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ARMENIAN ASTRONOMICAL SOCIETY ArAS Newsletter



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LOCAL NEWS

VICTOR AMBARTSUMIAN REMEMBRANCE DAY

August 12 is commemorated as the Remembrance Day of the prominent Armenian astrophysicist and founder of the Soviet school of theoretical astrophysics, Victor Ambartsumian.

Today marks the 29th anniversary of his passing.

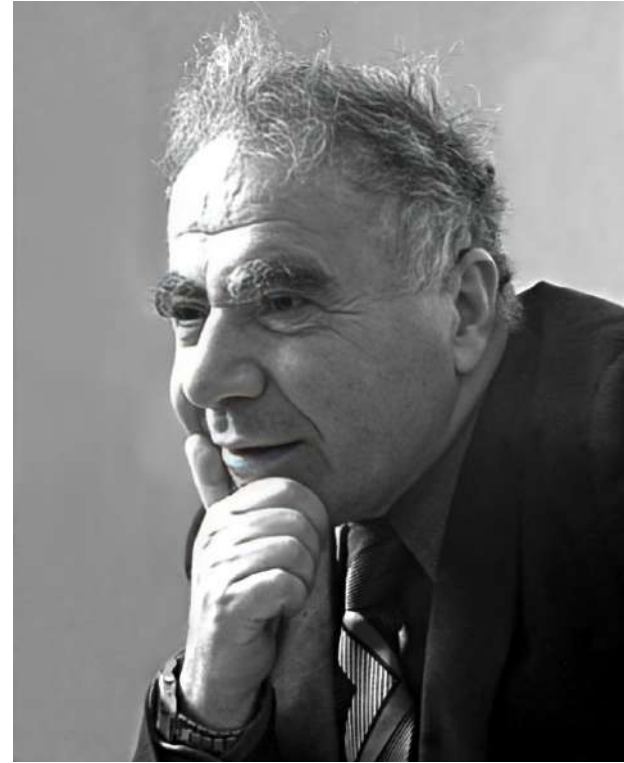
Victor Ambartsumian was born on September 18, 1908. Through his active scientific work and numerous publications, he made a significant contribution to the development of science in Armenia.

Throughout his extensive scientific, organizational, administrative, pedagogical, and editorial activities, Ambartsumian achieved numerous accomplishments. He served as:

- President of the Armenian SSR Academy of Sciences (1947–1993),
- Founder and Director of the Byurakan Astrophysical Observatory (1946–1988),
- Chairman of the Board of the Armenian SSR “Knowledge” Society (since 1947),
- First Editor-in-Chief and Chairman of the Editorial Board of the Armenian Soviet Encyclopedia.

On the international stage, he was Vice President of the International Astronomical Union (IAU, 1948–1955), President of the IAU (1961–1964), and President of the International Council of Scientific Unions (1968–1972), among other positions.

Victor Ambartsumian rests at the Pantheon of the Byurakan Astrophysical Observatory. Although the pantheon was created in 1965, it was officially granted the status of a newly discovered monument of local significance in 2021, following the decision of the RA Ministry of Education, Science, Culture and Sports expert commission. Here lie not only members of Ambartsumian’s family, but also other distinguished figures of Armenian science and culture.



ARMENIA AT THE 18TH INTERNATIONAL OLYMPIAD ON ASTRONOMY AND ASTROPHYSICS (IOAA)

From 11 to 21 August 2025, the Armenian team participated in the 18th IOAA held in Mumbai, India, achieving excellent results.

AM The Armenian team consisted of five students from A. Shahinyan Specialized Physics-Mathematics School: 12th graders Narek Galstyan, Emil Musheghyan, Gor Hasratyan, Vahe Mkrtchyan, and 11th grader Natali Margaryan.

- Silver Medals: Emil Musheghyan and Gor Hasratyan
- Bronze Medal: Narek Galstyan
- Honorable Mentions: Vahe Mkrtchyan and Natali Margaryan

The team was led by Hrant Topchyan (Yerevan Physics Institute) and Artashes Mkrtchyan (A. Shahinyan Specialized Physics-Mathematics School).



PERSEID METEOR SHOWER AT BYURAKAN ASTROPHYSICAL OBSERVATORY

On August 11–13, Byurakan Observatory once again opened its doors to visitors for the annual Perseid meteor shower event, titled *“Look, a star is falling... make a wish!”*.

Guests had the chance to witness one of the most spectacular celestial shows of the year, when up to 100 meteors per hour lit up the summer sky. Alongside stargazing, the program included:

- An open-air lecture on celestial phenomena and the mysteries of the Universe,
- Nighttime telescope observations,
- A special VIP tour of the 1m Schmidt telescope—the same instrument used for Markarian’s world-renowned survey, recognized as a UNESCO heritage contribution,
- Extended opening hours at the V. Ambartsumian House-Museum, until midnight.

Hundreds of visitors, both from Armenia and abroad, joined the event and experienced the beauty of the night sky away from city lights, discovering why Byurakan Observatory is the perfect place “where the darkness is real, and the stars are countless.”



