

# 838. Towards Equitable, Diverse, and Inclusive Science Collaborations: The Multimessenger Diversity Network

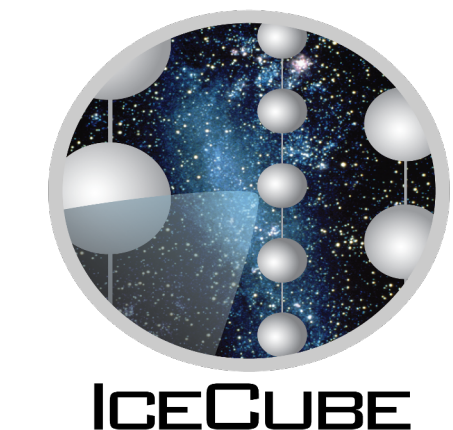
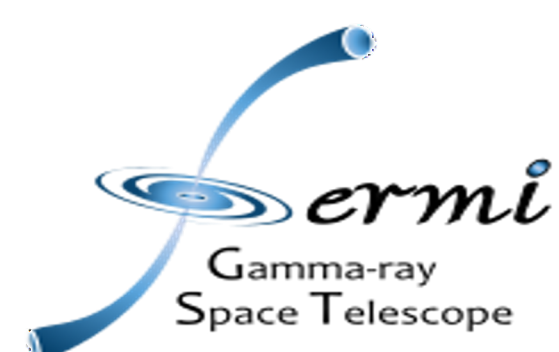
Ellen Bechtol (WIPAC) and Jim Madsen (WIPAC) for the Multimessenger Diversity Network and the IceCube Collaboration

## Abstract

The Multimessenger Diversity Network (MDN), formed in 2018, extends the basic principle of multimessenger astronomy – that working collaboratively with different approaches enhances understanding and enables previously impossible discoveries – to equity, diversity, and inclusion (EDI) in science research collaborations.

With support from the National Science Foundation INCLUDES program, the MDN focuses on increasing EDI by sharing knowledge, experiences, training, and resources among representatives from multimessenger science collaborations. Representatives to the MDN become engagement leads in their collaboration, extending the reach of the community of practice.

Here we provide an overview of the MDN structure, lessons learned, and how to join.



