2020-2021 BOARD OF GOVERNORS
Tuesday, November 10, 2020
12:00 PM – 2:00 PM (EST)

FINAL MINUTES

Attendance during the open session was as follows:

Board of Governors
President: Bryan Erler
President Elect: Mahantesh Hiremath
Immediate Past President: Richard Laudenat
Governors: Andy Bicos, Joe Fowler, Laura Hitchcock, Thomas Kurfess, Richard Marboe, Michael Molnar, Karen Ohland, Paul Stevenson
Absent: Todd Allen
Executive Director/CEO: Thomas Costabile

Other Officers
Senior Vice Presidents/Elects: Nicole Dyess, SVP Elect, Student and Early Career Development
Kalan Guiley, Public Affairs and Outreach
George Papadopoulos, Technical Events and Content
Thomas Pastor, Standards and Certification Sector
Michael Roy, Member Development & Engagement
Lester Su, SVP Elect, Public Affairs and Outreach
Callie Tourigny, Student and Early Career Development

Secretary and Treasurer: Rob Pangborn
Ass’t Secretary/General Counsel: John Delli Venneri, Esq.
Chief Financial Officer: William Garofalo
Corporate Counsel: John Sare, Esq.
Governors Elect: Thomas Gardner, Sam Korellis, Wolf Yeigh

Staff
Warren Adams Director, Sales & Customer Care
Jessica Barnes Meetings Manager, Events Management
RuthAnn Bigley Manager, Governance Programs
Keith Bloesch Managing Director, Project Management and Reporting
Susie Cabanas Manager, Global Alliances and Board Operations
Melissa Carl Director, Diversity & Volunteer Training
Arin Ceglia Director, Learning & Development
Peter Cestaro Managing Director, Benefits
Philip DiVietro Managing Director, Publishing
Julia Goodrich Director, Membership Development
Tim Graves Managing Director, Technology & Engineering Committee
Bill Harris Director, Facilities and Operations
Jamie Hart Senior Manager, Segment Operations, Houston
John Hasselmann  Managing Director, Global Public Affairs
Josh Heitsenrether  Managing Director, Marketing and Digital Strategy
Krishna Hernandez  Coordinator, Segment Operations, Houston
Kathryn Holmes  Director, Government Relations
Deborah Holton  Managing Director, Industry Events/TABD
Michael Johnson  Chief Strategy Officer
Dennis Kilian  Managing Director, Corporate Sales
Phyllis Klaskey  Director, Events Management
Paul Lang  Senior Director, Accreditation & Initiatives
Camille Lenge  Managing Director, Human Resources
Tom Meehan  Managing Director, Controller
Andrew Palkewick  Assistant Controller, Finance
Steven Papaganeres  Director, Financial Reporting
Jeff Patterson  Chief Operating Officer
Allian Pratt  Managing Director, Global Alliances & Board Operations
Claire Ramspeck  Managing Director, Standards
Christine Reilley  Senior Director, Strategy and Innovation
Karen Russo  Director, Global Outreach and Board Operations
Anand Sethupathy  Managing Director, Programs
David Soukup  Managing Director, Governance
April Tone  Senior Manager, Segment Operations, Houston
Angelique Vesey  Director, Segment Operations
Barbara Zlatnik  Senior Manager, Segment Operations, Houston

Other Attendees
Sumanta Acharya  Guest
Mahesh Aggarwal  Chair, Diversity & Inclusion Strategy Committee
Carlos Beatty, Jr.  Guest
Judith Bamberg  Diversity & Inclusion Strategy Committee
Howard Berkof  Chair, VOLT Academy
John Blanton  TEC
David Bog  Chair, Committee on Honors
Betty Bowersox  Chair, Committee on Finance
Hank Cook  Guest
Jennifer Cooper  Diversity & Inclusion Strategy Committee
Bill Cousins  Guest
Richard Cowan  Guest
Pasquale Dell’Aquila  Project Management Consultant
Larry Dickinson  Guest
Vince Dilworth  Guest
Richard Goldstein  Guest
John Goossen  Guest
Amos E. Holt  Past President, 2009-2010
Said Jahanmir  Past President, 2018-2019
Nicole Key  Guest
Frank Michell  Guest
Darrell Pepper  Guest
Daniel Peters  Energy Sources and Processing Segment
Mary Lynn Reallff  Former Governor
1. **Opening of Meeting**

1.1 **Call to Order:** On November 10, 2020, a meeting of the 2020-2021 Board of Governors of the American Society of Mechanical Engineers was held using the Zoom communications application. A quorum was present, and the meeting was called to order by President Erler at 12:02 PM Eastern Standard Time.

1.2 **Adoption of the Agenda:** Mr. Erler mentioned that there was a request to remove item 1.5.3 from the Consent Agenda and add it for discussion after Item 2.2. He also stated that a new item is being added under New Business regarding the Executive Committee Responsibilities, a carryover from the last Board meeting.

   The Board voted to adopt the agenda as circulated on October 27, 2020.

1.3 **President’s Remarks:** Mr. Erler thanked Tom Costabile and his team for the successful acquisition of Techstreet. The team worked hard in all aspects: legally, financially and the communication plans. Mr. Erler noted that this is a great accomplishment by ASME. The acquisition will diversify revenue to better support the ASME mission.