INTERNATIONAL NEWS

CAP2026 – COMMUNICATING ASTRONOMY WITH THE PUBLIC: FIRST ANNOUNCEMENT

Dates: 25–29 May 2026

Location: Yerevan, Armenia (hybrid format for remote participation)

The Communicating Astronomy with the Public (CAP) Conference is the premier international event dedicated to astronomy communication. CAP2026 will bring together some 200 astronomers, educators, communicators, journalists, and enthusiasts from around the world to share best practices, trends, and innovative approaches in public outreach.

The conference is organized under the International Astronomical Union (IAU) and its related divisions and commissions, in partnership with Byurakan Astrophysical Observatory (BAO), Armenian Astronomical Society (ArAS), Armenian Virtual Observatory (ArVO), and the IAU South West and Central Asia Regional Office of Astronomy for Development (SWCA ROAD).



BAO, a historical and modern center of astronomical research founded in 1946 by Viktor Ambartsumian, has extensive experience in hosting international conferences, summer schools, and research projects. Its facilities, including the 2.6m classical telescope and 1m Schmidt telescope, make it a key regional observatory. BAO also hosts the Digitized First Byurakan Survey (DFBS), recognized by UNESCO as part of the “Memory of the World,” and maintains expertise in Archaeoastronomy, Cultural Astronomy, and astronomy outreach programs.

Conference Topics Include:

- AI and social media in astronomy communication
- Science communication and public engagement
- Interdisciplinary approaches
- Hands-on exhibits and outreach tools
- Astronomy communication for underserved communities and inclusivity
- Evaluating outreach impact

Organizers & Partners: IAU, IAU Division C, IAU Commission C2, IAU Office for Astronomy Outreach, BAO, ArAS, ArVO, and SWCA ROAD.

Registration & More Info: <https://capconferences.org/2026/registration>

CAP2026 promises to be a landmark event for the global astronomy communication community, highlighting innovation, inclusion, and collaboration in public engagement with astronomy.

RECENT PUBLICATIONS OF BYURAKAN ASTROPHYSICAL OBSERVATORY'S ASTRONOMERS

No.	Authors	Title	Publication
1.	Harutyunyan, A. S.; Sedrakian, A. D.	Generalized relativistic second-order dissipative hydrodynamics: Coupling different rank tensors	Annals of Physics
2.	Malkhasyan, H. A.	The Functional Interrelation of Central Pillars in Enclosure D at Portasar (Göbekli Tepe)	Communications of BAO
3.	Darbinyan, L.; Mickaelian, A.; Farmanyany, S.	Scientific (Astro) Journalism Activities in Armenia	Communications of BAO
4.	Shamyan, S.; Yeghikyan, A	Effects of Geomagnetic Disturbances on Incidence of Stroke: Identifying Gaps for Future Research	Communications of BAO
5.	Malkhasyan, H. A.	Midday Shadows and Functionality of Central Pillars in Enclosure D at Portasar (Göbekli Tepe)	Communications of BAO
6.	Pikichyan, H. V.	The Problem of Diffuse Reflection in the Case of Redistribution of Radiation by Frequencies and Directions: Complete Simplification of the Solution by means of Decomposition of Resultant Field (DRF) Method	Communications of BAO
7.	Nikoghossian, A.	Residence time of spectral lines photons in the optically active media	Communications of BAO
8.	Mkrtchyan, V. K.; Abrahamyan, H. V.; Mickaelian, A. M.	Investigation of Blazars in UV and in radio	Communications of BAO
9.	Torosyan, A. A.	Andromeda galaxy vs Milky Way galaxy	Communications of BAO
10.	Harutyunian, H. A.	The existence of Dark energy leaves no room for Dark matter	Communications of BAO
11.	Hovhannisyan, M. A.; Hovhannisyan, V. A.; Mkhitarian, S. A.; Mahtesyan, L. A.; Mahtessian, A. P.	Studies of the characteristics of the extended galaxy 4C 39.04 and the distribution of extragalactic sources around it	Communications of BAO
12.	Rah, M.; Spurzem, R.; Flammini Dotti, F.; Mickaelian, A.	Pulsars and Millisecond Pulsars II: Deep diving into the Evolutionary Mechanisms	Communications of BAO
13.	Andreasyan, R. R.; Paronyan, G. M.; Sukiasyan, A. G.	The Galaxy distribution of pulsars	Communications of BAO
14.	Yeghikyan, A.; Rah, M.; Shamyan, S.	Dust and Ices in the SNR	Communications of BAO
15.	Mickaelian, A. M.; Mikayelyan, G. A.; Abrahamyan, H. V.; Astsatryan, H. V. ; Knyazyan, A. V	Recent activities of the Armenian Virtual Observatory (ArVO)	Communications of BAO

ANNOUNCEMENTS



On September 8–12, 2025, Byurakan Astrophysical Observatory after V. Ambartsumian of NAS RA organizes the 4th Byurakan Regional Summer School “Astronomy and Data Science” (4RASS) in Byurakan. More details are available [here](#).



On September 15–19, 2025, Byurakan Astrophysical Observatory after V. Ambartsumian of NAS RA organizes the international conference “Astronomical Surveys and Big Data – 3” (ASBD-3) in Byurakan. More details are available [here](#).