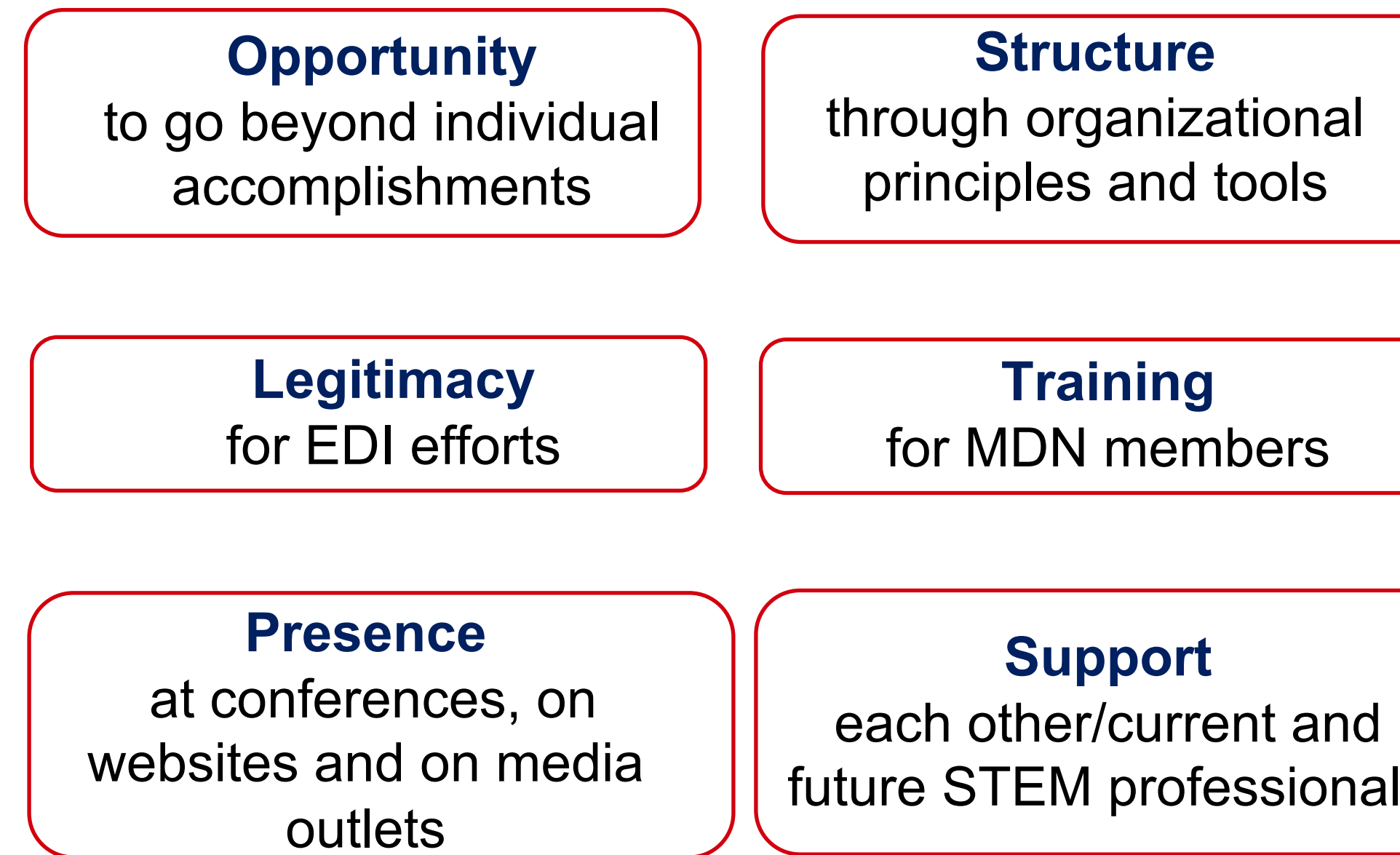
## Overview

The MDN is a community of representatives from multimessenger astronomy research collaborations focused on increasing EDI. To do this, representatives share knowledge, experiences, and training and co-develop resources. As a community of practice, MDN members work together to produce transformational change.

The tenets below are adopted from training by Lou Woodley, AAAS/Community Initiatives.

- **Interactions:** Community learning
- **Goal:** Create new knowledge together
- **Power Balance:** Mutual sharing and learning
- **Mindset:** Let's figure this out together

## Components



## Example Activities

**Collaboration-wide surveys.** Within the MDN, the survey experiences of NANOGrav have directly informed the discussions of a survey within the IceCube Collaboration. NANOGrav representatives have shared their experiences about surveys, not just about survey planning and execution, but critically about how the collaboration takes action based on survey results.

**Mentoring programs.** A recent meeting of the MDN illustrates how the EDI-focused MDN community of practice operates. The Fermi-LAT representative described their recently launched graduate student mentoring program and volunteered to arrange a talk at a subsequent MDN meeting. The mentoring program lead gave a 20-minute presentation, followed by a Q&A session. The Fermi-LAT group graciously shared their resources including the program proposal and interest form with the MDN, encouraging others to use them as springboards for mentoring programs in their own collaborations.

## Lessons Learned

EDI in STEM have taken on a heightened level of recognition and importance. The global COVID-19 pandemic, as well as reckoning with racial injustice in the U.S. and elsewhere, have exacerbated and made more obvious disparities in experiences and opportunities in STEM.

Despite the growth in awareness and importance of EDI in STEM, this work is still overwhelmingly volunteer-based. It remains a challenge for individuals to dedicate time to EDI efforts. This is still largely true within the MDN, and planned activities have changed to better align with the time and effort people are able to put into the community. For now, that means a focus on monthly meetings, select field-wide efforts, and ongoing conversations via a Slack organization.

**Next steps** of the MDN include continuing regular meetings, expanding our reach and impact, and pursuing new funding sources.

## Join Us

- Follow our website and browse the repository: [astromdn.github.io/](https://astromdn.github.io/)
- Get in touch: [ellen.bechtol@icecube.wisc.edu](mailto:ellen.bechtol@icecube.wisc.edu) or [jim.madsen@icecube.wisc.edu](mailto:jim.madsen@icecube.wisc.edu)
- Learn more:
  - [icecube.wisc.edu/news/view/640](https://icecube.wisc.edu/news/view/640)
  - [icecube.wisc.edu/news/view/670](https://icecube.wisc.edu/news/view/670)
  - Astro2020 APC White Paper: [Pursuing diversity, equity, and inclusion in multimessenger astronomy collaborations over the coming decade](#)

## Acknowledgements

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## By the Numbers

- 26 Meetings including: 7 guest speakers and 7 special topic discussions led by MDN representatives
- 6 New collaborations joined founding MDN collaborations
- 3 Conference presentations
- 1 Astro2020 State of the Profession white paper co-authored
- 1 Website and repository developed
- 1 Three-day workshop

