NASA Travel for Conferences and Other Non-Essential Purposes

April 16, 2025 - May 15, 2025

FY 2025 Travel for Conferences and Other Non-Essential Purposes

Overview: In accordance with the Executive Order on Implementing the President's "Department of Government Efficiency" Cost Efficiency Initiative, dated February 26, 2025, our agency is establishing procedures to enhance accountability for travel expenditures. Specifically aligning with Section 2(e), we are utilizing a system to centrally record approvals and require written justifications for federally funded travel designated for conferences or other non-essential purposes, ensuring compliance with the order's mandate for increased transparency and responsible use of public funds.

Furthermore, in accordance with the Executive Order's reporting mandates, justifications for all approved non-essential travel, including conferences, occurring between April 16, 2025, and May 15, 2025, have been collected. This compilation will form part of the agency's monthly informational report submitted to the Administrator. Subsequently, these justifications will be prepared for public posting, adhering to the order's transparency goals, unless prohibited by law or covered by an exemption granted by the Agency Head.

FY 2025 Travel for Conferences and Other Non-Essential Purposes

Conference Name	Justification
Star Formation Stellar Feedback, and the Ecology of Galaxies	This conference is useful to NASA because it directly addesses one of the key recommendations of the Astro2020 Decadal Survey, asking how stars infuence the galaxies they reside in. This conference celebrates the fioundational work of US astronomer John Bally in this area and provide an opportunity to showcase the strength of the US science community in this area to a global audience.
Society of Allied Weight Engineers (SAWE) 84th Annual Conference	Mass properties is a critical aspect of many missions across NASA because the discipline functions provide many different products and inputs directly tied to successful performance of many other engineering disciplines, such as, loads and dynamics, structures, materials, flight dynamics, thermal analysis, ground support, critical lift operations, meeting project performance requirements, evaluation of margins, and more. The Society of Allied Weight Engineers (SAWE) is a professional society for mass properties engineers from a variety of companies and industries that work in a variety of technology applications and share lessons learned from a from experts in the field. NASA has recently created a new Community of Practice (CoP) for Mass Properties due acknowledgement of the critical nature of the discipline, as well as due to some recent challenges that have had to be addressed with, including but not limited to, human space flight missions. Knowledge gained from SAWE are directly applicable to improving the design, development, and testing of products, that can lead to better system performance and efficiencies with development.
13th Atmospheric Limb Workshop	The 13th International Atmospheric Limb Workshop is a gathering of the world experts in atmospheric remote sensing techniques, with the intention of discussing important mission updates, recent science highlights, and new data products as well as to collaborate on research to advance state-of-the-art practices and methods for future science utilization. This workshop, held once every two years, brings together instrument, retrieval, and data scientists from past, active, and future science missions in both Earth and Planetary science funded by the different space agencies (i.e., NASA, ESA, CSA, etc.). As one of the primary sources for critical space-based data, it is imperative that NASA mission scientists and researchers be involved in discussions relating to the use of and possible improvements to both current and upcoming NASA missions.
17th NASA Formal Methods Symposium	The NASA Formal Methods Symposium is a forum to foster collaboration between theoreticians and practitioners from NASA, other government agencies, academia, and industry, with the goal of identifying challenges and providing solutions towards achieving assurance for such critical systems. The focus of this symposium is on formal techniques for software and system assurance for applications in space, aviation, robotics, and other NASA-relevant critical systems. The widespread use and increasing complexity of mission-critical and safety-critical systems at NASA and in the aerospace industry requires advanced technologies to address their specification, design, verification, validation, and certification.
188th Meeting of the Acoustical Society of America joint with 25th International Congress on Acoustics	The 188th meeting of the Acoustical Society of America will be held jointly with the 25th International Congress on Acoustics from 18-23 May 2025 in New Orleans, Louisiana, as an in-person meeting with no remote participation. About 1000 participants are expected, including leading international researchers in human response to sound and sound propagation. Special sessions have been organized of relevance to NASA including noise characterization and reduction efforts in the Department of Defense, the impact of transportation noise on communities, community tolerance of noise, and propagation of sonic booms through realistic atmospheres. The conference provides an invaluable opportunity to share and receive feedback on recent NASA developments in human response to novel aviation vehicles including urban air mobility vehicles and low-boom supersonic aircraft, as well as recent developments modeling the propagation of sonic booms through realistic atmospheres.
1st International Symposium AI and Fluid Mechanics	Future NASA work will leverage ML and we want to understand cutting edge and how it will apply to NASA work. Attendance at this conference will allow us to understand the work done in ML applied to fluid dynamics and how we can leverage advancements directly and to start some collaborations with others in areas of our interest so we will have technical meetings while at the conference. Sending only one staff member to meeting so limiting attendance.
2025 Annual Meeting of the Associated Professional Sleep Societies, LLC (APSS) (SLEEP)	This conference is an important annual opportunity for members of the Fatigue Countermeasures Lab at NASA Ames Research Center to present work being done at NASA, and to interact with many relevant groups including other researchers in the sleep field, developers of hardware and software used in the lab, and engage with new collaborators.
2025 ChABSA Annual Scientific Symposium	The Mars Sample Return Campaign, a restricted Earth return mission, has been recognized by the National Academies in the Planetary Science and Astrobiology Decadal Survey for the past 30 years, and is recognized as a NASA top priority interagency flagship mission in collaboration with the European Space Agency. The Chesapeake Area Biological Safety Association (ChABSA), an affiliate of the American Biological Safety Association, is hosting their annual scientific symposium which focuses on sharing technological innovations in biosafety and high containment research, which is directly applicable to NASA mission goals. This symposium brings together the leaders in biosafety research from academia, industry, and the federal government. Not only does it advance the search for extraterrestrial life, it feeds directly into future human spaceflight at Mars, and is an international collaboration that simultaneously drives advances in technology and the fundamental scientific understanding of our Solar System. A critical tenet of this campaign is planetary protection, which ensures the stringent requirements to demonstrate avoidance of harmful contamination of the Earth's biosphere are met with containment throughout the entire return phase to include a high containment facility to conduct timely analysis on the samples for safety, before worldwide release. These requirements are identified in NASA-STD-8719.27, and mission success requires drawing from expertise and advocacy from scientific communities, such as ChABSA.
2025 Cryogenic Engineering Conference (CEC) and International Cryogenic Materials	Cryogenic Engineering Conference is the main conference where the cryogenic industry gathers, both vendors and technical experts, for appropriate dissemination of NASA's testing results and experience.
2025 Gartner Security and Risk Management Summit	This Summit is providing critical cybersecurity training and is required to maintain cybersecurity certifications required by my position.

