy pieces in harmonic analysis: singular integrals, the hardy space H^1 , and boundedness results

AMELIA CHAMBLISS

Physics

Plasma particle containment in magnetic confinement fusion devices: the magnetic mirror machine and a toroidal confinement field

DOROTHY CHENG

Biochemistry and Molecular Biology

Structural and biochemical characterization of NiaR: regulator of NAD biosynthesis

KYU YEON CHO

Mathematics

Integer programming methods and the fleet assignment problem

MILES COHEN

Physics

Single particle quantum mechanics with the Schrödinger-Poisson equation

TAMAR CONNER

Biochemistry and Molecular Biology

Characterization and binding studies: tellurium resistance proteins terD and terE

BECKETT CUMMINGS

Physics

N-body simulation of cosmological structure

JACOB CUTSHALL

Physics

Using passive error correction to extend the lifetime of qubits

VICKI DENG

Biochemistry and Molecular Biology

Elucidating the biochemical function of the *Drosophila* CG11811 protein implicated in non-muscle myosin II regulation

RY DENNIS

Biology

Phylogeny and selection on the dihydroflavonol 4-reductase gene of ranunculaceae

JOSH DEY

Physics

Reservoir computing: neural networks and observing nonlinear dynamical systems

COSMOS DONG

Physics

Predicting spatio-temporal chaos with reservoir computing

WENXIN DU

Mathematics

A close look at specification curve analysis and existing applications

JESSE DUHAN

Biology

CBD inhibits type III secretion dependent pathogens by altering virulence expression

ELY EASTMAN

Physics

Joint spectral characterization of a spontaneous parametric down conversion source

NICK EMPSON

Chemistry

An attempted isolation of erinacines A and C from lion's mane mushroom mycelium

SAXTON FISHER

Chemistry

Inhibition of *S. aureus*' Mn(II) import pathway MntABC: a study using saturation transfer difference nuclear magnetic resonance spectroscopy

CANYON FOOT

Mathematics

Graphical approaches to recovering distributions under selection bias and missing data

KAYLA GOLD

Biology

Interdependence in urban forests: ferns, fungi, and herbicide

SABA GOODARZI

Physics

Build-a-bell-workshop: numerical solutions to the von Kármán equations for arbitrary rectilinear plates

VINAY GOPALAN
Computer Science
Sentiment analysis on code-mixed tweets

IRIS GRIFFITH
Mathematics
Do androids dream of electric trees?: classifying and predicting forest attributes using deep neural network models

VIELA GUAY
Physics
The Meissner effect and critical current density in fabricated YBCO cylindrical superconductors

COLLIN GUO
Mathematics
Linearizing quadratic stochastic processes for metagame mixing time analysis

MIFFY GUO
Biology
Social stress modifies telomere length and telomerase activity in *Astatotilapia burtoni*

OLIVIA HAGEN
Biology
Proliferation in the zebrafish optic tectum as a function of visual input

TRENOR HAMILTON
Physics
A beginner's guide to CMS open data analysis

MARGARET HEBERT
Chemistry
DART-ing towards measuring the kinetics of reactions in real time

KAITLYN HEPP
Mathematics
Rowmotion on doppelgänger pairs

TED HUME
Chemistry
Investigating emissions from major diesel sources in Portland, OR

JILLIAN JAMES
Computer Science
Lengthy language generation: using neural networks to write a Reed thesis

ZEKI KAZAN
Mathematics
The longest increasing subsequence as a test statistic

JO KELLER
Chemistry
Hydrogen production reaction of an iridium half-sandwich complex

YOUNG KIM
Mathematics
Resolutions of Rees algebras

MASON KOCH
Computer Science-Mathematics
Reinforcement learning for Pokemon AI

NOAH KOSTER
Computer Science-Mathematics
Neuronal dynamics of the action potential: spiking behavior in the Fitzhugh-Nagumo model and others

NICOLE KRETEKOS
Chemistry
Ozone, terpenes, and nitrates, oh my!: an investigation into the reactivity of nitrate esters and terpene oxides with ethanol, methanol, and water

IPSITA KRISHNAMURTHY
Biochemistry and Molecular Biology
Biophysical characterization of the metal binding behavior of Mn(II) and Zn(II) to the *Staphylococcus aureus* MntABC transporter

JAMIE LINDNER
Biology
Synergistic biodegradation of polyethylene terephthalate by *Pseudomonas* and *Bacillus*

NIC LISI
Chemistry
Expression and purification of the terF protein from the tellurite resistance operon

THOMAS MALTHOUSE
Physics
Calculating stationary states of open quantum systems using a neural network ansatz

