ASME Student Section Handbook

Last Updated: August 28, 2019

For the latest information on ASME Student Section Activities, Funding, Policies and Procedures, please visit the ASME Student Section Website: go.asme.org/StudentSections

Questions about this handbook should be directed to students@asme.org

This handbook is intended to assist students and faculty advisors in organizing and managing Student Sections. While some of the processes outlined in this handbook are necessary to conform with ASME requirements for Student Sections, specific strategies and activities are up to individual Sections, and may be influenced by any policies or rules of the college or university.

ASME provides a library of resources and ideas at go.asme.org/StudentSections.

The information presented in this handbook is meant to assist you in conducting your activities. Nothing in this handbook is meant to supersede formal ASME Polices, By-laws or operational guides and in the event of conflict the formal organizational document will control.

Contents

About ASME	3
ASME Student Membership	4
Overview of ASME Student Sections	4
Starting an ASME Student Section	4
Reactivating an ASME Student Section	5
Student Section Leadership	5
Positions and Duties	5
Recruitment and Succession Planning	6
Student Section Budgeting	7
Identifying Funding Sources	7
Student Section Activities	8
Student Section Obligations to ASME	8
ASME Student Programs	9
Annual Calendar1	0
ASME Engineering Festivals (E-Fests)1	0
ASME Human Powered Vehicle Challenge (HPVC)1	1
ASME Student Design Competition (SDC)1	1
ASME Innovative Additive Manufacturing 3D (IAM3D) Challenge1	1
ASME Old Guard Oral Competition1	1
ASME Old Guard Poster Competition1	2
ASME Arthur L. Williston Medal1	2
ASME Innovation Showcase (ISHOW)1	2
ASME Scholarships	2
ASME Auxiliary Student Loans1	3
ASME Student Section Activity Funding Program1	3
ASME Student Leader Training Conference (SLTC)1	3
ASME EFx	3
ASME Student Section Enterprise Committee1	4
ASME Outstanding Student Section Advisor Award1	4
ASME Charles T. Main Award1	4
ASME FutureME1	5

About ASME

In a rapidly changing global technological environment, ASME's Mission, Vision and Core Values remain constant.

Our Vision: To be the premier organization for promoting the art, science and practice of mechanical and multidisciplinary engineering and allied sciences to our diverse communities throughout the world.

Our Mission: To promote and enhance the technical competency and professional well-being of our members, and through quality programs and activities in mechanical engineering, better enable its practitioners to contribute to the well-being of humankind.

In performing its mission, ASME continues to adhere to these core values:

- Embrace integrity and ethical conduct
- Embrace diversity and respect the dignity and culture of all people
- Nurture and treasure the environment and our natural and man-made resources
- Facilitate the development, dissemination and application of engineering knowledge
- Promote the benefits of continuing education and of engineering education
- Respect and document engineering history while continually embracing change
- Promote the technical and societal contribution of engineers

ASME's Geographic Structure and Where to Get Help

ASME support for Student Sections is organized geographically. Additional information on regional contacts is forthcoming. For any specific questions contact students@asme.org.

REGIO	NS		
NORTH AMERICA			
•	Northeast		
•	Southeast		
•	Midwest		
•	West		
•	Mexico		
INTERNATIONAL:			
٠	Europe		
•	Latin America		
•	Middle East/Africa		
•	Southeast Asia		

ASME Student Membership

ASME Membership is the core of participation in the Society at all levels including in Student Sections. Only official members of the ASME global organization can be officers of the Student Section or can vote in elections related to Student Section leadership. For information about membership in the global ASME organization, visit <u>https://go.asme.org/membership</u>. There are heavily discounted and/or free membership options for students.

Student contributions to a University Student Section do not equate to membership in the global ASME organization, and any such contributions are at the discretion of each independent University Student Section.

Overview of ASME Student Sections

ASME currently has hundreds of Student Sections around the world. ASME Student Sections are chartered at engineering departments of colleges and universities around the world with the following purposes:

- to promote the goals of the Society;
- to complement the curriculum of the educational institution;
- to offer mutual support in study, learning, and professionalism;
- to provide personal connections and communications within the Society and the profession; and
- to provide outreach and service to the society in general.

Student Sections are encouraged to organize and provide a variety of activities of technical content and professional and personal value such as:

- technical presentations;
- skill development activities;
- networking;
- engineering and technical competitions;
- volunteer and community services;
- outreach to potential engineering students including K-12 students;
- assisting in the transition from student to professional life; and
- encouragement of continued membership in ASME.