Conference Name	Justification
2025 Glacial Isostatic Adjustment workshop: Advancing Models and Observational Constraints	The 2025 Glacial Isostatic Adjustment workshop: Advancing Models and Observational Constraints will bring together the community to discuss the state of the art and future directions in modeling solid-earth gravitational, rotational, and deformational effects due to surface loading from ice sheets and the ocean. Attending this conference is critical for NASA to maintain leading presence in studies of solid Earth, ice sheet, and sea level interactions, and the importance of glacial isostatic adjustment research was highlighted in the last decadal survey. Not attending this conference would mean not being able to connect with lead scientists and early-career researchers in this field. Through in-person interactions and discussions with these researchers, NASA will gain valuable insight into the state of the art in the field and how different approaches to glacial isostatic adjustment models may impact their use in the processing and/or interpretation of key NASA datasets (e.g. GRACE(-FO), altimetry, GPS, etc.).
2025 Government Social Media Conference	The Government Social Media Conference (GSMCON2025), specifically tailored for government professionals, offers direct access to the latest trends, strategies, and best practices in our field. Given the unique regulatory landscape of government social media, the focused insights and knowledge gained from GSMCON are crucial/essential for ensuring our agency's digital communications are effective, compliant, and responsible, ultimately enhancing our engagement and public trust.
2025 ICRA International Conference on Robotics and Automation.	The 2025 International Conference on Robotics and Automation (ICRA) to be held in Atlanta, GA, is the top gathering of robotics engineers in the world. ICRA will provide the current state-of-the-art in robotics developments that could be applied to future Artemis and Mars missions for NASA. These missions will be relying on robotic systems to do much of the mission essential work since NASA will not be in a posture to have manned coverage of assets 24-7.
2025 In Vitro Biology Meeting	Educating the Scientific community on the challenges of sustainably feeding astronauts in deep space and work going on in this area. The goal is to have the community produce more research of relevance to NASA's mission of thriving on the Moon and Mars.
2025 International Symposium on Aviation Psychology VIRTUAL	The International Symposium on Aviation Psychology (ISAP) represents the only large-scale gathering in the US specifically focused on human factors and human performance research in civil aviation. In-person attendance permits discussion and collaboration with other domain experts in industry, government, and academia that a) helps NASA refine our ideas, methods, and how we explain them; b) allows NASA to access cutting-edge research and expertise outside the Agency that can further enable advancements in aeronautics research and technology; c) enables others to learn from the approaches we share; d) inspires the next generation to pursue education and careers in science, technology, engineering, and mathematics, including aeronautics; and e) maintains NASA-s established position as thought-leaders in this domain.
2025 Joint Navigation Conference (JNC 2025)	The increased radio frequency interference (RFI) and GPS jamming is a major concern and threat. This is a mission-critical meeting held June 5 at the Air Force Institute of Technology (AFIT).
2025 NSF GAGE/SAGE Community Science Workshop	Planetary Geophysics: Lessons from Earth; URS332669; a leader in the solid earth geophysics community, will give an invited plenary presentation on the contributions of geophysical methods to space exploration and planetary science, and also a poster presentation on the upcoming NISAR mission. Many of the attendees at the conference are natural hazard researchers, and participation in the conference will facilitate the community using NASA planetary mission data and NISAR data for scientific discoveries. Participation will also benefit NASA through exchanges on the current state of the art in using GPS and radar measurements, keeping NASA at the forefront of these geophysical methods.
2025 SEM Annual Conference on Experimental and Applied Mechanics	The Society for Experimental Mechanics (SEM) Annual Conference offers significant benefits to NASA by providing a platform to explore and discuss advancements in experimental mechanics directly relevant to aerospace research and development. The conference encompasses topics such as dynamic behavior of materials, fatigue and fracture, composite and multifunctional materials, and additive and advanced manufacturing. Engaging with these subjects enables NASA engineers and scientists to stay at the forefront of technological innovations, fostering collaborations that can lead to improved materials and structural integrity in spacecraft and aeronautics. Participation in this conference supports NASA's mission by integrating cutting-edge experimental techniques into their projects, enhancing the performance and safety of space exploration endeavors.
2025 Spacecraft and Launch Vehicle Dynamic Environments Workshop (SCLV)	Spacecraft and Launch Vehicle Dynamic Environments Workshop (SCLV) is an annual forum to discuss the best approaches for designing, modeling, analyzing, and testing modern space systems for loads, acoustics, vibration, and shock. It has historically been routinely attended by members of NASA and JPL. This conference is in-person only according to the information provided on the conference website, therefore travel is required to attend.
21st International SPECTRALIS Symposium - and Beyond	This event and associated travel directly support the innovation/inspiration component of the NASA mission: NASA explores the unknown in air and space, innovates for the benefit of humanity, and inspires the world through discovery.
246th meeting of the American Astronomical Society	This is an important meeting for multiple astrophysics projects and presents an opportunity to interface with the academic and industry communities to ensure that work is optimized. Attending these meetings will provide a critical opportunity to engage with those sectors. There will be presentations at multiple meetings and Town Halls, including the NASA Town Hall at which the community will get an update on the NASA Astrophysics portfolio. Participation in this meeting is mission critical and fulfills the duties assigned to the Administrator of NASA and delegated as required in the United States Code. Specifically, this is consistent with section 10821, 10822, ands 10823 of the NASA Re-Authorization Act of 2022, which directs NASA to: developing innovative techniques and future mission concepts (Sec. 10821); and continue to implement a collaborative, multidisciplinary science and technology development program to search for evidence of the existence or historical existence of life beyond Earth (Sec. 10822), and demonstrating in advance of preliminary design review, as practicable and appropriate, the maturity of necessary technologies through prototype demonstrations in a relevant environment (Sec. 10823).
34th CALCON Technical Meeting	The Characterization and Radiometric Calibration for Remote Sensing Annual Meeting (CALCON) provides a forum for scientists, engineers, managers, and mission leads to discuss challenges and solutions. Discussion topics include calibration, characterization, image enhancement, remote sensing, and radiometric issues within the UV, VIS, IR, microwave, and SAR spectral ranges. Historically, the calibration team members from OCO2/3 have participated every year, and it has led to algorithm improvements for the Lunar calibration effort within JPL. Since the meeting doesn't offer virtual participation, not attending would mean missing the opportunity to engage with other researchers on this important topic for NASA, to bring the next level of lunar calibration modeling for the various science instruments currently gathering data in Earth orbit.

Conference Name	Justification
3rd International Conference on Flight Vehicles, Aerothermodynamics, and Re-entry	The FAR conference aims at providing space agencies, companies, organizations, universities and research institutes with a forum of excellence in the area of flight vehicle engineering, aerothermodynamics and re-entry missions. The fields covered are flight vehicle engineering, flight physics, aerodynamics, thermodynamics and fluid dynamics engineering for space transportation, (re)entry and exploration vehicles all relevant content for our work in Entry Systems.
41st International Symposium on Microscale Separations and Bioanalysis	The 41st International Symposium on Microscale Separations and Bioanalysis conference (MSB 2025) is the best forum in the world to get a full picture of the state-of-the-art of essential technologies for life detection on future spaceflight missions. It is critical for a NASA/JPL representative to attend this meeting so that we remain at the very forefront in this area. Not attending runs the risk of losing leadership in this area and wasting NASA funding resources by investing in the wrong areas (repeating the work of others unnecessarily and/or "reinventing the wheel"). By attending this meeting, NASA is able to stay fully up-to-date in this critical area, and leverage all technologies developed elsewhere for future missions. This is an essential conference for advancing the state of the art in sensor development relative to biological and chemical obserations.
53rd IEEE Photovoltaic Specialists Conference 2025	The IEEE photovoltaic's specialists conference is the premier conference for showcasing advances in the state of the art in photovoltaic technologies, which are the dominant power generation system for spacecraft. NASA benefits by allowing SMEs to attend this conference and present their own work, as applicable through projects, as well as understand new advances that play a role in better reviewing proposals to NASA, better critiquing contractor and federal employee performance metrics, and better serving as technical monitors and contracting officer's representatives on photovoltaic-related development and/or testing contracts. This conference in particular adds to NASA's stature as leaders in this field, as historically this conference included significant attendance as well as organizing and facilitating by NASA employees. Non attendance would harm this stature, decrease information flow used to administer current and future development contracts and lead to loss of community knowledge.
59th Annual Meeting of the Subsonic Aerodynamics Testing Association (SATA)	Attendance from each member facility is required every two years to maintain active membership in the association and 14- by 22-Foot Subsonic Wind Tunnel has been a founding member of SATA since 1965. Representatives from 14x22 present on recent tunnel improvements in support of the Aerosciences Evaluation and Test Capabilities (AETC) portfolio office's mission to execute strategic efforts to preserve and enhance research and test capabilities for NASA wind tunnels. Technical knowledge gathered from the attending facilities' presentations will be documented in a trip report.
6th International Workshop and Training School on Atmospheric Composition and the Asian Monsoon (ACAM)	NASA airborne field studies in Asia can be directly attributed to interaction with Asian colleagues at ACAM workshops. These studies are critical to NASA Strategic Goal 1.1 by providing information on the local and global impacts of pollutant emissions from Asia. This globally dominant region is undergoing rapid change due to economic development and population growth. Recent NASA airborne field studies include the Korea-United States Air Quality (KORUS-AQ) field study in 2016, the Asian Summer Monsoon Chemical & CLimate Impact Project (ACCLIP) in 2022, and the Airborne and Satellite Investigation of Asian Air Quality (ASIA-AQ) in 2024. The traveler was the lead scientist for both KORUS-AQ and ASIA-AQ and represents the Agency as the ST for Atmospheric Composition. Flights have been conducted over major cities and pollution sources in South Korea, Taiwan, the Philippines, and Thailand. Conversations with India, Bangladesh, Vietnam, Malaysia have laid a strong foundation for possible future work. This meeting does not offer any virtual access. It is only conducted biennially and absence would severely undermine NASAs presence in this region that is critically linked to the health of the global environment and NASA priorities related to Strategic Goal 1.1: Understand the Earth system and its climate.
8th Chianti Topics - International Focus Workshop	This conference on "Habitability: Current and Future Space Exploration of Habitable Worlds" is essential for the Habitable Worlds Observatory (HWO) mission. This conference is critical to systems engineering efforts including architecture, technology, and interfaces and addressing key science questions that are driving HWO and assures HWO is developed in a way complementary to other habitability search for life efforts. The HWO mission is the highest-priority mission recommendation from the NAS Astrophysics Decadal Survey.
8th International Planetary Dunes Workshop	This a science conference on geologic processes on Earth and planets. These topics are of interest to NASA, with missions to Mars and other planetary bodies to study these processes. Attendence advances NASA's mission and demonstrates scientific leadership.
AE-4 EMC Committee Meeting	The AE-4 Electromagnetic Compatibility (EMC) Committee produces advisory materials for the aerospace community in Electromagnetic Compatibility (EMC), Electromagnetic Interference (EMI), and High Intensity Radiated Field (HIRF) environments. NASA can provide subject matter experts to support the development advisory material to ensure knowledge gained from NASA electrified aircraft propulsion programs is available for the advisory documents to promote aircraft electrification. Specifically non-proprietary, lessons learned from the EPFD project can be made available by NASA participation in technical committees. Participation in this committee is critical to NASA's ongoing efforts in electrification: our researchers present their work, listen to what is being developed by others, exchange ideas and educate themselves on the current state-of-the-art. Without such participation, NASA will lose its technical edge and position as leaders in aircraft electrification. Impact to EPFD, the loss of lessons learned from participants may result in delays to issuance of airworthiness certificates as well as delays in hybrid electric flight operations.
Air and Waste Management Association Annual Conference 2025	It is crucial for members of ESD to attend ACE 2025 to understand the rapidly evolving landscape of air quality research and applications and promote key NASA capabilities that provide massive benefits to Americans. Attendance at this meeting is important to the mission of NASA Health and Air Quality Applications and ESD in expanding the use and benefit of NASA Earth Science data to improve the nation's health, economy, and security. NASA's satellites help monitor air quality for health and economic impacts and to better understand the role of pollutants in the Earth system. NASA experts will speak in a dedicated NASA oral session entitled, "The Next Generation of NASA Air Quality Satellite Observations for Decision Making," as well as in a session titled, "Health Effects and Exposure." Because many members of the air quality community are not yet aware of NASA's capabilities, NASA's attendance provides value through the communication of the benefit of NASA's satellites, research, and tools.
American Industrial Hygiene Association Connect 2025	Professional development and networking with Industrial Hygienists and Safety Professionals from private industry and other government agencies. Review of topics and presentations from industry research in regards to current hazards in the workplace.

