

SAWE International Officer Nominations



Office: SAWE President

Candidate Name: Damian P. Yañez

Candidate Experience:

After graduating in 1982 from the Missouri University of Science and Technology (MS&T) with a Bachelor of Science degree in Aerospace Engineering I took a job as a Mass Properties Engineer at McDonnell Douglas Astronautics Company in St. Louis, MO working on the Space Shuttle and a wide variety of missile, space and defense systems. I subsequently completed my Master of Science degree in Engineering Mechanics from MS&T in 1991. Through 24 years of company restructuring and a merger with The Boeing Company, I had the great fortune to work on the entire spectrum of aerospace products from small handheld combat weapon systems to manned and unmanned fighter jets, commercial aircraft, laser communications, hypersonic vehicles, etc. During this time, I also created and managed the construction and operation of two mass properties measurements laboratories through which we verified the weight, CG, moments, and products of inertia of a wide range of complete vehicles and subsystems.

In 2000, three Boeing colleagues and I created a concept for a process management software to help streamline and improve product development projects. With Boeing's help we developed our concept into a commercial package and in 2005 spun-out our invention as our own company, Procelerate Technologies, Inc. in which I acted as Vice President of Products and Services. After operating on our own for 5 years, we sold the company to a larger software company, and I continued in my role there till 2015 as the principal consultant for our aerospace and automotive customers such as NASA, DARPA, Nissan, Chrysler etc.

In 2015, I had the opportunity to return to my Mass Properties roots at Gulfstream Aerospace Corporation where I have combined my engineering and software experience to develop new tools for automating and managing mass properties calculations across multiple database systems. I am also working with the next generation of MPE's to pass along my experience.

Candidate Society Activities:

I am the current SAWE International President. Since joining SAWE in 1982 (before I even knew what an MPE was) I have been passionate about creating tools that simplify and accelerate mass properties computations and improve the accuracy of our predictions. Wherever possible I have shared my work with others in the SAWE through papers and presentations at the local and international level. As part of the St. Louis Chapter, I acted as Director, President, Vice President and Handbook Committee Chairman where we created the first digitally formatted version. Upon moving to Gulfstream, I acted as the Director of the Southeast Region Chapter, and I am once again leading a new effort to update the SAWE Handbook. In 2020 I was honored with the title of SAWE Fellow and am actively supporting the Mass Properties Engineering Certification Committee.

Platform:

I would like the opportunity to continue my efforts as your current SAWE President to invigorate our Society and ensure that we successfully transition our knowledge to the next generation of Mass Properties Engineers. I feel this can best be accomplished by actively working with our Chapters to give them the information and resources to grow their memberships. I will also continue to work with our SAWE leadership team and company partners to help elevate the status of Mass Properties Engineering as a unique and critical discipline.

SAWE International Officer Nominations



Office: Executive Vice President

Candidate Name: Melissa Gray

Candidate Experience:

I have been working for the United States Air Force since 2010, beginning my career as a co-op. I graduated from the University of Cincinnati in 2012 with a Bachelor of Science in Aerospace Engineering and a minor in Mathematics. In 2014, I graduated from the University of Dayton with a Master of Science in Materials Engineering degree. My career as a civilian in the Air Force began in conceptual design, and I became the only Mass Properties Engineer in that office in 2015. In 2019, I moved to the Air Force Life Cycle Management Engineering home office to become the Mass Properties Technical Expert in the Structures Branch. Since this move, I am responsible for supporting all the Program Offices for USAF aircraft, the USAF Program Manager for AWBS (Automated Weight and Balance System), the USAF Equipment Specialist of the TO 1-1B-50, Aircraft Weight and Balance, and I am the only endorsed Mass Properties Subject Matter Expert for Airworthiness Section 5.5, Mass Properties.

Candidate Society Activities:

- SAWE Member since 2014
- 2018 SAWE President Award – For Significant Contribution to The Society for service as deputy for standards & practices
- 2020 SAWE Ed Payne Award – Outstanding Young Engineer
- 2019 – 2022 - SAWE Kitty Hawk Chapter Director
- Deputy VP Publications since 2019
 - Responsible for Conference Announcements
 - SAWE Conference Attendee Hub facilitator
 - Editor for SAWE Journals
- Began the SAWE Blog
- Responsible for Monthly Bulletins
- SAWE LinkedIn Facilitator

SAWE International Officer Nominations



Office: Senior Vice President

Candidate Name: Fred Brown

Candidate Experience:

I've worked at Newport News Shipbuilding in the weight engineering field for 21 years since September 1999. Areas of work have ranged from new construction aircraft carriers, surface vessels and submarines, in service aircraft carriers to advanced concept studies. Responsibilities have increased from that of weight engineer to team lead to project lead. Graduated Magna Cum Laude from Norfolk State University in 1999 with Bachelor of Science degree (Concentrations in Marine Engineering and Industrial Management).

Prior to working at Newport News Shipbuilding, I served in the United States Navy as a Chief Petty Officer in the Submarine Force. At that time, I was unknowing getting experience in the field of mass properties as a Ship's Diving Officer.

Candidate Society Activities:

- SAWE member since 1999. Served the Hampton Roads Chapter as Director, Vice President, President and currently serving as Chapter Treasurer.
- Served as the Budget Chair for the 2019 International Conference. Worked for the Senior Vice President as the Finance Chair for the 2020 and 2021 International Conferences.
- Currently serving as Senior Vice President.

Platform:

- Membership: We need to aggressively recruit and retain new members.
- Modernization: We also need to ensure mass property engineers are at the forefront of the current transition from 2D drawings to model based engineering products.