Starting an ASME Student Section

An ASME Student Section may be established in any school having an approved curriculum or a two-year pre-engineering curriculum. The procedure for starting an ASME Student Section is:

- 1. Find 15 students and a faculty advisor who is an ASME member or willing to become one.
- 2. Have each student become a paid member of ASME: <u>https://go.asme.org/membership</u>

- Fill out the ASME Student Section Application Form and have your Student Section Advisor and the Department Head sign it: https://community.asme.org/student_section_enterprise/m/default.aspx
- 4. Send the completed and signed petition form to <u>Students@asme.org</u>

Once your charter is approved, your designated Faculty Advisor and Student Section Chair will get an email with charter information and next steps.

Reactivating an ASME Student Section

The procedure for reactivating a dormant ASME Student Section is:

- 1. Find 5 students and a faculty advisor who is an ASME member or willing to become one.
- 2. Have each student become a paid member of ASME: <u>https://go.asme.org/membership</u>
- 3. Submit the updated ASME Student Section Profile Form. Once your information is submitted online an ASME representative will reach out to you on next steps.

Student Section Leadership

For Student Sections to function effectively and to meaningfully engage members, ASME recommends that each Section fill the following leadership positions. The Student Section has discretion to form additional roles, committees and sub-groups to achieve the goals of the Student Section.

Positions and Duties

STUDENT SECTION ADVISOR (FACULTY MEMBER)

Carrying out these responsibilities involves two primary areas of activity: engaging students and ensuring that the Student Section administration is conducted effectively and within ASME guidelines. As a member of the University and the Society, the Student Section Advisor's (SSA) responsibilities are to:

- encourage engineering/engineering technology students to become involved in their ASME Student Section as an initial step in their professional development;
- ensure the continuity of strong student leadership within the Student Section by developing a pipeline of capable and interested leaders and ensuring the annual transition of leadership duties;
- assist with the viability of the Student Section by supporting Student Section members and leaders with the support (facilitating access to money, resources, an audience and activities) to effectively run their Student Section; and
- create a professional awareness in each student member which will inspire them throughout their career to maintain a continuous and active membership in ASME.

CHAIR OR CO-CHAIRS

The Chair (the lead student officer) is responsible for the organization and successful operation of the Student Section. To ensure a smooth turnover and continuation of activities and programs, the incoming Chair should consult with retiring Student Officers, and meet regularly with the Student Section Advisor.

The Chair is responsible for completing the ASME Student Section Profile Form by September 30th of each year.

VICE-CHAIR

In addition to carrying on Student Section business in the absence of the Chair or taking over an incomplete term, the Vice Chair may be assigned administrative or coordinating activities, such as overseeing committees or sub-groups formed by the Student Section for tasks or projects, and succession planning to ensure continuity of leadership in the Student Section.

TREASURER

The Treasurer is responsible for maintaining the financial records of the Student Section and ensuring that all accounts and records are maintained in accordance with school and ASME policies.

SECRETARY

The Secretary is responsible for maintaining the records of the Student Section and for ensuring that accurate records are maintained for Student Section enrollment and global ASME membership requirements are fulfilled. The Secretary is also responsible for running the election process and ensuring that only global ASME members are voting and that all officers are global ASME members.

LIAISON TO ASME PROFESSIONAL SECTIONS

The Liaison is responsible for helping to reinforce ASME as an important career resource following graduation and bridge the transition from student to professional ASME member by:

- interfacing with the local professional sections and serving as the main point of contact;
- assisting in the transition from student to professional members by making students aware of professional section meetings and introducing graduating seniors to ASME members in their area;
- attending local professional section events to communicate Student Section needs, activities and facilitate joint events; and
- aligning with the local professional section(s) to facilitate a graduation event.

Recruitment and Succession Planning

Recruiting members and ensuring new leadership are critical for effective Student Sections.