   Mr. Erler further reported that ASME continues to have excellent events occurring despite the pandemic. He participated in several of them and noted that our goals are being accomplished. The success is due to the contributions of everyone including ideas from the staff which make the events successful. E-Fest was a success both for students and early career individuals. Code Week and IMECE will run this week, as well. Mr. Erler concluded by thanking everyone on the present Board as well as the board elects.

1.4 **Executive Director/CEO’s Remarks:** Mr. Costabile began his remarks by thanking everyone for their support, confidence, and guidance. Yesterday’s announcement regarding Techstreet signaled a major change in the way ASME is conducting itself. He reported that he has received many congratulatory notes and is pleased with the positive response received from the marketplace. Todd
Fegan at Techstreet will continue in his leadership role and will soon introduce himself to everyone at ASME. Mr. Fegan has also received congratulatory notes stating that this acquisition is a great strategic fit.

Mr. Costabile reported that with respect to COVID, all offices, conference rooms and meeting spaces will remain closed until February 1, 2021 as ASME continues to stay on top of the social distancing rules. ASME continues to operate consistent with the local laws even though those change constantly. All decisions are made based on the health and safety of the staff and volunteers.

The capital campaign commenced in July 2020. Kathleen Lobb and her team will give an update this afternoon during their presentation at the Philanthropic Impact event. Mr. Costabile urged everyone to join this event at 3:30 pm today, as there will be a great speaker in addition to the presentation of awards. ASME seeks 100% support of the leadership team and as of today, 92% have donated to the campaign, which is a critical part of attracting external donors. Mr. Costabile thanked those who contributed.

1.5 **Consent Items for Action:** Mr. Laudenat requested the removal of item 1.5.3, By-Law Amendments – Changes to TEC Sector. The item was moved for discussion after Open Session Agenda Item 2.2. No requests were received to remove any of the remaining items.

The Board voted to approve the items on the Consent Items for Action:

1.5.1. Approval of Minutes of September 30, 2020
1.5.2. Changes to Society Policy P-4.8

2. **Open Session Agenda Items**

2.1 **Q1 Financials:** Bill Garofalo presented ASME’s Q1 Financial Results, showing a $2 million surplus for the 1st quarter. There were expense savings since March, that helped the development of this surplus in the first quarter. The staff is forecasting monthly to help manage operations. At this juncture, the Operations Team is not managing to budget but rather managing to forecast. Expenses are down by almost $6 million.

The 2021 YTD investment returns are at 4.3% of income over the first quarter. The portfolio in October was only up 2.7% but as of yesterday, it was back up to a 4.3% return.

The balance sheet indicates that cash has been neutral since ASME obtained the PPP loan in April. Accounts receivable is flat, inventory is at small levels, and deferred publications revenue is down but deferred dues revenue is up.

Overall, the net assets are up about $6 million in the first quarter of FY2021.

2.2 **TEC Organization:** Mr. Erler pointed out that the intent of this portion of the meeting is not to go through the entire TEC presentation but to answer any questions about what is being proposed. He then asked Mr. Laudenat to provide comments.
Mr. Laudenat advised that this presentation gives the Board the opportunity to review the current status of the effort with the objective of making ASME’s technical activities broader and more relevant in the marketplace.

Mr. Papadopoulos stated that the presentation describes a restructuring effort to integrate Divisions and Research Committees that directly report to the Council, along with the creation of new Technologies Groups. He further stated that socializing continued to occur over the summer. Meetings were held with the divisions and the connectivity that was missing has been re-established.

Mr. Papadopoulos offered that the Divisions are on board and that positive feedback has been received. Some of the key challenges with respect to the administrative part of the picture are being addressed. It is important to ensure that the divisions are the ones calling the shots on what form the council is going to take on. There will be regular ongoing meetings with the divisions to give them a sounding board. One critical aspect to long term success is establishing expectations for technology groups so that all are on the same page, can understand who is struggling and needs help, what groups need more attention, and what groups are strong and able to go on their own.

Mr. Laudenat stated that the motion the Board previously approved is comprehensive. He suggests continuing the monthly reporting, but questions whether it is necessary to continue to have a TEC transition team. Progress can be tracked against the motion which will give a good roadmap for the team and give the Board the ability to monitor this.

Mr. Erler thanked the Board for listening and participating. He agrees that monthly reporting is appropriate, but implementation needs to proceed. (Minutes Appendix 2.2)

1.5.3 Discussion: Mr. Laudenat requested that 1.5.3 be pulled from the Consent Agenda because further work was needed on the underlying process. He suggests bringing this back to the Board at the next Board meeting in December.

2.3 Membership Pilot Update: Josh Heitsenrether and Julia Goodrich shared an update on the New Membership Model Pilot results and an overview of next steps for a full relaunch. They presented a high-level recap of the pilot’s goals with the objective being a full relaunch of the entire membership base in FY22. The pilot model consists of two options – “ASME Membership” and “ASME Plus”.

As of today, the timeline includes evaluation of the pilot results and research findings for a full rollout plan. Despite the ongoing impact of the pandemic, the goal is to begin a full membership marketing campaign beginning October 1, 2021. (Minutes Appendix 2.3)

2.4 Code of Conduct: Mr. Erler stated the importance of getting the Code of Conduct in place to allow the Board and staff to be able to respond quickly to various conduct issues. After discussion, the Board:

VOTED to approve the proposed Society Policy 15.10, with the edited section III. A. 10 to read:
“Fail to protect confidential information belonging to the Society that is properly marked, otherwise indicated, or understood to be confidential, and personal information belonging to ASME members, employees and other persons.”