Conference Name	Justification
American Society for Mass Spectrometry 2025	Participation in educational activities is directly related to enhancing proficiency or qualifications within assigned areas of responsibility, as defined under 5 U.S.C. § 4101(4);
Annual Quantum Symposium	The traveler has been invited to give a keynote talk about quantum computing for biological and health sciences at the Annual Quantum Symposium at NC State. The traveler is one of a few quantum computing researchers currently working on quantum biology applications and quantum computing for chemical reactions. Attending the Annual Quantum Symposium at NC State allows the traveler to engage in brainstorming sessions, panel discussions, and a poster sessions. The traveler has been identified as a leading researcher in the field and asked to give a keynote talk about quantum computing for biological and health sciences at the NC State. The traveler will make connections with a broad set of researchers in field which can lead to future collaborations and funding. The funding is from DOE, it is not funded by NASA.
Astrobiology Graduate Conference (AbGradCon 2025)	The goal of AbGradCon, organized entirely by graduate students, is to promote the scientific research of young astrobiologists, while promoting collaboration, practical training, and camaraderie. This conference has been an integral part of the astrobiology community for nearly two decades by providing a setting for graduate students and postdocs where small group discussions, presentations, and social activities promote long-term professional relationships. Justification: This conference focuses on a broad range of topics all included in the Planetary Science and Astrobiology Decadal Survey 2023-2032, the ongoing (Webb, Mars 2020, Clipper, and more) and upcoming (Dragonfly, Europa Clipper, Roman Space Telescope, and Exobiology on Mars Rover) missions, and the National Academies of Science, Engineering, and Medicine's (NASEM's) An Astrobiology Science Strategy for the Search for Life in the Universe. This effort contributes greatly to both the Agency and the Astrobiology Program's mission to train the next generation of scientists. The conference will also feature a virtual component, as the entire conference will be broadcast live and recorded on the NASA Astrobiology YouTube channel for access to those unable to attend in person. This supports NASA's astrobiology and planetary science efforts as captured in the NASA Transition Authorization Act of 2017.51 USC 10101, Public Law SEC.507.CONGRESSIONAL DECLARATION OF POLICY AND PURPOSE, Section 507, which was amended to add the following: "The search for life's origin, evolution, distribution, and future in the universe" as on of NASA's 10 purposes and NASA Authorization Act of 2022, Public Law 117-167, Section 10851, which states NASA should "(1) create unique opportunities for students and the public to learn from and contribute to the work of NASA in exploration and discovery; (2) to contribute to the growth of a diverse STEM workforce; and (3) to strengthen public understanding of science by enabling connections to the mission and work of NASA." Scientific Contribution of the Conference/Workshop: This conference, which has been funded for 17 previous years, provides not only an extraordinary opportunity for early career Astrobiologists to meet and share their research, but also an opportunity for these scientists to learn about grant writing and reviewing and to gain experience in organizing and running a scientific conference. This work is essential to the fulfillment of national priorities embodied in the Presidential initiatives and Congressional legislation, and scientific priorities identified by the nation's scientific community, as they relate to communicating scientific research and NASA missions.
AUVSI Xponential 2025	Traveler has been invited to conduct a workshop on automated conflict management and present performance-based concepts to receive direct industry feedback. AUVSI Xponential (in Houston this year) is the world-s largest forum for gathering stakeholders and subject matter experts involved with uncrewed vehicles, the most likely beneficiaries of automated conflict management. Approved by the CAS project as a mission-essential part of community-engaged research into the viability of a digitally enabled cooperative operating mode for aviation.
Bureau International des Poids et Mesures 150 Anniversary	Future of time, including revolutions and ventures to Moon and Mars, the impacts exploration, science, and navigation. Time is fundamental to NASA's pursuit for Moon to Mars in advancing exploration and ensuring the safety of crew and robotic assets. This conference is bringing together the experts in the field of time to assure the knowledge and management of time for exploration initiatives.
Canadian Astronomical Society (CASCA) 2025	CASCA is the leading Canadian astrophysics conference, making it the premier event for NASA to engage the top-class scientists, engineers, technologists, and program managers of a valued international partner for NASA astrophysics missions and research. CASCA covers the breadth of astrophysics and therefore attendance serves all of NASA astrophysics. Notably, this year CASCA will feature Town Halls on NASA's James Web Space Telescope (JWST) and Habitable Worlds Observatory (HWO). JWST is the premier astrophysics observatory of this decade, serving astronomers worldwide by studying every phase in the history of our Universe. HWO will continue NASA's worldwide leadership in astrophysics as the top-priority recommendation from the 2020 Astrophysics Decadal Survey for the next U.S. space-based flagship mission after the Nancy Grace Roman Telescope (RST). Canada contributed significantly to JWST by providing an instrument and more, and has been actively engaged with NASA on their priority areas of contributions to HWO. NASA scientists, engineers, technologists, and program officers must be present in person at CASCA to effectively and efficiently advance valued international partnerships and activities, which help ensure continued U.S. leadership in astrophysics and advanced technologies, while also optimizing the investment return of US tax-payer dollars.
Career Day (University of Miami Miller School of Medicine - Biomedical Graduate Student Government)	Invited to the University of Miami Miller School of Medicine (UMMSM) to be the Keynote Speaker at an annual Career Day event that provides students, post-docs, staff, and faculty the opportunity to hear from non-academic professionals in industry, government, etc. I have also been asked to participate in a panel discussion with industry professionals that will be present, as well as a networking session for the event. This will be sponsored travel, with airfare and hotel provided by UMMSM. Attendance will allow me to engage with scientists eager to collaborate with NASA and/or pursue other opportunities for fellowships/internships/careers. I will highlight the amazing science being done at NASA, particularly the work and capabilities in Space Biosciences, as well as promote NASA Open Science 101 (I am project manager), and Spaceflight Technology, Applications, and Research. This will encourage further collaboration and engagement, bringing fresh faces, ideas, and opportunities.

