

•———— 1st IAA SYMPOSIUM ON *-*

MOON FARSIDE PROTECTION

•——— TURIN (TORINO), ITALY ———• MARCH 21-22, 2024

- SPONSORSHIP PROPOSAL -

UNDER THE PATRONAGE OF

LOCALLY ORGANIZED BY













Sponsorship Request for the 1st International IAA Symposium on Moon Farside Protection

We hereby submit this request to seek sponsorship for the 1st International Congress of the IAA (International Academy of Astronautics) on Moon Farside Protection, scheduled to take place in Turin on March 21-22, 2024. We believe that this event holds significant international value not only in the scientific field. The financial contribution that your organization could provide, crucial for the success of the event, would also be a significant recognition and honor.

The Symposium will be free for all participants and is primarily aimed at the academic community, scientists, international organizations, space agencies, space industries, and students. Additionally, the entire Symposium will be streamed online.

Below, we briefly summarize some key elements of the Symposium to highlight its importance and reasons for interest among all potential stakeholders.

On the last page, the three sponsorship plans are outlined, with key features including: visibility on communication channels, speaking opportunities during the Symposium, and targeted networking during the gala dinner.

THE IMPORTANCE OF THE MOON FARSIDE

The Moon has the unique property of naturally shielding radio waves generated by human activities on Earth and around it. This results in a wide radio silence zone on and above its Farside, called Shielded Zone on the Moon (SZM).

Therefore, the Farside becomes a region of utmost scientific interest, as it provides an environment free from the electromagnetic pollution typical on Earth. In particular, some of the branches of science that would greatly benefit from operating from the Farside are: Cosmology, Astrobiology, Planetary Defense, and SETI/Technosignatures.

- 1. COSMOLOGY To detect the extremely feeble radiation of the hydrogen line at 1420 MHz, downshifted to much lower frequencies, MHz or kHz, due to the 14 billion years of universe expansion. The radio silence of the Farside would ensure a significant leap forward in research.
- 2. ASTROBIOLOGY To study pre-biological interstellar molecules through their roto-vibrational spectra: a fine search for weak spectral lines that can be supported by advanced radio telescopes in combination with the radio silence of the Moon Farside.
- 3. PLANETARY DEFENSE From the Moon Farside, radar and optical telescopes can be used for accurate measurements, without interference, of the main parameters of NEOs (Near-Earth Objects) to increase the lead time.
- 4. SETI/TECHNOSIGNATURES To search, with very low noise, for "signatures" of Alien Civilizations that would reach us extremely faint due to the vast distances between stars in the Milky Way, if not from other galaxies.



WHY THIS SYMPOSIUM?

In December 2021, IAA established a new Permanent Committee devoted to the Moon Farside Protection. This new Committee is chaired by Prof. Claudio Maccone, one of the Technical Directors of the IAA, and cochaired by Prof. Jack Burns of the University of Colorado at Boulder (USA).

Furthermore, in September 2022, the first Special Session on Moon Farside Protection was held during the International Astronautical Congress (IAC) in Paris, organized by Prof. Claudio Maccone and Prof. Jack Burns, and it will be held again in October 2023 during the IAC in Baku.

To further raise the level of international attention and involvement on this topic, Prof. Claudio Maccone conceived the first-ever international Symposium on Moon Farside Protection, to be held in 2024 in Turin (Torino, Italy), chosen for its significant space tradition.

Recent lunar missions and, even more so, upcoming programs will bring more and more artificial systems around and on the lunar surface, occupying space and emitting radio waves at various frequencies.

This Symposium is thus designed to sensitize and openly involve the global scientific, political, and industrial community on the need to preserve radio silence on the Farside at frequencies relevant for scientific purposes. It aims to prevent future missions from irreversibly compromising the current condition of radio quietness.

Moreover, to ensure the possibility of performing scientific activities, there is a desire to establish a portion of the Farside exclusively dedicated to science, a *protected area*.

As known, there are already various international regulations and resolutions aimed at protecting the SZM (ITU Radio Regulations, ITU-R REC RA.479-5, and SFCG Resolution 23-5 can be mentioned as examples). However, it is of paramount importance to take a further step, both to extend the protected frequencies to encompass all other scientifically relevant ones (in addition to those already included) and to preserve a portion of the farside exclusively for scientific installations. Furthermore, there is a pressing need to elevate these regulations into enforceable and binding treaties for every Space Agency and private company.

All objectives can only be pursued and achieved through diplomatic efforts involving spacefaring nations (current and future) from around the world. The IAA Committee aims at initiating this process during the Symposium with the support and contribution of all scientists, international organizations, space agencies, and private companies participating.

The ultimate goal is to reach a future, hopefully soon, international agreement, ideally under the auspices of the United Nations and its relevant specialized Organizations, such as ITU and COPUOS.