Recruiting and Retaining Members

- Establish a core team of enthusiastic students to ask others and serve as backup for and mentor first-time volunteers
- Work with faculty to recruit incoming students and identify pathways for engagement
- Participate in orientation, student activity fairs, and other outreach events
- Create annual activity list that match potential member interest
 List officer position and sub-committee opportunities
- Keep new members engaged by soliciting their ideas and input
- Creating recognition opportunities

Succession Planning

- Hold an annual election and ensure that all critical roles are filled
- Throughout the academic year, develop a leadership pipeline of potential officers
- Create shadow positions
- Encourage less experienced members to partake in competition teams
- Encourage your graduating officers to join their local professional section
- Work with your faculty to identify potential benefits of being a student officer
- Encourage your incoming officers to participate in ASME trainings that will provide valuable insights on how to build vibrant Student Sections Document processes for annual activities (task lists and forms)

Student Section Budgeting

Student Section Budget is up to you. Successful Student Sections identify and pursue multiple funding opportunities to maximize funding.

- Prepare a Budget
- Identify what activities you want to do
- Estimate the number of members that will be participating
- Don't forget about leftover funds from last year

Identifying Funding Sources

Start at Your University

- Look for university, student government, and college funding opportunities
- Check in with your Student Section Advisor to understand the funding sources available within your university
- Follow up with your alumni center
- Make sure to note all submission deadlines and submit your requests on time

Local Professional Chapter

With the help of your Liaison to ASME Professional Sections, make a funding appeal to your local professional chapter

ASME Funding Opportunities

ASME offers limited Student Section funding opportunities. For details, visit go.asme.org/StudentSections.

Outside Companies

Use caution before you approach an outside company. A solicitation from you might interfere with the development of a long-term (or short-term) strategic request from other places within the university. Always consult with your Student Section Advisor and/or Department Head and the ASME student staff contact at <u>students@asme.org</u> before you approach any outside company.

Student Section Activities

Most ASME Student Section activities fall into one of these categories. For more ideas and updated opportunities, visit <u>go.asme.org/StudentSections</u>.

<u>Professional Advice and Mentorship</u> Guest Speakers Mock Interviews Career Fairs Professional Networking Mixers Graduation/Transition Events

<u>Technical Knowledge</u> Machine Shop Trainings Professor Presentations Technical Tours

<u>Projects and Competitions</u> ASME Global Engineering Event Competitions ASME Leadership Conferences Impromptu Design Competitions Local Competitions

Community Building Activities Study Hours Fundraising Events K-12 STEM Outreach Volunteering Peer-to-Peer Mentorship Social Events/Networking Mixers

When using the ASME brand and logo for activities, you must adhere to branding guidelines and standards. Branding guidelines are under review. Contact <u>students@asme.org</u> with specific questions.

Student Section Obligations to ASME

In order to be an ASME Student Section in good standing, the Section must meet the following criteria:

- 1. Comply with the ASME Student Section Handbook and uphold ASME's Core Values
- 2. Use the ASME Brand and Logo according to guidelines
- 3. Operate your Student Section in accordance with college or university guidelines

- 4. Be chartered with ASME (reach out to students@asme.org if you are uncertain about your Student Section's charter status)
- 5. Have at least 5 active student members and 1 active Student Section Advisor
 - a. Engage Student Section members through a variety of activities as recommended in the Student Section Activity List on page go.asme.org/StudentSections.
 - b. To the best of your ability, encourage ASME membership and global engagement
- 6. Submit the Student Section Profile by September 30th of each year
- 7. Maintain a relationship with your local professional section, regional volunteers, and ASME global

ASME Student Programs

The latest information on ASME Student Section Activities, Funding, Policies and Procedures, are available by visiting the ASME Student Section Website:

go.asme.org/StudentSections

This ASME Student Programs section provides an annual calendar to provide guidance along with abbreviated information for those ASME Student Sections who are just getting familiar with ASME Student Program offerings.

Annual Calendar

This annual calendar assumes a school year running from August to May. Please adjust accordingly if your school year differs from this. Application deadlines remain the same.

July	August	September
Jul. – Organize a summer activity (hike, highway clean-up, etc.) Jul Host a research seminar for graduate students.	Aug. – Begin forming teams for ASME competitions. HPVC, SDC, IAM3D Aug. – Participate in student organization fair at your university.	Sep. 1 – Encourage student leaders to apply to STLC (applications due early to mid-September) Sep. – Hold recruitment events at your university. Sep. – Begin fundraising activities
October	November	December
Oct. 1 – ASME Dues renewal Oct. – Provide presentation about E-Fest and student competitions Oct. – Identify any early registration deadlines for E-Fest competitions	Nov. – ASME IMECE with SLTC, SDC Finals, Old Guard Oral Finals	Dec. – Plan an ASME officer lunch to celebrate graduating student leaders.
January	February	March
Jan. – Finalize planning for E-Fest participation. Jan. – Check on scholarship	Feb. – Hold K-12 outreach activity during E-Week	Mar. 1 – Arthur L. Williston due Mar. 1 – Charles T. Main Award
opportunities from ASME professional sections	Feb. – ISHOW submission due	nominations Mar. 1 – SSA Award nominations Mar. 1 – ASME & ASME Auxiliary Scholarships due Mar. 15 – Clarke Scholarship due
opportunities from ASME professional sections April	Feb. – ISHOW submission due May	nominations Mar. 1 – SSA Award nominations Mar. 1 – ASME & ASME Auxiliary Scholarships due Mar. 15 – Clarke Scholarship due June