2.5 **Nominating Committee Update:** Tom Kurfess gave a brief update on the candidate application process which outlines a new streamlined method and a timeline for applications and virtual interviews. Mr. Kurfess thanked RuthAnn Bigley for putting this together. (Minutes Appendix 2.5)

3. **New Business:** A discussion was had regarding the role and responsibilities of the Executive Committee. No action was taken.

4. **Open Session Information Items**

4.1 **Committee and Sector Reports**

4.1.1 Committee of Past Presidents  
4.1.2 Committee on Honors  
4.1.3 Technical Events & Content Sector  
4.1.4 Student & Early Career Development Sector  
4.1.5 Diversity & Inclusion Strategy Committee  
4.1.6 VOLT Academy  
4.1.7 Industry Advisory Board  
4.1.8 Council on Standards & Certification  
4.1.9 Public Affairs & Outreach Sector  
4.1.10 Member Development and Engagement Sector

4.2. **Dates of Future Meetings**

<table>
<thead>
<tr>
<th>DATE</th>
<th>DAY</th>
<th>TIME</th>
<th>LOCATION</th>
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<tbody>
<tr>
<td>December 15, 2020</td>
<td>Tuesday</td>
<td>3:00 PM – 5:00 PM</td>
<td>Zoom Conference Call</td>
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<tr>
<td>January 20, 2021</td>
<td>Wednesday</td>
<td>2:00 PM – 4:00 PM</td>
<td>Zoom Conference Call</td>
</tr>
<tr>
<td>April 14, 2021</td>
<td>Wednesday</td>
<td>2:00 PM – 4:00 PM</td>
<td>Zoom Conference Call</td>
</tr>
<tr>
<td>June 14, 2021</td>
<td>Monday</td>
<td>1:00 PM – 4:00 PM</td>
<td>Zoom Conference Call</td>
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<tr>
<td>June 15, 2021*</td>
<td>Tuesday</td>
<td>1:00 PM – 3:30 PM</td>
<td>Zoom Conference Call</td>
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</table>

*2021-2022 Board of Governors

5. **Adjournment** – The meeting adjourned on Tuesday, November 10, 2020 at 2:20 pm.

[Signature]

Robert N. Pangborn  
Secretary
List of Appendices

1.5.2 Changes Society Policy P-4.8
2.2 TEC Organization
2.3 Membership Pilot Update
2.5 Nominating Committee Update
4.1.1 Committee of Past Presidents Report
4.1.2 Committee on Honors Report
4.1.3 Technical Events & Content Sector Report
4.1.4 Student & Early Career Development Report
4.1.5 Diversity & Inclusion Strategy Committee Report
4.1.6 VOLT Academy Report
4.1.7 Industry Advisory Board Report
4.1.8 Council on Standards & Certification Report
4.1.9 Public Affairs & Outreach Sector Report
4.1.10 Member Development and Engagement Sector Report
Date Submitted: October 22, 2020

BOG Meeting Date: November 10, 2020

To: Board of Governors

From: Committee on Organization and Rules

Presented by: C. Wesley Rowley

Agenda Title: Changes to Society Policy P-4.8

Agenda Item Executive Summary:

Changes to Society Policy P-4.8 reflect the fact that the Sector Management Committee no longer exists and the content that is requested in the periodic reports has been updated.

Proposed motion for BOG Action: To approve changes to Society Policy P-4.8.

Attachment(s): Society Policy changes.
SOCIETY POLICY

REPORTS BY SECTORS AND COMMITTEES REPORTING TO THE BOARD OF GOVERNORS

I. PREFACE

A. By-Law B4.1.4.1 provides, “An Annual Report shall be prepared for the fiscal year ending on June 30.”

B. By-Law B4.1.9 provides in part, “Each committee shall keep a record of its acts and proceedings and shall report thereon to the Board of Governors whenever requested to do so.”

C. By-Law B5.1.8 provides, “Periodically, throughout the fiscal year, each sector and each committee reporting to the Board of Governors shall submit to the Executive Director, for delivery to the Board of Governors a written report of its activities.”

II. PURPOSE

To promote uniformity in the content of reports by the Sectors, committees reporting to the Sector Management Committee and committees reporting to the Board of Governors.

III. POLICY

A. Sectors and the committees reporting to the Board of Governors must submit the following information periodically that will be included in the SMC Report to the Board of Governors at each Board of Governors meeting

1. Shall submit their Top Key Accomplishments an update highlighting activities it is working on.

2. Shall submit Challenges they face upcoming events/what’s on the horizon

3. Shall submit Other Information they wish to report pertinent updates relevant to the Balanced Scorecard.

B. Committees Reporting to the Board

Committees reporting to the Board of Governors shall submit a report as defined in its Operation Guide on activities since its last report. Information may include accomplishments, activities, objectives and recommendations.

IV. PROCEDURE

A. The reports are included in the agendas of the Board of Governors meetings.
B. The reports provide content for the Society’s Annual Report.

Responsibility: Committee on Organization and Rules

Adopted: November 21, 1985

Reaffirmed:

Revised: September 17, 1987
(editorial changes 8/88)
(editorial changes 4/89)
June 22, 1989
(editorial changes 2/94)
(editorial change 8/94)
November 16, 1995
March 17, 2001
(editorial changes 6/1/05)
April 19, 2013
(editorial change 6/13)
Date Submitted: October 13, 2020

BOG Meeting Date: November 10, 2020

To: Board of Governors

From: George Papadopoulos

Presented by: George Papadopoulos

Agenda Title: Technical Events and Content Sector Restructuring

Agenda Item Executive Summary:

The TEC Council has undertaken, at the request of the Board of Governors, a review of the structure of the Sector. Comments from Division Volunteer Leadership have been received and evaluated and a new structure for the Sector is proposed.