ABENEZER MAMO
Computer Science
Scalable learning for the odd-man-out task with applications to word vector induction

SAVANNAH MCBRIDE
Biology
Characterizing the *Xenopus laevis* xTERT proximal promoter

MALCOLM MCCARTHY

Physics

An apparatus for measuring large scale cosmic ray anisotropy through water Cherenkov muon detection

ALICE MCKEAN

Computer Science

A replication of the AKS primality decision algorithm

ALI MCKNIGHT

Chemistry

Investigations into the condensed phase reactions of nitrate esters derived from atmospherically relevant monoterpenes

HANNAH MEAD

Computer Science

Untangling tech and timbre: assumptions make algorithms

JOE MEYER

Computer Science

Generating free verse poetry with transformer networks

CLAIRE MILANDER-MASHLAN

Biology

Telomerase in *Xenopus laevis*: half-life and TERT expression

MONICA MONIOT

Computer Science

Differentially private bootstrap

JULIA MONTES-LAING

Biology

Regulation of microtubule polarity by the spectraplakins short stop and the GAS2 family protein pickled eggs

RYAN NEUMANN

Computer Science

An exploration of reinforcement learning through video games

HIEN NGUYEN

Computer Science

Investigating the effectiveness of byte pair encoding for low-resource machine translation

DAVID NOECKEL

Biochemistry and Molecular Biology

Aqueous photochemistry of tannin degradation by reactive singlet oxygen

SHAWN OWENS

Biology

Telomerase activity in *Xenopus* cultures subjected to DNA damage treatments

MATTHEW PARSON

Biochemistry and Molecular Biology

A SpecTerCular protein: expression and characterization of the integral membrane protein TerC

ASHER PAYTON

Mathematics-Physics

A simple bound state

CHASE PICKETT

Biology

Investigation of circadian and homeostatic sleep regulation in *D. melanogaster*

ANNAPURNA POST-LEON

Biology

Barking up the right tree: evidence for reduction in xylem embolism due to bark water uptake in bigleaf maple, Douglas fir, and coast redwood

GABE PREISING

Biology

A computational network approach to examine biological cross-talk during mouthbrooding in the cichlid *Astatotilapia burtoni*

SKY PRICE

Biochemistry and Molecular Biology

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A Note on the Beginnings of Reed College & Commencement

In the late 1800s, the Reverend Thomas Lamb Eliot suggested to two of his parishioners, Oregon pioneers Simeon and Amanda Reed, that they use their wealth for the betterment of society. He urged them to found “a Reed Institute of lectures and arts and music and museum.” In 1908, with contributions from Simeon and Amanda’s estate after their deaths, a board of trustees led by Eliot established the Reed Institute in Portland, Oregon.

Reed College began its first classes in 1911 with 50 students—26 men and 24 women—and 15 faculty members. As an innovative experiment to restore relevancy to the liberal arts in an age dominated by science and industry, Reed sought neither the size and specialization of the university nor the intercollegiate athletics and elaborate social life that had become standard at many private colleges.

Under the inspiration and guidance of Reed’s founding president, William Trufant Foster, the college set out to build a democratic community without regard for nationality, gender, religion, race, or class. No fundamental distinctions were made between students and faculty in what was called “the quest for truth.” Students were expected to do original work in a major subject area—the senior thesis. A principle of honor governed all aspects of campus life.

Reed held its first commencement ceremony in 1915, for which President Foster conferred degrees on the back steps of Eliot Hall. In the last few decades, the college has usually invited a notable graduate to give the commencement address; recent alumni commencement addresses have been given by Kathleen Saadat ’74, Igor Vamos ’90, Jennifer Ferenstein ’88, Robert Smith ’89, Larry Sanger ’91, and Michelle Nijhuis ’96.

For over a hundred years Reed has remained steadfast in its belief in the intrinsic value of rigorous scholarship, the joy of serious intellectual pursuit, and the essential role of community in the development of knowledge.

A Note on Academic Regalia

Academic regalia worn at commencement reveal different types of academic achievement through the use of different styles and colors of gowns and hoods. The bachelor’s gown has a long, pointed sleeve; the master’s is a long closed sleeve with a slit at the elbow; and the doctor’s is a very full, bell-shaped sleeve with the bands matching the color of the gown opening. The hoods are lined in the official color of the institution that conferred the degree, although the bachelor’s hood is rarely used. The colored velvet binding in the hoods indicates the academic area in which the degree was earned—white for liberal arts, yellow for science, purple for law, red for theology, green for medicine, and blue for philosophy.

REED COLLEGE