ASME Engineering Festivals (E-Fests)

ASME E-Fests provide an exciting combination of competitions and professional development activities that all students can benefit from! Along with hosting the ASME HPVC, SDC, IAM3D, and Old Guard competitions, there are an extensive compilation of activities and impromptu design challenges to engage participants at all levels of their undergraduate education. Come build your resume and have fun! Also a great location for engineers to interact with student members and participate in professional development

activities. Your Student Section can host or participate in an E-Fest. Learn more at:

https://efests.asme.org/

ASME Human Powered Vehicle Challenge (HPVC)

The HPVC event at ASME E-Fests provides an opportunity for teams to demonstrate the application of sound engineering design principles in the development of a human-powered vehicle. Competition prizes are awarded. Learn more at:

https://www.asme.org/events/competitions/human-powered-vehicle-challenge-(hpvc)

ASME Student Design Competition (SDC)

The ASME SDC introduces a new engineering challenge each year for a team of students to design and construct a prototype capable of meeting the functional requirements within the framework of given specifications and constraints. Teams competing at E-Fests can receive financial awards along with a travel allowance to the ASME SDC finals held at IMECE where the competition prizes increase for the team and for the student section. Learn more at:

https://efests.asme.org/competitions/student-design-competition-(sdc)

ASME Innovative Additive Manufacturing 3D (IAM3D) Challenge

The ASME IAM3D challenge takes place at ASME E-Fests where students apply additive manufacturing technology to develop a prototype of a system for competition. Competition prizes are awarded. Learn more at:

https://efests.asme.org/competitions/asme-innovative-additive-manufacturing-3d-challeng

ASME Old Guard Oral Competition

An engineer, like all professionals, must possess a well-developed ability to communicate, both orally and in writing. The ASME Old Guard Oral Competition is designed to emphasize the value of an ability to deliver oral presentations. Competition prizes are awarded at ASME E-Fests along with travel allowance to IMECE for the Old Guard Oral Competition finals where additional prizes are awarded. Learn more at:

https://efests.asme.org/competitions/old-guard/old-guard-oral-presentation-competition

ASME Old Guard Poster Competition

The ASME Old Guard Poster Competition is designed to emphasize the ability to deliver a visual presentation. Subject matter is to be related to some area in the field of mechanical engineering. Students compete at E-Fests for financial prizes and a one-time membership upgrade. Learn more at:

https://efests.asme.org/competitions/old-guard/old-guard-technical-poster-competition

ASME Arthur L. Williston Medal

The Arthur L. Williston Medal is presented for the best paper submitted in the annual competition on a subject chosen to challenge the engineering abilities of engineering students in conformance with the annual contest guidelines. Papers need to be submitted by March 1 each year and competition prizes are awarded. Learn more at:

https://www.asme.org/about-asme/participate/honors-awards/literature-awards/arthur-l-williston-medal

ASME Innovation Showcase (ISHOW)

The ASME Innovation Showcase (ISHOW) is a global competition for hardware-led ventures. We focus on the design & engineering journey of taking physical products to market. We care about "social innovation," that is, solving social and environmental issues through enterprise. We believe a focus on users and customers ensures sustainable and scalable solutions. We are a global network of engineers, makers, dreamers, designers, investors and entrepreneurs. The application deadline is in February with prizes of significant seed grant funds. Learn more at:

https://thisishardware.org/ & https://www.asme.org/events/competitions/asme-ishow