Conference Name	Justification
Conference for Advancing Participatory Sciences	NASA/SMD has vibrant Citizen Science and Science Activation (SciAct) programs, led by the Engagement Branch, that invite professional scientists and people of all ages to participate in and advance NASA science https://science.nasa.gov/citizen-science/ and http://science.nasa.gov/learn. Within SciAct, nine projects involve the participatory science at the intersection of citizen science and public engagement. Working with both the NASA SciAct and Cit Sci communities, SMD has helped develop a successful proposal for a symposium, Bridging Science and Learning Outcomes in Participatory Science, that has been accepted as part of the CAPS2025 program. This session will showcase NASA participatory science projects that focus on science outcomes, learning outcomes, or a combination of the two. It will invite attendees into a discussion of this intersection and seek to identify important factors and strategies for success in both.
Coordination Group on Meteorological Satellites (CGMS)-53 Plenary Session	International coordination of satellite programs is mission critical because NASA develops the technologies for meteorology satellites and also is responsible for providing global observations on key earth system variables including global precipitation and atmospheric processes. Numerical weather prediction systems are coordination internationally at CGMS and their accuracy for supporting forecasting tht supports national security interests around the world depends on the coordination that occurs through CGMS to provide global coverage of key parameters (atmospheric moisture, temperature and wind in particular). This coordination aims at maximizing data availability, globally, and all the time, which are key conditions for an accurate weather prediction. NASA, with its vast assets of space-based instruments is a major technical contributor to CGMS along with its sister U.S. agency, the National Oceanic and Atmospheric Administration (NOAA), in keeping with statutory guidance. If NASA does not attend, the global observing systems will be developed and coordinated without NASA inputs and without NASA interests accounted for. Inputs by other countries will dominate and the coordinated constellation will not include components of greatest benefits to NASA and its users community. This will compromise long-term plans for weather forecasting approaches that support the US aviation industry, American military installations and other American interests abroad.
Databricks Data and AI Summit 2025	Databricks is the officially selected provider of core components of the NASA Enterprise Data Platform, a pivotal platform explicitly defined in both the NASA Data Strategy and NASA IT Strategic Plan that is essential to modernizing NASA's IT infrastructure, adhering to federal data governance requirements, and enabling NASA and its partners with infinitely scalable data sharing, raw computer processing power, and GenAI. As the foundational technology for our modern data architecture, Databricks is central to our efforts to enable scalable, secure, and cost-effective data analytics across the organization. Given this strategic alignment, attending the 2025 Databricks Data + AI Summit is not only relevant - it is essential. This summit provides direct access to Databricks' product leadership, technical experts, and roadmap insights, allowing us to ensure our implementation remains aligned with best practices and the platform-s evolution. It is also the most concentrated opportunity to engage with peers, partners, and competitors working on similar enterprise-scale data challenges-especially in multi-cloud, multi-tenant, and governed environments. In addition to Databricks, every major player in the data analytics ecosystem will be in attendance, including Microsoft, AWS, Google Cloud, leading integration and tooling providers, and numerous state and federal government agencies such as the Department of Defense. This makes the summit a rare opportunity to gain a comprehensive view of the broader data and AI landscape, explore integrations, and evaluate complementary solutions that align with our strategic direction. Participation in the conference will support ongoing platform development and adoption, inform enterprise data architecture and strategic decisions, contribute to NASA's data and AI maturity, and ensure we are fully leveraging the capabilities of NASA's Enterprise Data Platform.
Division of Historical Resources 2025 Cultural Resources Management Summit	The Florida Division of Historical Resources is hosting a summit on May 21-22, 2025, for Cultural Resource Managers involved in regulatory compliance across the State of Florida. This meeting aims to foster effective collaboration between the Florida State Historic Preservation Office (FL SHPO) and federal agencies by addressing key resource management topics such as policy, guidance, and partnership-building. Discussions will include revising Florida-s archaeological and historic resource survey standards, streamlining workflows, increasing efficiency with federal agencies, and exploring creative or alternative approaches to mitigating adverse effects. Participation in the summit is crucial for staying informed about potential updates to Florida's state standards, particularly those impacting Section 106 compliance at Kennedy Space Center (KSC). It also provides an opportunity to engage directly with FL SHPO to address any regulatory compliance challenges posed by their proposed changes. Attending this summit will significantly support ongoing and future initiatives at KSC, offering valuable insights for developing critical actions such as the Programmatic Agreement for the LC-39A Starship Super-Heavy Environmental Impact Statement, the LC-39A Falcon Landing Environmental Assessment, and the KSC Programmatic Agreement for Cultural Resource Management.
Earth Observation Summit 2025	Attendance at the Earth Observation (EO) Summit is crucial for NASA to advance the Administration's priorities and capitalize on the economic potential of Earth observation data. Presenting the Day 1 keynote address provides a unique opportunity to engage directly with key end-users from government agencies, enterprises, and non-profits across sectors like insurance, finance, agriculture, and energy. These stakeholders rely on Earth observation data to make decisions impacting hundreds of billions of dollars and to grow the economy. The summit connects Earth observation data producers (like NASA) with these users, fostering partnerships that enhance resilience and support economic growth. NASA's participation, particularly through the keynote, will raise awareness of new NASA products, missions, and capabilities, driving greater adoption of NASA assets and further stimulating economic growth and innovation. Missing this summit would impede NASA's ability to connect users with our Earth observation data, limiting partnership development and ultimately wasting public investment by limiting the data's application and economic benefit.
67th Annual Conference Microscopy Society of NE Ohio	This conference is focused on the latest innovations and applications in spectroscopy and microscopy. It brings together scientists, engineers, educators, and industry professionals to exchange cross-disciplinary technical knowledge critical to materials characterization and analysis. The conference offers a key opportunity for NASA's Materials and Structures (M&S) community to stay current on advanced spectroscopic techniques, instrumentation capabilities, and data interpretation methods that directly support research accuracy, diagnostics, and quality control. Participation directly supports continued education as defined under 5 U.S.C. § 4101(4), enhancing NASA attendees' ability to perform and contribute meaningfully to NASA's mission and performance goals particularly in support of NESC assessments and time-sensitive failure analysis techniques essential to high-level flight projects. Attendance also aligns with 51 U.S.C. § 20112(a)(3), which directs NASA to provide for the widest practicable and appropriate dissemination of information concerning its activities and results, making this meeting a valuable and mission-relevant engagement.