On October 6–10, 2025, Byurakan Astrophysical Observatory after V. Ambartsumian of NAS RA will host the international conference “Astronomical Heritage of the Middle East– 2” (AHME-2) under the auspices of UNESCO in Byurakan. More details are available [here](#).

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ANNIVERSARIES

HOVHANNES PIKICHYAN'S 75TH ANNIVERSARY

On August 14 of this year, Senior Researcher Hovhannes Pikichyan of the “High-Energy Astrophysics” Research Division at Byurakan Astrophysical Observatory (BAO) celebrated his 75th birthday.

Hovhannes Pikichyan was born on August 14, 1950, in Yerevan.

In 1967, he graduated from School No. 16 named after Avetik Isahakyan. At the same time, he studied at the 7-year Children’s Music School named after Alexander Spendaryan and completed the violin program in 1966.

From 1967 to 1972, he studied at the Faculty of Physics of Yerevan State University (YSU), graduating as a physicist specializing in astrophysics. His diploma work was dedicated to the theoretical formulation and mathematical solutions of the inverse problem of determining the number and luminosity behavior of stars of the Tau Tauri class, under the supervision of Viktor Hambardzumyan.

From 1972 to 1974, he served in the Soviet Army as a lieutenant in the artillery and tank troops, working as a communications officer.

Since 1974, he has worked at Byurakan Astrophysical Observatory (BAO), initially as a senior laboratory assistant in the “Theoretical Astrophysics” Research Division, then as a junior researcher, Scientific Secretary of BAO from 1984–1987, later as a researcher, and since 1990, as a senior researcher.

From 1977 to 1981, under Viktor Ambartsumian’s scientific guidance, he attended the PhD program at the Armenian Academy of Sciences affiliated with BAO and in 1984 defended his candidate thesis entitled “Investigation of Certain General Properties of Radiative Fields in Flat-Parallel Media Using the Principle of Invariance,” earning the degree of Candidate of Physical and Mathematical Sciences.

His scientific activity focuses on the theory of radiative energy transfer and inverse problems in astrophysics. His research work is particularly devoted to:

- Deriving an explicit solution with natural decomposition by angular variables for the isotropic scattering single-action problem in radiation diffuse reflection, in the case of an arbitrary redistribution function over frequencies.
- Revealing certain new properties of radiative fields in flat-parallel atmospheres containing energy sources (the first work in collaboration with E. Danielyan).
- In collaboration with R. Muradyan, developing a new type of astronomical dome called the “Variable Geodesic Dome,” which is structurally simpler and more economical compared to



- “classical” domes, and capable of providing more favorable conditions for observations in terms of image quality.
- Implementing the mathematical exact formulation and practical solution of the inverse problem of recovering the spatial density distribution of eruptive stars in the Pleiades cluster in 3D,
- particularly in the statistically star-deficient regions (co-authored with H. Chavushyan, A. Oskanyan, and G. Brutyan).
- Solving certain nonlinear problems of radiative energy transfer in both direct and inverse formulations, supplementing the results obtained by V. Ambartsumian and his followers within the framework of the invariance principle.

In recent years, he has developed a new approach to solving radiative transfer problems, where, without applying the decomposition of the scattering elementary operator, it becomes possible to obtain a decomposed solution that is equivalent to the classically sought solution for multiple scatterings but is structurally more efficient.

H. Pikichyan has presented at numerous national and international conferences, authored over 30 scientific papers, and edited conference proceedings, including the collection *“The Principle of Invariance and Its Applications”* (1989, co-authored with M.A. Mnatsakanyan).

From 1981 to 1990, he delivered a series of lectures for a specially formed six-member group of BAO researchers at the *Astroshow* organized by the “Knowledge” company in Yerevan. Since 1991, he has been teaching professional courses in astrophysics at YSU.

In 1994, he became a member of the International Astronomical Union (IAU), the European Astronomical Society (EAS), and since 1999, the Armenian Astronomical Society (ArAS).

The staff of Byurakan Astrophysical Observatory warmly congratulates Hovhannes Vahrami Pikichyan on his jubilee, wishing him health, new scientific achievements, and many more years of creative work.

ArAS News is the electronic newsletter of the Armenian Astronomical Society. It was distributed to all ArAS members from the beginning of 2002, 4 times a year, typically at the end of each trimester. In 2009-2014, 8 issues annually and since 2015, 12 issues annually have been released.

ArASNews publishes information materials on ArAS, Byurakan Astrophysical Observatory and the Armenian astronomy in general, reports on ArAS Annual Meetings and participation of the Armenian astronomers in important international meetings, articles on occasion of anniversaries of famous Armenian astronomers and ArAS members, acceptance of new ArAS members, achievements of the Armenian astronomers, astronomical education in Armenia, Armenian archaeoastronomy, as well as science articles (reviews) on important studies.

So, if you want to share your studies with the scientific community, send us your articles to lilit.darbinyan7@gmail.com. They will be reviewed for the publication in ArAS Newsletters next issues.

ArAS Newsletter issues are available online with the [following link](#).