A Motion on the TEC Structure is being presented to the Board for a Vote.

Proposed motion for BOG Action:

Please refer to Presentation Material for the Motion

Attachment(s):

Presentation on Technical Events and Content Recommendations
Technical and Engineering Communities
Update on TEC Sector Restructuring

Board Of Governors Briefing
November 10, 2020

George Papadopoulos
SVP TEC
What to Expect from Presentation

• **Brief Description** – The TEC Council has undertaken, at the request of the Board of Governors, a restructuring effort that involves integration of Divisions and Research Committees with direct reporting to the Council, along with the creation of new Technology Groups. The new structure is presented.

• **Desired Outcome** – Proposed Motion for BOG Action:
  • Endorse the TEC Structure as shown in the presentation.

• **Questions** – Please hold questions until after the presentation

• **Duration** – 45 Minutes have been allocated for the presentation and discussion
## Progress Summary (2020 April Board Motion)

<table>
<thead>
<tr>
<th>Element</th>
<th>Status</th>
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<tbody>
<tr>
<td>Sunset the TEC Segment Organization Structure and the TEC Council effective at a time recommended by the Senior Vice President, TEC when the new structure is operational.</td>
<td>TEC Council was sunset on June 30, 2020 – New Council operational comprised of SVP, two Vice-Chairs and up to 2 Members-at-Large (MALs TBD).</td>
</tr>
<tr>
<td>All current TEC Council Members and Segment Leadership Teams to continue their current roles and remain available for leadership positions as requested by Senior Vice President, TEC and new Council. Additional Appointments required within Technology Groups will be made by the Senior Vice President, TEC, with BOG concurrence</td>
<td>Segment Leadership teams remain operational in their roles till IMECE; transition to Technology Groups planned at IMECE. Concurrence on Technology Group formation and leadership sought from BOG.</td>
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<td>Element</td>
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<tr>
<td>The new TEC Council shall consider the creation of new Technology Groups such as Renewable Energy, Energy Generation and Storage, Energy Sources and Processing, Gas Turbine, Design and Manufacturing, Transportation Systems, Materials and Fluids, Emerging Technologies and Cross Sector, and report a final TEC proposed technical group structure to the BOG for a meeting in September 2020.</td>
<td>TEC Council has considered creation of new Technology Groups (listed at later slide). Proposed technology group structure is reported to BOG as part of this presentation.</td>
</tr>
<tr>
<td>Each Vice Chair will design the process for moving within their respective technology groups.</td>
<td>Vice Chairs are coordinating activities with Technology Group Leads.</td>
</tr>
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</table>
## Progress Summary (2020 April Board Motion)

<table>
<thead>
<tr>
<th>Element</th>
<th>Status</th>
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<tbody>
<tr>
<td>Divisions will self-select their affiliation with one or more of the</td>
<td>Initial call for Divisions to engage and affiliate with Technology</td>
</tr>
<tr>
<td>Technology Groups. Self-selection schedule will be determined by the</td>
<td>Groups to occur at IMECE TEC meeting; Leads for the Technology Groups</td>
</tr>
<tr>
<td>Senior Vice President TEC</td>
<td>will present on each area and solicit participation from those</td>
</tr>
<tr>
<td></td>
<td>attending; additional reach out will occur post IMECE.</td>
</tr>
<tr>
<td>By-law and policy changes will be prepared by TEC with the assistance</td>
<td>By-law changes have been prepared and submitted to COR. Policy</td>
</tr>
<tr>
<td>of staff, and after review by COR will be presented to the Board for</td>
<td>changes are in review, anticipated to be submitted in November.</td>
</tr>
<tr>
<td>vote at the June meeting</td>
<td></td>
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<tr>
<td>Performance Metrics for Divisions consistent with the 2020 Technical</td>
<td>In Progress; will need to move date to 90 days post IMECE. NOTE: This</td>
</tr>
<tr>
<td>Community Engagement Project Observations and Recommendations will be</td>
<td>is disconnected from the roll out of the technology groups; It will also</td>
</tr>
<tr>
<td>submitted to the Board of Governors for approval at its November</td>
<td>be a continuous process to support health and growth within our</td>
</tr>
<tr>
<td>meeting</td>
<td>Divisional communities.</td>
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TEC Divisions and Research Committees

- Aerospace
- Advanced Energy Systems
- Applied Mechanics
- Bioengineering
- Computers & Information In Engineering
- Design Engineering
- Dynamic Systems & Control
- Electronic & Photonic Packaging
- Environmental Systems
- Fluid Power Systems & Technology
- Fluids Engineering
- Heat Transfer
- Information Storage & Processing Systems
- Internal Combustion Engine
- International Gas Turbine Institute
- Management
- Manufacturing Engineering
- Materials
- Materials & Energy Recovery
- Materials Handling Engineering
- Microelectromechanical Systems
- NDE, Diagnosis, and Prognosis
- Noise Control & Acoustics
- Nuclear Engineering
- Ocean, Offshore, and Arctic Engineering
- Petroleum
- Pipeline Systems
- Plant Engineering & Maintenance
- Power
- Pressure Vessels & Piping
- Process Industries
- Rail Transportation
- Research Committee on Energy, Environment, & Waste
- Research Committee on Mechanics of Joined Structures
- Research and Technology Committee on Water & Steam in Thermal Systems
- Safety Engineering & Risk Analysis
- Solar Energy
- Technology & Society
- Tribology
Division Alignment

• Vice-Chairs have conducted numerous meetings with Division Leadership, with the help of Staff, re-engaging and establishing direct alignment with TEC Council.

