

CONTACT INFORMATION	1200 E California Blvd MC 249-17 Pasadena, CA 91125	mg@astro.caltech.edu maxgoldberg.me
EDUCATION	Ph.D. in Astrophysics, California Institute of Technology	2024 (expected)
	M.S. in Astrophysics, California Institute of Technology	2022
	Doctoral Advisor: Konstantin Batygin	
	B.S. in Astrophysics (with honors) & Mathematics, University of Chicago	2019
	Undergraduate Advisor: Daniel Fabrycky	
	Bachelor's Thesis: "Dynamical Detection of Singly-Transiting Circumbinary Planets."	
FIRST AUTHOR PUBLICATIONS	Goldberg, M. , Fabrycky, D., et al. "A $5M_{\text{Jup}}$ Coplanar Circumbinary Planet Around Kepler-1660AB." In prep.	
	Goldberg, M. and Batygin, K. "Dynamics and Origins of the Near-Resonant Kepler Planets." In review.	
	Goldberg, M. , Batygin, K., and Morbidelli, A. "A Criterion for the Stability of Resonant Chains." <i>Icarus</i> , 388, (2022).	
	Goldberg, M. and Batygin, K. "Architectures of Compact Super-Earth Systems Shaped by Instabilities." <i>The Astronomical Journal</i> , 163.5, (2022).	
	Goldberg, M. and Batygin, K. "A Tidal Origin for a Three-body Resonance in Kepler-221." <i>The Astronomical Journal</i> , 162.1, (2021).	
	Goldberg, M. , Hadden, S., Payne, M. J., and Holman, M. J. "Prospects for Refining Kepler TTV Masses Using TESS Observations." <i>The Astronomical Journal</i> , 157.4, (2019).	
CO-AUTHORED PUBLICATIONS	Dai, F., Masuda, K., Beard, C., Robertson, P., Goldberg, M. , et al. "TOI-1136 is a Young, Coplanar, Aligned Planetary System in a Pristine Resonant Chain." <i>The Astronomical Journal</i> , 165.2, (2023).	
AWARDS AND HONORS	Raynor L. Duncombe Student Research Prize	2021
	David and Barbara Groce Travel Fund	2021
	Origins of Life Summer Undergraduate Research Prize Award	2018
	UCISTEM Summer Research Grant	2017
SELECTED TALKS AND POSTERS	"Origins of the Architectures of Compact Multi-planet Systems" (invited) Southwest Research Institute, Boulder	November 2022
	"Architectures of Compact Super-Earth Systems Shaped by Instabilities" Exoplanets IV	May 2022
	"A Tidal Origin for Kepler-221" 52nd DDA Meeting	May 2021
	"A New Method to Detect Circumbinary Planets" National Collegiate Research Conference Harvard University	January 2018

TEACHING
EXPERIENCE

Teaching assistant, California Institute of Technology

- Ay/Ge 133 (hybrid): The Formation and Evolution of Planetary Systems, Fall 2021
- Ph 1c (remote): Electromagnetism, Spring 2021
- Ay/Ge 133 (remote): The Formation and Evolution of Planetary Systems, Winter 2021
- Ph 1a (remote): Classical Mechanics, Fall 2020

Teaching assistant, University of Chicago

- BPRO 28800: From Fossils to Fermi's Paradox: Origin and Evolution of Intelligent Life, Winter 2019

OUTREACH AND
MENTORING

Summer Research Connection Mentor, Caltech 2021

Mentored three high school students, teaching the basics of n-body simulations and Galilean moon formation to study the role of giant impacts in the Jovian system

Caltech Astronomy Outreach 2019–2022

2× Astronomy on Tap Speaker

Panelist, answered astronomy questions after an outreach presentation

Led public telescope observations of planets and the transit of Mercury

Assisted in Planet Finder Academy, program for high school students to learn about astronomy and exoplanet detection

PROFESSIONAL
SERVICE

Referee for Monthly Notices of the Royal Astronomical Society, Astronomical Journal, Astronomy & Astrophysics