

**SearchLites** Vol. 28 No. 1, Winter 2022 The Quarterly Newsletter of The SETI League, Inc.

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# SETI League Welcomes New IAA SETI Committee Leadership Team by H. Paul Shuch Executive Director Emeritus

The SETI Permanent Committee of the International Academy of Astronautics, which serves in an advisory capacity to the United Nations Office of Outer Space Affairs (and whose membership has long included a good many SETI League members), has recently elected a new leadership team to serve for the next two years.

The Committee is now chaired by Prof. Michael Garrett. For years, he served as one of the Committee's two vice-chairs. Formerly Director of ASTRON in the Netherlands, Mike is now the Sir Bernard Lovell Chair of Astrophysics at Manchester University, and Director of the University's famed Jodrell Bank Observatory.

The two new vice-chairs of the Committee are Drs. Carol Oliver and Andrew Siemion. Long active in the SETI community, Carol is Associate Professor of Biological, Earth, and Environmental Sciences at University of New South Wales, and also an internationally known expert in evidence-based science communication. Carol has a strong background in online learning and teaching, and interests in astrobiology and space science. Formerly Committee Secretary, Andrew is currently Director of the Berkeley SETI Research Center at the University of California, and also holds the Bernard M. Oliver Chair for SETI at the SETI Institute in California. He is one of the most active and respected authorities on the Search for Extraterrestrial Intelligence, leveraging both radio and optical astronomy techniques.

Stepping up as the new Committee Secretary is geologist Lori Walton, a longtime SETI League member and frequent participant at IAA Astronautical Congresses. Lori is the president or founder of several prominent mining companies in Canada.

I would be remiss if I did not express my personal gratitude to active SETI League member Dr. Claudio Maccone, who held the position of SETI Committee Chairman for the past nine years. Before that, Claudio and I served together as the Committee's two vice-chairs for roughly a decade. Although we are both long retired, it is my hope that Claudio and I will continue to serve the Committee well into the future.

## *Guest Editorial:* SETI Institute's Allen Telescope Array Threatened by Wildfire by Rebecca McDonald Communications Director, SETI Institute

The Allen Telescope Array, an ensemble of 42 antennas used in the search for extraterrestrial intelligence (SETI), is once again threatened by wildfires. The scientists and engineers normally on-site have been evacuated as a precautionary measure, and in response to an order from the Shasta County Sheriff's Office.

The Dixie Fire, which is currently approximately 12 miles south of the Array, covers just short of a million acres, or an area larger than the state of Rhode Island. It ranks as the second-largest fire in California history, just shy of last year's August Complex fire. Now 59 percent contained, it is one of eight major conflagrations in northern California.

It is an unfortunate fact that environments that are suitable for radio telescopes – including the Allen Telescope Array – are also frequently places where wildfires are commonplace. Since microwaves, the type of radio signals sought by the Array, are not hampered by Earth's atmosphere, there's no reason to place such instruments on mountain tops, as is done for optical telescopes.

But like their mirror-and-lens cousins, radio telescopes are generally located in rural areas. The signals sought by the Allen Array are presumed to be extremely faint, and radio quiet is a necessity. The Hat Creek Radio Observatory, where the Array is located, was established in 1959 and is now run by the SETI Institute. It was deliberately situated in a region of low population density. The surrounding landscape consists of pasture and forest land. On most days there are more cattle near the site than people.

According to Alex Pollak, the Array's Science and Engineering Operations Manager, the fire's slow northward march has provoked the need for evacuation. Anticipating the possibility that it might reach the antennas; the observatory staff contacted the U.S. Forest Service's Fire Department to prepare the site against eventual damage. Two teams from the Forest Service, about a dozen people in total, removed brush from near the antennas. Trees in the area were pruned of any branches lower than ten feet above the ground.

This is not the first time the Array has been threatened. In the summer of 2014, the socalled Eiler fire reached State Highway 89, approximately two miles from the antennas. The mom-and-pop Circle K restaurant, the only public dining facility in Hat Creek, met its end in that conflagration.

The Allen Telescope Array is a unique facility. It is the only radio telescope constructed with SETI as a principal activity. It's 42 telescopes are currently being refurbished with more sensitive receivers and follow-on electronics that will greatly speed the search for signals that would prove the presence of technological societies in other star systems. This upgrade is funded by Franklin Antonio, a cofounder of the California semiconductor company, Qualcomm.

As of writing, there are more than 4,000 firefighters battling the Dixie Fire, and the hope is that it will not reach the Observatory. But as Pollak notes, climate change has made "the entire west coast more susceptible to fire. The situation is not getting better."

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www.smile.amazon.com. In the "Pick your own charitable organization" box, just type in "SETI League." Now, every time you shop Amazon, they will donate a half percent of your purchase price to SETI research!



SETI League members are encouraged to nominate SETI-relevant websites for our monthly SETI SuperStar Award. Nominating emails to our Awards Committee may be sent to:

Awards\_at\_setileague\_dot\_org.

Please be sure to indicate the URL of the candidate website you are nominating, and a brief explanation as to why you consider the site worthy of recognition.