Conference Name	Justification
Aerospace Medical Association & Undersea and Hyperbaric Medical Society Annual Meeting	This annual meeting is the only national venue for the presentation of space medicine science and research. It also meets the need for Continuing Medical Education (CME) for many functional areas. Given the benefits of attending, approval is strongly recommended. Participation in educational activities directly related to enhancing proficiency or qualifications within assigned areas of responsibility, as defined under 5 U.S.C. § 4101(4);
ISC High Performance Conference	ISC 2025 is the 40th anniversary of the world's leading forum for advancing the application of HPC in government, industry, and academia. Participation is critical to represent NASA work in supercomputing, machine learning, and quantum computing as well as to understand similar efforts in other parts of the world, especially in Europe. This annual conference attracts more that 4,000 attendees and is the European counterpart to the SC conference held in the US. NASA Ames is the agency lead in supercomputing, quantum technologies and related areas such as AI, ML, autonomy, robotics, and human-systems integration. As the Director of the organization that manages all of these technical domains, it is imperative that the traveler attends and highlights NASA work at this event. Given the rapid advances in AI, ML, and quantum technologies, it would be extremely detrimental to skip attendance. As the NASA executive overseeing the DrEAM component of Dragonfly, will also be meeting with DLR leadership in Germany.
Red Hat® Summit and Ansible Fest	The trip conference is meeting several of our collaborating partners that are building the autonomous response to science data the HOSC is receiving. This is critical to the mission success and cost saving the HOSC requires for the future missions. Additional note, NASA has already paid cost of the conference for this collaboration event. The plan is to white board the data flow with several data scientist to build a path forward for data science in a cost effective manor.
European Workshop on MDO for Industrial Applications in Aeronautics	The workshop is essential and presents a once-a-decade opportunity to learn about the MDAO processes of European Industry, Academics, and Government researchers from DLR, ONERA, Safran, Imperial College, Istanbul University, Technical University of Munich, the university of Napoli and many others. Many of these researchers do not attend US-based conferences and do not focus on publishing papers on a regular basis and so getting information on their programs is otherwise very difficult. The last time a NASA researcher attended this event was in 2017. Discussions during the workshop will center around the application of MDAO to industrial problems in aerospace engineering (i.e. aircraft and spacecraft design) which is directly applicable to Transformational Tools and Technologies/MDAO subproject and the Advanced Air Transportation Technology/MBSAE subproject. The projects have a joint goal of creating useful tools for Government, Academia, and Industry Aeronautics researchers here in the US.
Fifth International Polar Year (IPY5) Workshop	The IPY's occur quite infrequently and serve to shine a bright spotlight on Earth processes occurring at the poles. NASA played an important role at IPY4 in 2007-2009, highlighted by data from ICESat. More recently, NASA has conducted a major field campaign in and around Alaska (the ABoVE campaign) which has led to many profound insights. These insights will contribute greatly to the community wide discussion that will occur at the IPY5 workshop. Hence it is critical that NASA be represented at the proceeding.
FSL2025 IR Fine-Structure Line Workshop	Attending the Infrared Fine-Structure Line Workshop 2025 in Winona, Minnesota, is a mission-critical activity for community members focused on understanding the universe's interstellar medium and galaxy evolution. This workshop directly addresses the fundamental science goals of current and future NASA missions, particularly those in the far-infrared, such as the proposed "PRobe far-Infrared Mission for Astrophysics" (PRIMA), the recently flown Galactic/Extragalactic ULDB Spectroscopic Terahertz Observatory" (GUSTO) balloon, and the upcoming "Astrophysics Stratospheric Telescope for High Spectral Resolution Observations at Submillimeter-wavelengths (ASTHROS) balloon" project. By bringing together the leading international experts in far-infrared spectroscopy, the workshop fosters collaboration and knowledge sharing that is essential for maximizing the scientific return of these significant investments. Failing to attend would mean missing out on crucial updates, insights into the latest observational results from facilities like the James Webb Space Telescope (JWST) and the Atacama Large Millimeter Array (ALMA), and discussions on how to best utilize these data in conjunction with future far-infrared missions. Furthermore, the workshop will identify key knowledge gaps and define the research priorities for the next decade, directly influencing NASA's strategic direction in this vital field of astrophysics. Participation is therefore invaluable to NASA, ensuring its researchers are at the forefront of this domain, optimizing the planning and execution of current and future missions aimed at unraveling the mysteries of the cosmos.
Geobiology Fieldwork Symposium and Workshop Retreat in Beaufort, NC	To give a talk as an invited speaker at the Geobiology Fieldwork Symposium and Workshop Retreat in Beaufort, NC, June 2-5, 2025. Will present results from research in the Atacama Desert and the Antarctic and present plans for mission concept development and progress on maturation of life detection technologies.
Global Bioinformatics Education Summit	The Global Bioinformatics Education Summit is a working meeting to gather bioinformatics experts to address challenges in bioinformatics education. Participation will help advance knowledge exchange of ongoing bioinformatics education programs and advance professional growth. The Open Science Data Repository (OSDR) team members must actively participate in discipline-specific conferences to share research, stay informed on advancements in data science, bioinformatics, and related fields, and foster collaborations. Participation will be virtual.
Gordon Research Conference on Coastal Ocean Dynamics	The Gordon Research Conference on Coastal Ocean Dynamics is a premier, international scientific conference hosted in the United States, focused on advancing the frontiers of science through the presentation of cutting-edge and unpublished research, prioritizing time for discussion after each talk and fostering informal interactions among scientists of all career stages. The conference program includes a diverse range of speakers and discussion leaders from institutions and organizations worldwide, concentrating on the latest developments in the field. As such, NASA-sponsored attendees are able to share research results that promote the value of NASA science to the discipline, while also ensuring that NASA scientists remain at the forefront of coastal research and develop collaborations that lead to impactful outcomes. If this opportunity is not taken, NASA will miss out on these critical presentations and conversations that happen only every 2 years, as there is no option for virtual attendance, the presentations are not posted online after the conference, and participants are asked to refrain from sharing about others' results after the conference due to the nature of the cutting-edge and unpublished content.
Hawaii Scientific Data Workshop	The traveler is one of a few quantum computing researchers currently working on quantum biology applications and quantum computing for chemical reactions. The traveler has been identified as a leading researcher in the field and asked to be a panelist on quantum computing for this DOE high performance computing conference. The traveler has funding on three different DOE grants, and this conference gives NASA the opportunity to demonstrate leading quantum computing research and also allows the traveler to making connections with DOE program managers. The traveler will make connections with a broad set of researchers in field which can lead to future collaborations and funding.

Conference Name	Justification
Humans to the Moon and Mars Summit	The only workshop that brings together all of the constituencies for detailed discussion of human missions, help develop the science goals, potential implementations, interactions with architecture and health/human-performance teams, and "tall poles" for missions. Representing science in these discussions, ensure that development of mission concepts will allow high-quality science to be carried out in missions.
IEEE ITHERM 2025	The Electronic Components and Technology Conference (ECTC) is the premier international event that brings together the best in packaging, components and microelectronic systems science, technology and education in an environment of cooperation and technical exchange. The host organization, IEEE (Institute of Electrical and Electronics Engineers), holds these conferences to share and spread advancements, innovations, and best practices amongst the industries subject matter experts on microelectronics. This is very valuable and pertinent to NASA given the amount of critical electronics used in its missions, the continuing need for advancement in technology, and the Centers need to caplitalize on this knowlege. Being engaged in these types of activities allows the Centers to gain from knowledge throughout the industry in ways that may not be exposed to otherwise.
International Conference on Autonomous Agents and Multiagent Systems	AAMAS is one of the leading conferences in Artificial Intelligence, and particularly in autonomous agents. The conference is attended by leaders in the field from both industry and academia. We have been building partnerships for NASA technology development for missions and these partnerships are crucial to maintain and grow (e.g. Ubotica, Planet, MIT, CMU). It is also crucial to stay abreast of rapid developments in the state-of-the-art for autonomous agents and multi-agent systems to develop innovative technology at JPL.
International Electric Machines & Drives Conference (IEMDC)	This conference provides a platform for researchers and scientists in the electric machines and drives community to present their latest findings, ideas, and advancements. It is the only large conference focused on electric machines and drives in the United States. Electric machines and drives are essential to enabling research and technology advancements for both electric aircraft and actuators for space mechanisms, which are key to the missions of the Aeronautics Research Mission Directorate (ARMD) and the Space Technology Mission Directorate (STMD). These applications require very high-performance electric machines with requirements similar to those found in other industries like automotive and down-the-hole drilling. This conference fosters unique opportunities to bring advancements from those other industries into aerospace and can lead to collaborations and partnerships for advancing research efforts. This exchange of knowledge is essential to keep the community up-to-date and drives further discoveries. NASA's participation strongly supports The National Aeronautics and Space Act of 1958, Sec. 203(a)(3), which mandates the widest practicable and appropriate dissemination of information about NASA's activities and results. This conference is a venue for the dissemination of NASA's current work and directly benefits NASA by enabling NASA personnel to learn about new opportunities to advance of state-of-the-art electric motors, generators, and drives. If attendance is not allowed, the impact is a loss to ARMD, STMD, NASA, and the nation of opportunities to exchange ideas, network, and foster potential collaborations to further electric machines and drives research for both aeronautics and space applications.
International Scientific Conference "CMB@60"	This a science conference on the Cosmic Microwave Background (CMB), on the 60th anniversary of its discovery. NASA Astrophysics missions study the CMB to address NASA science goals in cosmology and fundamental physics and to advance the state of the art in space exploration. Attendance advances NASAs mission and our scientific and technological leadership in the international community.
International Society for Gravitational Physiology (ISGP) 2025	Presentations and attendance at ISGP for improving professional engagement that would contribute to the understanding of integrated human system cardiovascular, and EVA risk understanding advancement and risk mitigation for Artemis III and subsequent missions. Participation in educational activities directly related to enhancing proficiency or qualifications within assigned areas of responsibility, as defined under 5 U.S.C. § 4101(4);
ISO Technical Committe 20	US technical lead/expert on the standards that will be discussed that are relevant to NASA (other standards are also discussed and worked). Topics that are of interest to the agency are typically discussed which enhances NASA expertise in this field.
Japan Geoscience Union Meeting 2025	Participating in this conference is critical to strentghening the active proposal effort of the ODYSEA mission. It also will sustain JPL Leadership in terrestrial reference frame definition, which is critical to Science and the DOD (Department of Defence) field.
Line Intensity Mapping 2025 (LIM25)	The Line Intensity Mapping Workshop is an annual meeting that brings together researchers from a wide range of intensity mapping experiments and theoretical efforts. It is the only workshop that spans the full electromagnetic spectrum, from near-infrared to radio wavelengths, making it a unique venue for exploring the field as a whole. SPHEREx, NASAs latest astrophysics mission, successfully launched aboard a SpaceX Falcon 9 rocket in March and completed its in-orbit commissioning in April. Intensity mapping is one of the missions core science objectives. SPHEREx employs a novel technique to map the entire cosmos in 102 spectral bands, producing data products in a format that differs significantly from traditional approaches. It is essential for SPHEREx team members to present the current status of the mission and the structure of its data products to the community ahead of the first public data release in July. This workshop is fully in person, with many interactive discussion sessions that make remote participation unfeasible. Direct engagement with experts from other intensity mapping experiments is critical given the uniqueness of the SPHEREx data products. In-person attendance will allow us to conduct real-time demonstrations and facilitate knowledge exchange with the broader scientific community. It will also enable us to learn from others experiences, strengthening our ongoing SPHEREx intensity mapping analysis efforts.