• First set of Assembly of Divisions meetings have been held. Introduction to new TEC organizational structure and emphasis on each Division having a direct reporting line to the Council.

• Volunteers and Staff are working together to review Divisional strategic and succession plans, along with best practices, with Division Leadership to implement Performance Metrics – this will be a continuous process once initial roll-out occurs.
Responsibilities

• SVP – in partnership with Managing Director, provide overall leadership and direction to assure TEC is creating value for the organization and the membership while staying true to the ASME mission and executing on the BOG strategy.

• Vice Chairs– in partnership with Managers, focus on execution of activities associated with the technology groups, assuring the group is actively engaged with divisions, is leveraging resources to expand and enhance product portfolio and is providing the best value to the membership. Staff and VCs also interact with Divisions to address issues and assure direct communication with the Council.

• At-Large Members – provide leadership to address collective issues, identify new trends, provide cross-sector engagement, optimize common activities/investments, etc; May lead Council level committees to address honors & awards, nominations, special tasks.

• Technology Group Leaders– in partnership with Staff, identify technical expertise, promote research collaboration, and foster partnerships among stakeholders to pursue opportunities within a particular technology area of interest.
Technology Groups

- Robotics
  TGL: Gloria Wiens

- Bioengineering
  TGL: Sara Wilson

- Humanitarian
  TGL: Steve Unikewicz

- Adv Manufacturing
  TGL: TBD

- Energy Sources and Processing
  TGL: Phil Collins / Vicki Blocker

- Energy Generation and Storage
  TGL: Frank Michell

- Space – Exploration and Habitat
  TGL: Mina Pelegri

- Gas Turbine
  TGL: Mark Zelesky

- Digitalization
  TGL: Kieran Kavanagh
## Timeline

<table>
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<tr>
<th>Time Period</th>
<th>Event</th>
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| IMECE (TEC Meeting) | • Launch Technology Groups  
• Divisions begin to affiliate with Technology Groups  
• Announce new cycle of TEC Fund Proposals in support of Technology Groups                                                                 |
| 30 Days      | • Policy changes submitted  
• New TEC Fund Proposals Received and in Review  
• MALs nominated and sent to BOG for approval                                                                                       |
| 60 Days      | • Approve new cycle TEC Fund Proposals  
• By Laws and Policy changes approved by BOG  
• All initial Technology Groups are fully functional                                                                                   |
| 90 Days      | • Initiate Succession Planning (SVP, VCs, MALs)  
• Have Draft for Operational Guide  
• Generate Performance Metrics for Divisions for submittal to BOG for approval                                                        |
Backup
Technology Groups

Based on ASME strategy, the Technology Groups of the TEC Sector shall be structured

• To offer cutting-edge insight that supports entrepreneurs, innovators and partners in pursuing new opportunities for growth and commercialization.

• To facilitate the sharing of ideas by engaging ASME members and staff in areas of specialization.

• To identify technical expertise, promote research collaboration, and foster business partnerships.
Technology Groups

Each Technology Group shall support its respective area of specialization by:

• Providing on-going forums for program development and exchange, addressing technical expertise related to its domain.

• Encouraging education, research and entrepreneurship.

• Developing and offering flexible and customizable tools needed by students and employers for career and commercial success.

• Participating in a network of like-minded entrepreneurs, universities and businesses to enhance its impact and strengthen global competitiveness.

• Identifying, facilitating, and engaging the global engineering community in developing solutions to real world challenges.
Technology Groups

• Participation is free and open to individuals with a willingness and ability to contribute. All ASME technical divisions and affiliates are encouraged to be engaged.

• Each Technology Group will be represented by a Chair, who as an ASME member will develop a team arrangement that addresses the mission of the respective group. A Vice-Chair of the TEC Sector Council will provide oversight to the Chairs.

• Each Technology Group will be responsible for providing an environment of exploration and application of new innovations in its domain. The team will build an innovation program and culture, and guide potentially disruptive projects beyond a 3-5 year time horizon.

• Each Technology Group will work closely with the ASME Professional Staff designated to support innovation and entrepreneurial activity.
Date Submitted: October 9, 2020  
BOG Meeting Date: November 10, 2020  

To: Board of Governors  
From: Josh Heitsenrether, Managing Director, Marketing & Digital Strategy  
Presented by: Josh Heitsenrether and Julia Goodrich, Director, Membership Development  
Agenda Title: New Membership Pilot Update & Summary Results  

Agenda Item Executive Summary:

The main pilot phases of the new membership model project have been completed. In this informational session, senior leadership of the membership team will recap the goals and structure of the pilot, present a summary of the key results and findings to date, and provide an overview of the next steps toward a full relaunch of membership in 2021.