# **Event Horizon**

SearchLites readers are apprised of the following conferences and meetings at which SETI-related information will be presented. League members are invited to check our World Wide Web site (www.setileague.org) under *Event Horizon*, or email to us at info@setileague.org, to obtain further details. Members are also encouraged to send in information about upcoming events of which we may be unaware.

**December 15 - 19, 2021**: 79th World Science Fiction Convention, Washington, DC.

**April 24, 2022, 1300 EDT (tentative)**: Twenty-Eighth SETI League Annual Membership Meeting, to be held virtually on the Zoom online platform.

June 27 - 30, 2022: Penn State SETI Symposium, State College, PA.

September 1 - 5, 2022: 80th World Science Fiction Convention, Chicago, IL.

**September 18 - 22, 2022**: 73rd International Astronautical Congress, Paris, France.

September 25 - 29, 2023: 74th International Astronautical Congress, Baku, Azerbajian.

**October 11 - 18, 2024**: 75th International Astronautical Congress, Milan, Italy.

Please note that the global COVID-19 pandemic has resulted in the cancellation or rescheduling of many planned scientific meetings and conferences. We recommend you check with the event sponsors for updates before making travel arrangements. ❖



The 2021 Annual Meeting and Space Symposium of our sister organization AMSAT (Radio Amateur Satellite Corporation) was conducted online on 30 October, with many SETI League members participating. The meeting was dedicated to the memory of AMSAT President Emeritus Dr. Thomas A. Clarke of NASA Goddard Space Flight Center, who passed away on 28 September 2021.



At a recent online Zoom meeting of the Central Pennsylvania MENSA Executive Committee (on which he serves), SETI League executive director emeritus H. Paul Shuch volunteered to present an update on the Interstellar Beacon project at the group's upcoming Regional Gathering.



The SETI League congratulates Prof. Michael Garrett on being named the new Chairman of the International Academy of Astronautics SETI Committee. Garrett and SETI League executive director H. Paul Shuch have both served as the Committee's vice-chairs. Formerly Director of AS-TRON in the Netherlands, Mike is now the Sir Bernard Lovell Chair of Astrophysics at Manchester University, and Director of the famed Jodrell Bank Observatory.



The SETI League thanks Argonaut Scott Carter, VE3CGN, for recently accepting re-appointment to the volunteer position of Regional Coordinator for Central Canada.



The SETI League congratulates our colleague Dr. Kathryn Denning, an anthropology professor at York University in Canada, on being named to the SETI Institute's Scientific Advisory Committee. Prof. Denning is seen here at a 2008 UNESCO SETI conference in Paris, giving an excellent paper on unpacking the SETI transmission debate.



The SETI League thanks member Lori Walton for accepting appointment to the position of Secretary to the International Academy of Astronautics SETI Committee. Lori is seen here at the Arecibo Observatory in 2007.



The SETI League welcomes Dr. Carol Oliver as a new vice-chair of the International Academy of Astronautics SETI Committee. Long active in the SETI community, Carol is Associate Professor of Biological, Earth, and Environmental Sciences at University of New South Wales.



The SETI League congratulates Dr. Andrew Siemion on his election as a new vice-chair of the International Academy of Astronautics SETI Committee. Formerly Committee secretary, Andrew is Director of the Berkeley SETI Research Center at the University of California.



Finally, we owe our thanks to longtime SETI League member Dr. Claudio Maccone for his nine years of service as Chairman of the IAA SETI Committee. His term of office ended in September. Before chairing the Committee, he and H. Paul Shuch served together as its vice-chairs.



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Printed in the USA

### ADDRESS SERVICE REQUESTED

# Annual Renewal: Is This Your Last *SearchLites*?

SETI League memberships are issued for the *Calendar Year*. Please check the expiration date indicated on your mailing label. If it reads December 2021 or earlier, you have already expired, and *must* renew your SETI League membership **now!** Please fill out and return this page along with your payment.

### Please renew my membership in this category:

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Scholarship Member (full-time students only)	\$25 / yr
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Life Member (until we make contact)	\$1,000
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Patron (priority use of The SETI League's radio telescope)	\$10,000
Director (Patron membership plus seat on advisory board)	\$100,000
Benefactor (a major radio telescope named for you)	\$1,000,000

Annual memberships are issued for the calendar year. Those processed in January through April expire on 31 December of that year. Those processed in September through December expire on 31 December of the *following* year. Those members joining in May through August should remit half the annual dues indicated, and will expire on 31 December of the same year.

### Pleased to Accept PayPal

The SETI League invites you to pay your membership dues and additional contributions via credit card, using the PayPal online payment system. Simply log on to www.paypal.com and specify that your payment be directed to paypal@setileague.org.

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SETI League Technical Manual (CD)	\$10	\$13
Project Cyclops 2 <sup>nd</sup> Edition	\$20	\$30
The Listeners by James Gunn	\$15	\$21
Sing More Songs of SETI (Songbook)	\$10	\$13
Sing a Song of SETI (music CD)	\$15	\$18
Sing More Songs of SETI (music CD)	\$15	\$18
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