Conference Name	Justification
Lunar Surface Innovation Consortium Spring Meeting	The meeting brings together over 500 leading experts in lunar surface technology development from across sectors for a working meeting in the areas of in-situ resource utilization, surface power, excavation and construction, surface mobility, dust mitigation, and technologies for surviving the extreme lunar environment. The goal of the meeting is to maximize efforts and leverage resources to design and test new approaches, technologies, and systems in parallel, which strengthens our ability to achieve successful lunar missions, helping NASA keep the United States at the forefront of lunar exploration. It serves as an essential platform for payload providers to discuss outcomes of recent lunar missions as well as planning for necessary flight opportunities for key lunar infrastructure capabilities, creating opportunities for NASA Space Tech to meet innovators where they are, find a path for public-private partnerships and support consortium member's plans and needs for lunar technology development. Importantly, it provides an efficient avenue for NASA to hear directly from the community on available commercial solutions that can be infused into near-term lunar missions or adapted for other destinations, as well as critical gaps delaying progress that NASA should consider including in future partnership solicitations. Hardware providers will showcase investments across the lunar surface technology pipeline for NASA and other stakeholders to obtain awareness of the current state-of-the-art technologies in one location. LSIC meeting participation has increased by 400% since the first meeting in 2020, proving the efficacy of this meeting as an essential incubator for technology acceleration and growth of the lunar ecosystem. Of the cross-sector entities who attend the meeting, over 50% are from industry, ~20% from academia, and ~10% from government, with the remaining from other entities such as non-profit organizations. While there is a wide variety of participants who may also be competitors, in the LSIC meetings they band together to solve complex lunar problems for the entire community's benefit. Through interactions at previous meetings, Space Tech's Lunar Surface Innovation Initiative has been able to partner with industry on key technologies that have been demonstrated on the lunar surface for the past two years, such as the Nokia Lunar Surface Communication System (4GLTE), NASA's PRIME-1 payload and Electrodynamic Dust Shield to name a few. This year's Spring meeting will be a valuable tool to learn directly from the most recent lunar surface mission providers and payload developers as we plan for more frequent missions in the future.
Luxembourg space resources week 2025	The Luxembourg Space Resources Week (LSRW) 2025 (Space Resources Week 2025) to be held in Luxembourg on May 19-25, 2025, will provide the In Situ Resource Utilization (ISRU) System Capability Lead (SCL), who is also a JSC Engineering Directorate ISRU expert, the ability to learn from and interact with ISRU experts from across the industry, including representatives from multiple space and government agencies. The conference includes presentations from multiple space agencies, as well as industry and academia, on technologies, missions, infrastructure, legality, and commercial development of space and ISRU. The content to be covered is directly applicable to the mission essential function of the SCL for the Agency and the Directorate to further advance the ISRU capability at the Agency. Attendance at the LSRW will enable the SCL to expand upon previous interactions, especially with other space agencies, and provide the opportunity for significant multilateral discussions on ISRU.
MAECI-MOFFIITS Meeting	Provide invited lecture to the MAECI-MOFFIITS (Ministry of Foreign Affairs and International Cooperation - Measuring Oxygen Fragmentation For Improved Ion Therapy Strategies) meeting of the FOOT (FragmentatiOn Of Target) collaboration in Riccione, Italy, May 26-28, 2025. FOOT is a large experiment supported by INFN (Istituto Nazionale di Fisica Nucleare = National Institute for Nuclear Physics). The aim of the FOOT experiment is to precisely measure nuclear reaction cross sections of importance for Ion Therapy applications. For space radiation, the projectile nucleus is a cosmic ray and the target nucleus is part of a spacecraft wall or astronaut. There is a great deal of overlap for cross sections important for Ion Therapy and cross sections important for Space Radiation Protection, and the two research communities often collaborate. Additionally, traverler will collaborate with scientist to provide significant input to FOOT experiment planning concerning NASA's needs regarding Space Radiation Protection. As these experiments are very expensive, it is highly beneficial and cost effective for NASA to collaborate to ensure experiments address both Ion Therapy requirements as well as Space Radiation Protection requirements, at no cost to NASA. Accurate predictions of radiation are required for safe space travel. Nuclear cross sections are used as inputs to NASA-s space radiation codes that predict radiation environments. Virtual participation would not be effective to facilitate these discussions.
NASA JSC OSBP & Prime Contractors Council Presents: The STREEM Summit	The JSC Prime Contractor's Council is a critical engagement opportunity for the NASA Office of Small Business Programs (OSBP) to advance its mission of fostering small business participation in government contracting and procurement opportunities. Attending this conference is essential to providing a platform to connect with small businesses, industry leaders, and stakeholders, ensuring they are aware of and can access federal contracting opportunities. This aligns with OSBP's mission to promote economic growth. The conference will feature discussions on the latest procurement policies, small business regulations, and best practices, equipping OSBP with the necessary insights to support compliance and effective program implementation. OSBP representatives will have the opportunity to collaborate with other federal agencies, prime contractors, and advocacy groups, fostering partnerships that enhance small business participation in government procurement. Federal small business programs operate under strict policy requirements and performance metrics. Participation in this conference directly supports OSBP-s mandate to educate, advocate, and facilitate small business utilization in federal contracting (15 U.S.C. §644(k)(13)). By attending this event, OSBP can continue to drive small business success and enhance the efficiency and effectiveness of government procurement processes. This directly supports the agency's mission, helps fill agency supply chain gaps, and broader economic and national security objectives.
Optica Quantum 2.0 Conference and Exhibition	The purpose of the Optica Quantum 2.0 Conference & Exhibition is to stimulate and facilitate the development of quantum information science and technology. The President has stated that quantum technology is a key focus for the U.S. to develop to remain in the technological forefront and provide national security. On the edge of a technology revolution, Quantum 2.0 refers to the development and use of quantum superposition and entanglement in large engineered systems. Examples of such large quantum systems include quantum computers and simulators, quantum communication networks and arrays of quantum sensors. New technologies will go far beyond the (quantum 1.0) capabilities offered by single systems.