Proposed motion for BOG Action: None  

Attachments: Presentation
New Membership Pilot & Summary
Results to Board of Governors

November 10, 2020
What to Expect from Presentation

• Brief Description – An update on the New Membership Model Pilot results and overview of next steps for full relaunch
• Desired Outcome - This update is for information only
• Questions – Please ask only clarifying questions during the presentation. Please hold other questions for the end of the presentation
• Duration – This presentation will be 30 minutes (16 slides), with 20 minutes of presentation and 10 minutes for questions. The presentation includes an Appendix with pilot data.
High Level Recap of Pilot Objectives

• Test a new membership value proposition and model to offset declining enrollment by increasing the perceived value and relevance of ASME membership. Compare pilot model vs. legacy membership (control group) to determine impact on acquisition response and retention rates.

• Evaluate demand for a new premium choice model that offers customization of the member experience through an optional upgrade to access additional new benefits at a higher price point.

• Test new marketing and benefit reinforcement communications and measure impact on member acquisition and member benefit engagement.

• Determine the impact of various price points on willingness to buy.

• Measure appetite for membership with exclusively-digital access to Mechanical Engineering magazine (no print magazine).

• Determine viability of new model and ability to scale new benefits to full membership.

Apply pilot learnings to full relaunch of entire membership base in FY22
Overall Project Timeline

**July-December 2018**
Research & Discovery
- Consultant Engagement
- Historic Data Analysis & Trending
- Membership Task Force (MTF) chartered
- MTF questionnaire to BOG, BOG Committees, Volunteer Leadership
- Qualitative & Quantitative Member Research
- Association Interviews & Benchmarking

**January-April 2019**
Recommendation
- Situation Analysis Report from consultant
- MTF strategic areas of focus and recommendations for new membership model initiative
- MTF report to BOG
- MTF concludes work April 2019

**April-August 2019**
Pilot Design & Modelling
- Additional benefits research
- Detailed model simulation and benefits test
- Pilot structure defined

**Sept 2019-January 2020**
Pilot Build
- Technology implementation
- New benefits selection & sourcing
- New marketing design & materials

**February – November 2020**
Main Pilot Live & Analysis*
- February – Phase I
- June – Phase II
- Initial data summary report
- Evaluate pilot results and research findings for full rollout plan (data ongoing for Phase I renewals)

**Up Next**
Nov 2020-March 2021:
- Develop full rollout plan
- Benefits sourcing
- Technical implementation
- Marketing implementation

April-June 2021:
- Full rollout acquisition and renewal marketing begins for membership year beginning October 1, 2021

*Benefits & services for pilot participants continues through member year
### Pilot Timeline & Construct

<table>
<thead>
<tr>
<th>Phase I</th>
<th>(Late Feb – Apr)</th>
<th>Pilot: 59K</th>
<th>Control: 21K</th>
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<tbody>
<tr>
<td><strong>Prospects</strong></td>
<td></td>
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<td></td>
</tr>
<tr>
<td><strong>Lapsed Members</strong></td>
<td></td>
<td></td>
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</tr>
<tr>
<td><strong>US Region</strong></td>
<td></td>
<td></td>
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</tr>
<tr>
<td><strong>Professionals, ECEs, Students</strong></td>
<td></td>
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<tr>
<td><strong>Prior Online Transactions</strong></td>
<td></td>
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</tbody>
</table>

<table>
<thead>
<tr>
<th>Phase II</th>
<th>(June – Grace Period)</th>
<th>Pilot: 20K</th>
<th>Control: 3.4K</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Renewals (also Phase I pilot member renewals starting Aug)</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>US Region</strong></td>
<td></td>
<td></td>
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<tr>
<td><strong>Professionals, ECEs, Students</strong></td>
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<tr>
<td><strong>Prior Online Transactions</strong></td>
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<table>
<thead>
<tr>
<th>Phase III Relaunch</th>
<th>(FY22)</th>
<th></th>
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</tr>
</thead>
<tbody>
<tr>
<td><strong>All Members; Renewals &amp; New Acquisition</strong></td>
<td></td>
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<tr>
<td><strong>All Regions</strong></td>
<td></td>
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<tr>
<td><strong>Professionals, ECEs, Students</strong></td>
<td></td>
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<td></td>
</tr>
</tbody>
</table>

### Demographics
- Prospects, Lapsed Members
- US Region
- Professionals, ECEs, Students
- Prior Online Transactions

### Additional Pilot Parameters
- Multiple price points tested
- Digital-only magazine version tested in Phase II
- Closed pilot available by invitation only
- Enrollment only available through online landing pages provided in marketing materials
- No mid-year upgrades/downgrades available during pilot
- Test and control groups designated for evaluation purposes
Pilot Offering
The pilot model consisted of two options – “ASME Membership” and “ASME Plus” – focused on the value proposition of customization at Plus option.

1. **ASME Membership**
   - Current membership offering
   - Price test: $139 or $158

2. **ASME Plus**
   - ASME Membership +
   - Choose 2 out of 5 additional benefits each membership year
   - Price test: $169 or $189

**Five ASME Plus Pilot Benefit Options**
- **ASME Online Learning & Development Courses**
  Choice of one of ten online, self-paced courses
- **Siemens Solid Edge Software & Training**
  CAD software with monthly training webinars
- **Mechanical Engineering Exclusives**
  Exclusive content beyond the magazine
- **ASME Insider Webinars**
  Interact with experts on the latest technical trends, key developments and industry advances
- **Career Development Webinars**
  Students/ECE and Professional tracks

*Based on top choices from previous research*
New Marketing Communications

We tested new branding and user experience (UX) design, updated marketing materials, and new customer journeys to improve membership engagement with benefits.

- **Digital Onboarding:** A new marketing automation platform, Marketo, used to send a series of onboarding emails to pilot members every few days over the course of their initial two months.