ASME Scholarships

A scholarship is a grant made to a student to enable or assist the student in pursuing an ABET accredited educational program in mechanical engineering or mechanical engineering technology at the undergraduate or graduate level. Scholarship applications are due March 1 and scholarship amounts range up to \$13,000. The greatest hurdle to receiving an ASME scholarship is submitting your application. One application = you're considered for all scholarships for which you are eligible! Become active with ASME and apply. Learn more at:

https://www.asme.org/asme-programs/students-and-faculty/scholarships

Note that some ASME Auxiliary scholarships are specifically reserved for undergraduate students completing their final year of undergraduate education. Others like the ASME Auxiliary Lucy and Charles W.E. Clarke scholarship are provided to graduating high school seniors who are active with a FIRST FTC or FIRST FRC Robotics team and who are entering an ABET accredited or equivalent mechanical engineering or mechanical engineering technology program. These high school students need to have an ASME member, ASME Auxiliary member, or ASME student member serve as a nominator for the application due March 15.

https://www.asme.org/asme-programs/students-and-faculty/scholarships/asme-asme-auxiliary-first-clarke-scholarships

ASME Auxiliary Student Loans

The ASME Auxiliary offers a wonderful loan program. The maximum loan amount is \$10,000. These loans are interest free until graduation. They are granted at any time throughout the year to junior, senior or graduate students. Learn more at:

 $\underline{https://www.asme.org/career-education/scholarships-and-grants/scholarship/auxiliary-student-loans}$

ASME Student Section Activity Funding Program

The Student Section Activity Funding Program has been established to provide funding assistance of up to \$500 to ASME Student Sections at universities that want to plan and conduct local, ASME-based activities, but lack the funds to do so. Learn more at:

https://community.asme.org/group_pathways_support/w/wiki/13988.student-section-activity-funding-program.aspx

ASME Student Leader Training Conference (SLTC)

ASME's Student Leadership Training Conference (SLTC) is a 3-day exclusive leadership training offered to student members who are looking to enhance their soft skills, stay involved with ASME, and lead their teams in a more efficient and effective way. The ASME SLTC takes place at IMECE each year in November. The application and registration process begins in early September where you can apply for a travel allowance. A small number of applicants are selected from around the world to create an immersive international leadership training experience. Learn more at:

https://event.asme.org/SLTC

ASME EFx

An ASME EFx is designed to bring the excitement, community, innovation and vibrant

experience of an ASME E-Fests[™] flagship event, to local colleges and universities around the world. An ASME EFx event is planned and executed by local organizers like YOUR Student Section with the support of ASME staff, and allows the spirit of engineering and connection to ASME and E-Fests, to spread to students on a global level, without the cost or international travel concerns that may be hurdles to attending an E-Fest. Learn more at:

https://efests.asme.org/efx

ASME Student Section Enterprise Committee

The Student Section Enterprise Committee (SSEC) is comprised of one Student Regional Chair from each of the 10 regions along with Student Regional Advisors (SRA). The SSEC meets for a monthly teleconference and as an SRC, you will serve as a student representative for your region in the continual improvement of the ASME student member experience. You will get to collaborate with an international team of students and Student Regional Advisors dedicated to this purpose of developing and sharing best practices while cultivating your own leadership skills by chairing the Student Regional Team. Learn more at:

https://community.asme.org/student_section_enterprise/default.aspx & https://www.facebook.com/ASMESSET/

ASME Outstanding Student Section Advisor Award

The Outstanding Student Section Advisor Award recognizes the leadership and service qualities of a Student Section Advisor who has completed at least 3 academic years as a Student Section Advisor prior to nomination for the award. Nominations are due March 15 each year. Learn more at:

https://www.asme.org/about-asme/get-involved/honors-awards/service-awards/student-section-advisor-award

ASME Charles T. Main Award

The Charles T. Main Award was established in 1919 in honor of the 37th President of ASME. In 1983, the award was expanded to include a second-place award. This award will be given to undergraduate ASME Student Members whose leadership and service qualities have contributed, for a period of more than one year, to the programs and operations of a Student Section of the Society, to his/her department activities and other related activities. Nomination are due March 15 each year. Learn more at:

https://www.asme.org/about-asme/participate/honors-awards/achievement-awards/charlest-main-student-section-awards

ASME FutureME

FutureME is a community for ASME Early Career Engineers (ECE). ECEs are engineering students in their Senior Year, recent graduates transitioning from school to work, engineering graduate/post-graduate students, and engineering professional out of school 0-10 years.FutureMe delivers current and relevant content and resources, tailor-made for early career engineers. Learn more at:

https://go.asme.org/futureme

&

https://www.facebook.com/ASMEFutureME/