

Gillen Brown

Department of Astronomy, University of Michigan — gillenb@umich.edu

Education

University of Michigan

Ph.D. in Astronomy

Advisor: Oleg Y. Gnedin

Topic: Chemical Evolution of Simulated Milky Way Sized Galaxies

Ann Arbor, MI

September 2016 — May 2022

University of Missouri-Kansas City (UMKC)

B.S. Physics with emphasis in Astronomy

Math and Computer Science minors

Kansas City, MO

May 2016

Publications

3. **Brown, G.**, Gnedin, O. Y., “Improving performance of zoom-in cosmological simulations using initial conditions with customized grids”, 2021, *New Astronomy*, 84, 101501
2. **Brown, G.**, Gnedin, O. Y., “Nuclear Star Clusters in Cosmological Simulations”, 2018, *ApJ*, 864, 94
1. Gonzalez, A., Gettings, D., Brodwin, M., et al. including **Brown, G.**, “The Massive and Distant Clusters of WISE Survey. I: Survey Overview and a Catalog of >2000 Galaxy Clusters at $z \simeq 1$ ”, 2019, *ApJS*, 240, 33

Presentations

- Santa Cruz Galaxy Workshop, August 2019, poster: “Star Cluster Formation in Cosmological Simulations”
- University of Michigan Graduate Student Lunch Talks, December 2019, talk: “Galactic Chemical Evolution in Cosmological Simulations”
- University of Michigan Graduate Student Lunch Talks, April and September 2017, talk: “Nuclear Star Clusters in Cosmological Simulations”

Grants and Computing Time Allocations

XSEDE Stampede2 — 7.44 million CPU-hour allocation, Co-I (Oleg Y. Gnedin)

2020

Michigan Institute for Computational Discovery and Engineering — Catalyst Grant, Co-I (Oleg Y. Gnedin)

2020

Teaching

Graduate Student GSI Mentor

Fall 2019 — Present

GSI, Astro 201 — Introduction to Astrophysics

Winter 2021

Instructor of Record, Astro 127 — Naked Eye Astronomy

Spring 2019

GSI, Astro 102 — Introductory Astronomy: Stars, Galaxies, and the Universe

Winter 2019

GSI, Astro 107 — The Dark Side of the Universe

Winter 2019

GSI, Astro 101 — Introductory Astronomy: The Solar System and Search for Life

Winter & Fall 2017

Activities

UM Astronomy Antiracism Reading Group — Leadership Team	2020 — present
UM Astronomy Galaxy Group Organizer	2019 — present
Michigan Institute for Data Science — Basketball Data Challenge — Winner	2020
UM Astronomy Prospective Student Weekend Organizer	2020
UM Astronomy Prelim Review Committee — Graduate Student Representative	2019 — 2020
UM Astronomy Curriculum Committee — Graduate Student Representative	2018 — 2019
UM Astronomy Graduate Student Colloquium Lunch Organizer	2018 — 2019

Outreach

Astronomy on Tap: Ann Arbor — Leadership Team	2019 — present
Michigan Dark Skies Group Member	2017 — present
University of Michigan Museum of Natural History Science Communication Fellow	2019

Public Talks

University of Michigan Museum of Natural History, “Building the Universe”	9 times in 2019 — 2020
Astronomy on Tap: Ann Arbor, “Origin of the Elements”	October 2019
Ann Arbor Hands-On Museum, “How the Moon Formed”	July 2019
Ellis Library & Reference Center, “The Scientific Legacy of the Moon Landings”	July 2019
Nerd Nite Ann Arbor, “Origin of the Elements”	March 2019
Ignite Ann Arbor, “Reclaiming the Night Sky”	November 2018