- **Benefit Reinforcement:** Automated ASME Plus marketing email journeys provided premium benefit welcome emails and reminders of upcoming events or follow ups.

- **New ASME Plus welcome kits, direct mail, web landing pages, and monthly emails were also developed.**
Choice Membership Model

**Hypotheses**
Will the desire for plan customization (from previous research) drive members to pay a premium to upgrade to the ASME *Plus* plan and gain a choice of new premium benefits options?
Will *Plus* participation levels be high enough to support full scale rollout?
Do those who experience more customized membership plans have higher customer satisfaction and retention?

**Result Highlights**
- 28% of Pilot participants in Phase I (prospects & lapsed) upgraded to *Plus*, but only 5% of Phase II (legacy renewals)
- Mid-to-late career Professional members comprise ~80% of *Plus* upgrades; the balance were Students and ECEs
- Test of higher and lower *Plus* upgrade price points did not produce significantly different results
- Interest in customization of benefits each year scored very high among members choosing *Plus* (72% indicated they “like it a lot”), but they were noncommittal when asked whether they would pay additional fees for future customized benefits
- Directional research (small sample size) showed that members upgrading to *Plus* thought it was excellent or very good value for money and reported a high NPS of +35 (vs. +26 for non-Plus members and +14 in previous segmentation research)
Choice Membership Model *cont’d*

**Key Takeaways & Learnings**

- Members had low willingness to upgrade to *Plus* and pay for additional benefits, contrary to previous intent research
  - It is unclear how much of an impact the pandemic and economic uncertainty may have played – both Pilot phases overlapped pandemic
- It will be difficult to scale fully customized benefits to appeal to all segments and cohorts since interests and needs vary greatly
  - Focus will be on 1-2 core differentiators with broader appeal to each segment
New Member Benefits

**Hypotheses**
Which new member benefits options are most often selected among those who upgrade?
For renewing legacy members, do the additional benefits identified in previous research drive renewal decisions (and if not, what does)?
Does investing in premium benefits increase engagement and use of benefits?

**Result Highlights**
- The L&D course upgrade had the highest selection rate (37%), followed by the Siemens software & training (26%). *Mechanical Engineering* Exclusives came in the lowest at 9%.
- All the *Plus* benefits rated high for satisfaction among members who selected those options.
- Although members with *Plus* paid a 20% premium upcharge on average for ASME *Plus*, most (60-75%) did not redeem their benefits by registering for their course or attending the webinars.
- However, the new benefits were not the highest reason for renewal (among Phase II). When asked specifically to choose one most important reason for renewal—“belonging to a professional association” and “pride in being a long-standing member”—ranked the highest—which was similar for non-*Plus* members.
Key Takeaways & Learnings

- Although, as shown, there were clear standouts among the five Plus options, the research data (small base) confirmed our assumptions that different segments and age cohorts want different benefits.

- Additional new benefits must be explored for full rollout
  - However, many of those desired as part of membership price are existing products and services within ASME that would risk cannibalization of existing lines of business.
  - Alternative bundling options will be considered.

- New benefits won’t drive renewals alone – as the main reason for renewing membership remains the sense of community and pride of being an ME; both will be critical parts of the full rollout value proposition.
New Marketing Communications

**Hypothesis**

Would providing a membership benefit onboarding process and reinforcement marketing campaign drive higher retention rates and membership engagement with benefits?

**Result Highlights**

- Pilot benefit reinforcement email open rates were higher than that of membership benchmark (37% vs 24% respectively)
- Renewal email open rates also performed better for the pilot group than those of the control group (41% vs 36% respectively)
- Although the *Plus* sample size was small, 73% of members with *Plus* said the marketing materials were “very informative” versus 62% of non-pilot members across all age groups
- Survey results did highlight some difficulty in signing up for the pilot due to it being “closed” and only available through targeted marketing entry points vs. the public website – which was an accepted risk of conducting the pilot this way
New Marketing Communications cont’d

Key Takeaways & Learnings

- New marketing approach in Pilot drove more engagement with prospects and existing/renewing members than legacy marketing
- Use of new automation platform to sequence onboarding emails based on sign-up date provided a level of personalization and communication that measurably improved customer experience
Preference for Digital-only ME Magazine

Hypotheses
Is membership with digital-only access to Mechanical Engineering magazine (via mobile app and desktop reader) a viable option?
Are younger segments (under age 35) more likely to choose the digital-only format?

Result Highlights

- At the same price point as the current membership dues, one-third of members who were offered the test were willing to transition to the digital-only magazine (across all segments)
- However, when the price point was lowered, almost half the overall members offered the test were willing to transition to the digital magazine
- At the lower price point, 40% of ECEs and only 27% of students chose the digital-only magazine option
- Age-wise, members choosing the digital-only magazine option were in their late 40s on average
Key Takeaways & Learnings

- *ME Magazine* continues to be ranked as one of the top 3 reasons for renewing membership, yet the response rate for digital-only was higher than expected given current member usage of digital magazine.

- At the current dues price, the print magazine option was preferred over the digital-only magazine by all segments, but is equally preferred at the lower price by mid-to-late career professional members.