LOCAL ORGANIZING COMMITTEE

- Claudio Maccone (Chair) IAA & INAF
- Nicolò Antonietti IAA & INAF
- Luca Derosa iMEX.A & University of Turin
- Christian Maria Firrone Polytechnic of Turin

Notes: INAF = National Institute for Astrophysics (Italy); iMEX.A = Aerospace Engineering Company (Italy)

PATRONAGES

International Telecommunication Union (ITU) – International Astronomical Union (IAU) Università di Torino (University of Turin) – Accademia delle Scienze di Torino (Academy of Sciences of Turin)



DRAFT PROGRAM

The following is the provisional program that outlines the organizations and topics proposed by the Organizing Committee, where you can see highlighted in yellow the slot dedicated to companies that decide to sponsor the Symposium with the Platinum package.

| | TOPIC/ORGANIZATION | INVITED SPEAKER | AFFILIATION/ROLE |
|-------------|--|--|--|
| MARCH 21 | | | |
| | MOON FARSIDE PROTECTION (MFP) INTRODUCTION | | |
| 8.30-9.15 | REGISTRATION | | |
| 9.15-9.30 | Welcome and Opening remarks | Jean-Michel Contant | IAA Secretary General |
| | IAA Welcome Address & Prospects on MFP | Claudio Maccone | IAA Technical Director |
| | Institutional interventions | Alberto Cirio + Stefano Lo Russo | President of Piedmont Region + Mayor of Turin |
| | ASI Welcome Address & Prospects on MFP | TBD | , |
| | INAF Welcome Address & Prospects on MFP | Marco Tavani | INAF President |
| | AIDAA Welcome Address & IAC 2024 Presentation | Erasmo Carrera | AIDAA President |
| | COFFEE BREAK | Erdomo Garrera | AIDANTICION |
| | UniTo Welcome Address & Prospects on MFP | Stefano Geuna | Rector of University of Turin |
| | The International Challenge of Moon Farside Protection | Claudio Maccone | IAA Technical Director |
| | Prospects on Moon Farside Protection | Aziende sponsor platinum | IAA Iccimical Bircciol |
| 12.13-13.00 | Prospects on woon Paiside Protection | Azienae sponsor piacinam | |
| 13.00-14.20 | LUNCH | | |
| | SCIENCE ON THE FARSIDE | | |
| 14.20-14.30 | Introduction | Claudio Maccone | IAA Technical Director |
| | Radio telescopes on the far side | Joseph Silk (Cosmology) | The Johns Hopkins University and Institut d'Astrophysique de Pa |
| | Astrobiology | Rocco Mancinelli | BAER Institute |
| | Planetary Defense | Ian Carnelli | HERA Project Manager at ESA |
| | COFFEE BREAK | | The state of the s |
| 16.30-17.00 | | | |
| | SETI/Technosignatures | Mike Garrett | Director of Jodrell Bank Centre for Astrophysics, University of Manchester |
| 17.30-18.00 | Landing on the farside: Chang'e 4 mission | Ji Wu | General Director of National Space Science Center, Chinese Academy of Sciences |
| | Observing the Early Universe from the Moon's Far Side at Low | | · |
| 18.00-18.30 | Radio Frequencies | Jack Burns | Director, NASA/SSERVI Network for Exploration & Space Science |
| MARCH 22 | | | |
| | INTERNATIONAL ORGANIZATIONS | | |
| 8.50-9.00 | Introduction | Claudio Maccone | IAA Technical Director |
| | UNOOSA-COPUOS | Aarti Holla-Maini | Director |
| 9.30-10.00 | | Kai-Uwe Schrogl | President |
| 10.00-10.30 | A Lunar Policy Decalogue for Safe and Sustainable Lunar Development | Antonino Salmeri | Director of Lunar Policy Platform |
| 10 20 11 00 | | Richard Green | Chair |
| | IAU (Working Group on Lunar Protection) | Richard Green | Chair |
| 11.00-11.30 | COFFEE BREAK | | |
| 11.30-12.00 | CORF+CRAF+RAFCAP | Nathaniel Livesey + Gyula Jozsa + Balthasar Indermuehle | |
| 10.00.10.00 | area. | | |
| 12.00-12.30 | | TBD | 0 |
| 12.30-13.00 | IIU | Vadim Nozdrin | Counsellor of ITU-R Study Group 7 on Scientific Services |
| 13.00-14.20 | LUNCH | | |
| | SPACE AGENCIES AND PRIVATE COMPANIES | | |
| 14.20-14.30 | Introduction | Claudio Maccone | IAA Technical Director |
| | ESA Frequency Management | Edoardo Marelli | ESA Frequency Management |
| 14.50-15.10 | · · · | Cathy C. Sham | NASA Lunar Spectrum Manager |
| 15.10-15.30 | | Yamakawa Hiroshi | President |
| 15.30-15.50 | | Liu Jizhong | Director of China Lunar Exploration and Space Engineering Cent |
| 15.50-15.50 | | Shri S. Somanath | Director |
| | COFFEE BREAK | S.I., S. Somanach | Director. |
| | Nokia Bell Labs | Luis Maestro | Technical Manager of Lunar Constellation Project |
| 17.10-17.40 | | Andrew Haslehurst | CTO |
| 17.10-17.40 | 3311 | Andrew Husienurst | |
| | | All speakers | |

CONTACTS

For any information request or to discuss sponsorship arrangements, please contact the Local Organizing Committee at the email desk@moonfarsideprotection.org

SPONSORSHIP PLANS



PLATINUM

- Logo on all materials
- Name and logo on Symposium social media and website
- Company description on Symposium website
- Company video on Symposium website
- Logo on roll-up banners during the Symposium
- · Logo always with an increased size
- Company presentation on USB for all participants
- 2 seats at the gala dinner with choice of table (networking)
- Speaking slot during the Symposium with live streaming

10.000 €

GOLD

- Logo on all materials
- Name and logo on Symposium social media and website
- Company description on Symposium website
- Logo on roll-up banners during the Symposium
- Company presentation on USB for all participants
- 1 seat at the gala dinner

4.000€

SILVER

- Logo on all materials
- Name and logo on Symposium social media and website
- Logo on roll-up banners during the Symposium

1.000€



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