Conference Name	Justification
Oracle Ascend	Presented by the Oracle Applications & Technology Users Group (OATUG) and Oracle HCM Users Group (OHUG), the Oracle Ascend Conference delivers reliable insights, time-and-money-saving strategies, and valuable opportunities to connect with the global user community. This conference is essential for NASA/JPL to promote effective planning and leverage of JPL's Oracle E-BS suite applications to operate the Lab, influence product direction within Oracle products used by the Lab, and leverage experience and use cases of other leading organizations utilizing same Oracle solutions. It will also ensure better alignment of Oracle roadmaps with technology and infrastructure framework chosen by NASA/JPL. If NASA/JPL does not attend, it will miss opportunities to connect with Oracle and its user community and learn their technical trends, and miss opportunities to further AI/ML knowledge and how it can be integrated as part of EBS at JPL.
SAE G-12 Aircraft Ground De-Icing Committee Meeting	The SAE G-12 committees develop consensus standards and procedures that affect the ability for commercial air travel to operate safely, robustly, and efficiently in winter weather. NASA subject matter expertise is critical for an unbiased and factually based interpretation/opinion. NASA, and GRC in particular, make essential contributions to the safety and efficiency of ground deicing and anti-icing operations.
Shape Memory and Superelastic Technologies Conference and Exposition (SMST) 2025	The SMST (Shape Memory and Superelastic Technologies) conference is the premier technical meeting coordinated by one of the largest, US-based, international materials professional societies. This conference brings together engineers, scientists, business leaders, and other professionals in the Shape Memory Alloy field for a comprehensive, cross-disciplinary exchange of technical knowledge. The field of shape memory alloy research and applications is relatively new, is rapidly advancing and has growing applications in aerospace sectors. This conference and technical area is important to NASA in order to complete technical transfer of on-going flight demonstration activities and also to engage the industry in meeting unique space mission actuation challenges. Participation in educational activities as defined under 5 U.S.C. § 4101(4) will directly impact NASA attendees performance and assist in achieving NASA's mission and performance goals relative to TTT and NASA's aeronautical strategic thrusts 2,3 and 4.
Society for the Advancement of Material and Process Engineering (SAMPE)	Present research results not previously presented during a technical session at SAMPE Conference & Exhibition, collaborate with research and industry partners, assess recent developments in relevant field of research, and document in final L2 milestone documentation at the conclusion of the work.
Space Resources Roundtable - XXV Meeting	The Space Resources Roundtable will provide the In Situ Resource Utilization (ISRU) System Capability Lead (SCL), who is also a JSC Engineering Directorate ISRU expert, the ability to learn from and interact with ISRU experts from across the industry, including representatives from multiple space and government agencies. The conference includes presentations from multiple space agencies, as well as industry and academia, on technologies, missions, infrastructure, legality, and commercial development of space and ISRU. The content to be covered is directly applicable to the mission essential function of the SCL for the Agency and the Directorate to further advance the ISRU capability at the Agency. Attendance at the SRR enables the SCL to serve as defacto representative for NASA and attendance will allow the SCL the opportunity to expand upon previous interactions.
Space Tech Expo USA 2025	NASA's participation in the Space Tech Expo USA 2025 will support the agency's mission by providing direct access to cutting-edge technologies, emerging industry trends, and strategic partnership opportunities across the aerospace sector. The event's robust mix of exhibitors, technical sessions, and networking opportunities will allow NASA to gather valuable market intelligence, exchange knowledge on critical topics like propulsion, additive manufacturing, and AI, and identify innovative solutions that can enhance current and future missions. Engaging with a diverse cross-section of the commercial and defense space community will also strengthen NASA's collaborative capabilities and help inform strategic decision-making. Clearly the Agency has already determined that participation in this event will benefit NASA since the event features keynote speakers from NASA.
SpaceOps 2025: 18th International Conference on Space Operations	SpaceOps is organized and lead by most of the space agencies in the world. The conference is a technical forum for the space operations community which addresses state-of-the-art operations, principles, methods and tools. The scope is intended to cover all types of spaceflight missions including human and robotic, near Earth and deep space exploration. SpaceOps provides a technical and managerial forum for experts in Space Operations -- mission and ground segment designers, mission operators, engineers in charge of mission logistic support, etc. -- to present, discuss and promote technical concepts, emerging methodologies and measures for advanced Space Operations. The overall aim is to optimize mission return while maintaining the required mission safety within the framework of today's increasingly demanding and complex space missions.
SPACOMM 2025	The Seventeenth International Conference on Advances in Satellite and Space Communications: The conference focuses on mission critical and enabling space communications. Tim Pham is on the SPACOMM 2025 steering committee.
Spring SBIR/STTR National Conference	The Spring SBIR/STTR Conference continues to be a major opportunity for the federal government to raise awareness and engagement, particularly with new applicants from all parts of the country, around America's Seed Fund. The SBA has deemed this a mission-critical event, in support of the statutory outreach requirements in the SBIR and STTR programs authorizing statute (15 U.S.C. 638), and your agency is encouraged to support this event, through either government, local agency personnel, or contractors, subject to your agencies budget and priorities.
The 14th Annual FEI Front End of Innovation 2025	This conference is designed specifically for professionals whose roles depend on driving innovation. It focuses on aligning innovation with business strategy and turning big ideas into practical, measurable outcomes. FEI 25 (Front End of Innovation) has for 21 years brought together innovation disciplinarians and corporate change makers to drive progress with human intelligence. Unlike other events that simply talk about innovation, FEI is built around action. It provides the opportunity to participate in hands-on labs, roundtables, and collaborative sessions that directly address the challenges we're facing. This event will be used as a mechanism to bring data and talent back to the Aeronautics Research Mission Directorate's (ARMD) Convergent Aeronautics Solutions (CAS) project through chairing of a workshop. The data will connect space, aeronautics and broader industry to accelerate innovation in aeronautics and space. Participants are industry leaders (chief executives and technologists) on innovation. This conference is a hands-on, fast-paced experience where the participants (mainly CEOs, CTOs, and high-level industry leaders) tackle real challenges, experiment with new ideas and leave with solutions that can be put into action immediately. Vikram Shyam was invited to organize and co-chair a workshop session to extract from participants signals, trends, and ideas that connect the space economy to terrestrial economies. The data would be used as input to MADI, which is a knowledge management tool for ARMD, and combined with our other signal/trend info will generate transformative opportunities for aeronautics and space. FEI's interactive format enables peer to peer networking to find talent to bring into the orbit of CAS.

