Yingtian "Bill" Chen
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Education

- **University of Michigan Department of Astronomy** | Ann Arbor, US   2020 – 2026
  Ph.D. candidate in Astronomy and Astrophysics
  M.S. in Astronomy and Astrophysics

- **Peking University School of Physics** | Beijing, China   2016 – 2020
  B.S. in Physics (with honours)

Experience

- **Visiting Researcher**, MIT Kavli Institute | Cambridge, US   2019

Publications

- **10 publications in total:** citations > 110, h-index = 7
- **8 publications as first author:** citations > 100, h-index = 6

Publications as first author

1. **Chen**✉, Li✉, & Gnedin (2025) "Stellar streams reveal the mass loss of globular clusters", *ApJL* **980**, L18.
2. **Chen**✉, Valluri, Gnedin, & Ash (2025) "Improved particle spray algorithm for modeling globular cluster streams", *ApJS* **276**, 32.
3. **Chen**✉ & Gnedin (2024) "Galaxy assembly revealed by globular clusters", *OJAp* **7**, 23.
4. **Chen**✉ & Gnedin (2024) "Catalogue of model star clusters in the Milky Way and M31 galaxies", *MNRAS* **527**, 3692.
5. **Chen**✉ & Gnedin (2023) "Formation of globular clusters in dwarf galaxies of the Local Group", *MNRAS* **522**, 5638.
6. **Chen**✉ & Gnedin (2022) "Modeling the kinematics of globular cluster systems", *MNRAS* **514**, 4736.
7. **Chen**, Li✉, & Vogelsberger (2021) "Effects of initial density profiles on massive star cluster formation in giant molecular clouds", *MNRAS* **502**, 6157.
8. **Chen** & Ma✉ (2021) "Novel pre-burst stage of gamma-ray bursts from machine learning", *JHEAp* **32**, 78.

Other publications

9. Ash✉, Valluri, **Chen**, & Bell (2024) "Stellar bars form dark matter counterparts in TNG50", *ApJ* **976**, 189.
10. Pearson✉, Bonaca, **Chen**, & Gnedin (2024) "Forecasting the population of globular cluster streams in Milky Way-type galaxies", *ApJ* **976**, 54.

Honours and Awards

- **Rackham Conference Travel Grant**   2023 & 2024
- **Rackham International Student Fellowship**   2021
- **Weiming Physics Scholarship** (未名物理学子)   2020
- **Outstanding Graduate** (北京市普通高等学校优秀毕业生)   2020

- **First Prize** & **Best speaker**, Xingcheng Forum (兴诚本科生学术论坛) · 2019
- **Huabao Funding for Undergraduate Research Program** (本科生科研华宝基金) · 2018
- **National Scholarship** (国家奖学金) · 2018
- **Pacemaker to Merit Student** (三好学生标兵) · 2018
- **Outstanding Award** & **SIAM Award**, Mathematical Contest in Modeling · 2018
- **Gold Medal**, Chinese Physics Olympiad (全国中学生物理竞赛) · 2015

Talks

- **Invited talk**, *DESI MWS telecon* | Remote · 2024
- **Poster** & **flash talk**, *DGSCS 2024*, University of Chicago | Chicago, US · 2024
- **Seminar**, Peking University, Tsinghua University, Shanghai Normal University, Shanghai Astronomical Observatory, Shanghai Jiao Tong University, Purple Mountain Observatory, Nanjing University, Zhejiang University | Beijing/Shanghai/Nanjing/Hangzhou, China · 2024
- **Talk**, *Astronomy graduate student lunch talk series*, University of Michigan | Ann Arbor, US · 2021 – 2024
- **Invited talk**, *Galaxy formation group meeting*, CCA, Flatiron Institute | New York, US · 2024
- **Invited talk**, University of Chicago | Remote · 2024
- **Invited talk**, *SMWLV Star Clusters Working Group meeting* | Remote · 2023
- **Conference talk**, *MODEST-23*, Northwestern University | Evanston, US · 2023
- **Conference talk**, *Great Lakes Clusters and Streams*, University of Michigan | Ann Arbor, US · 2023
- **Talk**, *Seminar for undergraduate students*, Peking University | Beijing, China · 2019
- **Talk**, *Xingcheng Forum*, Peking University | Beijing, China · 2019
- **Talk**, *Seminar for theoretical physics*, Fudan University | Shanghai, China · 2019

Service

Professional service

- **Referee:** *ApJ* and *MNRAS* · Since 2023
- **Session co-chair:** *DGSCS 2024* · 2024
- **Local organizing committee chair:** *Great Lakes Clusters and Streams* · 2023
- **Code developer:** `ART`, `gala`, `galax`, and `galpy` · Since 2024
- **Organizer:** University of Michigan Stellar Halos Group meeting · Since 2024

University service

- **Organizer:** Astronomy graduate student lunch talks · 2024 – 2025
- **Organizer:** Astrocoffee journal club · 2022 – 2025
- **Chair:** University of Michigan Chinese astronomers networking group · Since 2022
- **Graduate student instructor:** ASTRO 104, 106, and 115 · 2021 & 2024
- **Organizer:** Preliminary examination preparation club · 2022 – 2023
- **Department bread baker** · 2021 – 2022

Skills

- **Programming Languages:** `C/C++, Python, Latex, MATLAB, HTML/CSS...`
- **Software/packages:** `ART, AREPO, GADGET, MPI, AGAMA, multiprocessing, NumPy, Matplotlib, SciPy, scikit-learn, PyTorch, Astropy, yt, gala, galax, galpy, Git, Bootstrap...`
- **Languages:** Mandarin Chinese (native), English (fluent)

References

- **Dr. Oleg Y. Gnedin**, Professor, University of Michigan; ognedin(at)umich.edu
- **Dr. Monica Valluri**, Research Professor, University of Michigan; mvalluri(at)umich.edu
- **Dr. Hui Li** (李辉), Assistant Professor, Tsinghua University; hliastro(at)tsinghua.edu.cn