Conference Name	Justification
The Low Temperature Detectors (LTD) Conference 2025	The Low Temperature Detector Conference gathers specialists of superconductive detectors dedicated to astronomical and terrestrial imaging, quantum detection, and having applications in many fields, like quantum computing. The topic of this conference is in line with NASA critical missions like the PRobe Far-Infrared Mission for Astrophysics (PRIMA) which relies on superconductive detectors. Not attending this conference would reduce JPL and NASA visibility among the community, prevent JPL researchers from learning about the latest discoveries, and potentially miss collaboration opportunities. It happens in Santa Fe, NM, this year, and can be attended by JPL employees for a modest travel cost, while providing JPL and NASA visibility within the scientific community, and allowing NASA to maintain a leading position in superconductive detectors, a sensitive technology that has applications in quantum technologies, security, and cutting edge astronomical observations.
Uncertainty Quantification and Machine Learning for Complex Physical Systems	JPL has established community leadership in providing quantitative evaluation of science model forecasts/predictions through it SUDS initiative (i.e Science Understanding through Data Science). The UQ conference brings together key practitioners and is an important forum for NASA participation in order to continue its leadership in this field, especially with respect to infusion of NASA data into models.
Vertical Flight Society's 81st Annual Forum & Technology Display	The annual VFS Forum is NASAs best opportunity to demonstrate the Agencys leadership in vertical lift and Advanced Air Mobility (AAM) research, in support of the U.S. Aerospace Industry. NASA researchers will present technical papers on the topics of improved vehicle performance, noise reduction, improved safety and comfort for both pilots and passengers, advanced computational fluid dynamics simulations, and wind tunnel and flight test results. In addition to presenting original research, NASA representatives will chair technical sessions, host technical committee meetings, display an exhibit hall booth, and hold face-to-face meetings with members of industry, academia, and other agencies working on vertical lift and Advanced Air Mobility (AAM). NASAs participation strongly supports The National Aeronautics and Space Act of 1958, Sec. 203(a)(3), which mandates the widest practicable and appropriate dissemination of information about NASAs activities and results.
Vestibular-Oriented Research Meeting	This conference is a cross-disciplinary meeting for clinicians and researchers focused on vestibular function. The body of this conference is not tied to a specific mission; however, NASA gains critical feedback on its approaches to vestibular alterations in spaceflight that informs the design of Exploration missions as well as the maneuverability of a spacecraft that could have negative impacts the vestibular system.
Virtual the IEEE/CVF Conference on Computer Vision and Pattern Recognition (CVPR) 2025	The Computer Vision and Pattern Recognition 2025 conference is critical to NASA missions' imagery instruments regarding the onboard and ground data processing systems. The Computer Vision and Pattern Recognition conference is a world-leading conference in computer vision and pattern recognition algorithms. These algorithms can potentially be deployed to the onboard and/or ground data processing systems of NASA missions, and they can help reduce cost and improve system performance. Not attending the conference will put NASA at a disadvantage in designing/implementing cost-effective and high-performance onboard and ground data processing systems.
VIVA Technology 2025	This is Mission essential travel to support high level representational activities at the VIVA Technology 2025 in Paris, to forge international partnerships and advance space innovation through global collaboration. Engage with top-tier tech startups and industry leaders in artificial intelligence, robotics, sustainability, aerospace, and data systems all of which are critical to NASA's mission.
WAMS2025	The 2025 Wireless, Antenna, and Microwave Symposium is mission critical to NASAs goal of enabling lower-cost planetary missions through advances in communications infrastructure and targeted international collaboration. Held in India, the conference provides a high-impact venue for NASA to demonstrate leadership in deployable space-based antennas and engage directly with a spacefaring nation that has achieved notable success in executing cost-effective missions. NASAs in-person participation is mission critical to strengthening U.S. technical leadership and building strategic partnerships with organizations that offer complementary capabilities in lightweight structures, cost-efficient design, and commercially agile development. These relationships are essential to exploring new mission architectures that allow the United States to achieve its science and exploration goals at reduced cost by leveraging international strengths. There is no virtual attendance option. Key engagementsincluding a post-conference workshop on reflector developmentrequire in-person participation and are structured to catalyze collaboration with both emerging and established international partners. Active attendance is critical for future missions, ensuring that NASA remains at the forefront of global efforts to develop scalable, affordable space communications systems that will support Mars exploration and other deep space endeavors.
Western Snow Conference Annual Meeting	Participation is mission critical to fulfilling both the NASA Western Water Action Office's annual plan and broader task plan objectives under JPL Contract Task Plan No. 83-19680, Revision C: - The NASA Western Water Action Office Fiscal Year 2025 plan explicitly calls for organizing and delivering one topical workshop during the current performance period. The NASA Western Water Action Office workshop at the Western Snow Conference is the designated event to meet this commitment. - The NASA Western Water Action Office task plan outlines the requirement to engage with key stakeholders in the western United States water management community a goal directly supported by participation in both the NASA Western Water Action Office workshop and the broader Western Snow Conference activities. Additionally, attendance at the Western Snow Conference is critical to directly engaging with western water managers, researchers, and practitioners addressing snow and water resource challenges in the western U.S; showcasing NASA Earth Observation solutions relevant to snowpack monitoring, drought resilience, and water forecasting, and building partnerships and identifying user needs that will inform future NASA Western Water Action Office research-to-operations efforts.
XMC II: Clouds Over Yellowstone	Highlight the powerful results of NASA's JWST: Habel isone of the few experts in data processing for this type of JWST data and will be showcasing new analysis methods he has developed. The conference will allow the attendees to share notes about their science data and ensure that the methods for analysis are distributed and accessible. Without his attendance, there will be an absence of any discussion at the conference of our new results studying star formation in the Small Magellanic Cloud and no discussion of what JWST has allowed us to achieve in this field of research.JWST Mid-Infrared Spectroscopy of NGC 346 Young Stellar Objects: Gas, Dust, Ices and Outflows; JWST Mid-Infrared Spectroscopy of NGC 346 Young Stellar Objects: Gas, Dust, Ices and Outflows.

Location of Travel	Justification(s)
SAN JOSE , CA , US	The Purpose of this trip is for the Ames NCMS Training
PASADENA , CA , US	attendance benefits the Mars Exploration Program, Chopper effort, and the SMD mission by allowing her to present the programmatic updates and airfoil optimization work and meet face-to-face with team members at other centers who work on the integrated team for both the MEP and the Chopper effort. This travel will be supported by the Mars Exploration Program.
HOUSTON , TX , US	Mandatory Flight Physical
BOULDER , CO , US	ARCSIX Science Team Meeting
HOUSTON , TX , US	NASA Next provides significant leadership development for an agency-wide group of individuals at the GS13 GS14 level who have high potential for assuming greater leadership responsibilities in formal management or program/project management roles. The program focuses on developing leadership capabilities by increasing individual readiness for leadership in mid-level positions, ensuring individual capability is aligned to NASA's current and future environment, strategy, and needs and ensuring NASA has a cadre of leaders ready to assume higher level leadership positions. By integrating both leadership principles and technical expertise, the program empowers leaders to navigate operational challenges, set clear expectations, and drive performance while ensuring alignment with mission objectives and legal requirements under 5 U.S.C. 4101 4. NASA Next's program requirements were approved by NASA leadership on March 12, 2025.
DURHAM , NC , US	As noted in ST position description: Serves as the interface to bring high-value approaches from external leaders to NASA and establish collaborative working relationships with relevant experts on cutting-edge technology projects and initiatives nationally and globally to identify potential for cutting-edge mission-critical approaches and solutions. and also noted for STs to be recognized as an authoritative source of information broadly across NASA or by other agencies or private sector organizations. Invitations to serve on advisory boards of leading engineering organizations provide 1) critical (unpublished) insight into leading engineering approaches and 2) strategic collaborations with renown experts to discuss high value approaches that directly apply to NASA's missions. High value engagements at minimal costs since these are fully funded by external dollars.
COCOA BEACH , FL , US	The Gateway Standing Review Board (SRB) is meeting to develop their Directorate Program Managers Council (DPMC) and Administrators Program Manager Council (APMC) out briefs from the Gateway CDR-Informed Synch Review Closeout. Individual is the Flight Operations Representative to the Gateway SRB.
CLEVELAND , OH , US	TBD
PORTLAND , OR , US	to participate in a summit hosted by the Oregon Medical Coordination Center in partnership with Washington Medical Coordination Center.
NEW ORLEANS , LA , US	Travel to MAF to conduct operations contract transition meetings with technical facility managers and conduct monthly review.
WASHINGTON , DC , US	OCOMM Long Range Planning Retreat
PANAMA CITY , FL , US	Panama City FL - SME panelist for NASA film documentary
PASADENA , CA , US	Traveling to JPL for PPBE reviews for Earth Science
ROCHESTER , NY , US	traveler is holding presentation and honoring former NASA employee in Doctorate commencement.
MOUNTAIN VIEW , CA , US	Support to the Ames Partnership Days that I am organizing
DISPUTANTA , VA , US	Participate in a Technical Interchange Meeting with CCAM leadership and researchers to identify areas for potential collaboration and partnerships as a follow-up to CCAM visit and discussions held at NASA Langley on April 22, 2025; (2) Tour CCAM facilities to understand areas of expertise and technical capabilities related to advanced materials and manufacturing, in situ monitoring and inspection, automation and cooperative processing, Industry 5.0 and workforce development; (3) Engage with CCAM researchers, technical staff, and student interns during NASA Lunch & Learn to identify possible personnel exchange opportunities and talent pipelines that will enhance collaboration.
CAPE CANAVERAL , FL , US	Travel to KSC to support Integrated Test and Checkout (ITCO) for Artemis II as both the HOSC Support Manager (HSM) and Integration Lead (IL). As Intergation Lead, in person support is required in order to train with the IL from Artemis I to perform future ITCO tests necessary for Artemis II.
LEXINGTON , KY , US	NLU 101 Development
ALBUQUERQUE , NM , US	This group continues to work towards improving wind tunnels and technology associated with them in order to improve overall capabilities