- There may be some risk to membership dues with a transition to a digital-only magazine, especially among the younger segments.
Next Steps Toward Full Relaunch

• Finalize model recommendation and level of customization of benefits

• Finalize which new benefits to roll out to entire membership base (given different segment needs) and source new benefits options, with priority on ECEs, based on pilot performance and feedback

• Further enhance value proposition to convey sense of community based on strong desire to “belong to an association”

• Leverage learnings from pilot marketing communications and continue to drive enhancements and optimizations
Appendix
## Summary of Key Pilot Results

### Phase I – Prospects, Lapsed Members

<table>
<thead>
<tr>
<th>Membership</th>
<th>Members</th>
<th>% to Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>ASME Membership</td>
<td>139</td>
<td>72%</td>
</tr>
<tr>
<td>ASME Plus</td>
<td>54</td>
<td>28%</td>
</tr>
<tr>
<td><strong>TOTAL</strong></td>
<td><strong>193</strong></td>
<td></td>
</tr>
</tbody>
</table>

ASME Membership: 77% winbacks, 23% prospects  
ASME Plus: 70% winbacks, 30% prospects  
Response Rate: <1%

### Phase II – Renewals

<table>
<thead>
<tr>
<th>Membership</th>
<th>Members</th>
<th>% to Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>ASME Membership</td>
<td>6,210</td>
<td>95%</td>
</tr>
<tr>
<td>ASME Plus</td>
<td>327</td>
<td>5%</td>
</tr>
<tr>
<td><strong>TOTAL</strong></td>
<td><strong>6,537</strong></td>
<td></td>
</tr>
</tbody>
</table>

Response Rate: 66%

### Segments – ASME Plus

<table>
<thead>
<tr>
<th>Membership</th>
<th>Members</th>
<th>% to Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Professionals</td>
<td>255</td>
<td>78%</td>
</tr>
<tr>
<td>ECEs</td>
<td>48</td>
<td>15%</td>
</tr>
<tr>
<td>Students</td>
<td>24</td>
<td>7%</td>
</tr>
</tbody>
</table>

### Plus Benefit Selection Rate

<table>
<thead>
<tr>
<th>Benefit</th>
<th>% to Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>L&amp;D Course</td>
<td>37%</td>
</tr>
<tr>
<td>Siemens</td>
<td>27%</td>
</tr>
<tr>
<td>Career Dev Webinars</td>
<td>14%</td>
</tr>
<tr>
<td>ASME Insider Webinars</td>
<td>13%</td>
</tr>
<tr>
<td>ME Exclusives</td>
<td>9%</td>
</tr>
</tbody>
</table>
## Summary of Key Pilot Results

### No Print Magazine – Regular Price (Prof $158)

<table>
<thead>
<tr>
<th></th>
<th>Members</th>
<th>% to Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Print</td>
<td>1,186</td>
<td>68%</td>
</tr>
<tr>
<td>Digital</td>
<td>545</td>
<td>32%</td>
</tr>
</tbody>
</table>

### No Print Magazine – Lower Price (Prof $139)

<table>
<thead>
<tr>
<th></th>
<th>Members</th>
<th>% to Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Print</td>
<td>976</td>
<td>53%</td>
</tr>
<tr>
<td>Digital</td>
<td>859</td>
<td>47%</td>
</tr>
</tbody>
</table>

### Segments

<table>
<thead>
<tr>
<th></th>
<th>Digital</th>
<th>Print</th>
<th>Digital % to Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Professionals</td>
<td>433</td>
<td>964</td>
<td>31%</td>
</tr>
<tr>
<td>ECEs</td>
<td>66</td>
<td>128</td>
<td>34%</td>
</tr>
<tr>
<td>Students</td>
<td>46</td>
<td>94</td>
<td>33%</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th></th>
<th>Digital</th>
<th>Print</th>
<th>Digital % to Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Professionals</td>
<td>741</td>
<td>754</td>
<td>50%</td>
</tr>
<tr>
<td>ECEs</td>
<td>78</td>
<td>115</td>
<td>40%</td>
</tr>
<tr>
<td>Students</td>
<td>40</td>
<td>107</td>
<td>27%</td>
</tr>
</tbody>
</table>

Note: Data as of 10/12/20
### ASME Plus L&D Courses

<table>
<thead>
<tr>
<th>Course Description</th>
<th>Phase I Selection Rate</th>
<th>Phase II Selection Rate</th>
</tr>
</thead>
<tbody>
<tr>
<td>Practical Piping Design: Loads, Design Criteria, and Hoop Stress</td>
<td>44%</td>
<td>0%</td>
</tr>
<tr>
<td>Ethics for Engineers: Doing the Right Thing When No One is Looking</td>
<td>25%</td>
<td>80%</td>
</tr>
<tr>
<td>Technical Writing for Engineers: Giving Readers What They Need</td>
<td>13%</td>
<td>20%</td>
</tr>
<tr>
<td>Introduction to ASME Standards &amp; Certification</td>
<td>6%</td>
<td>0%</td>
</tr>
<tr>
<td>Additive Manufacturing Preview Course</td>
<td>6%</td>
<td>0%</td>
</tr>
<tr>
<td>Fundamentals of Industrial Automation</td>
<td>6%</td>
<td>0%</td>
</tr>
<tr>
<td>Bolting Specialist Qualification Program - Course #1</td>
<td>0%</td>
<td>0%</td>
</tr>
<tr>
<td>Cell Manufacturing Preview Course</td>
<td>0%</td>
<td>0%</td>
</tr>
<tr>
<td>Communicating to a Non-Technical Audience</td>
<td>0%</td>
<td>0%</td>
</tr>
<tr>
<td>Creating Effective Technical Presentations</td>
<td>0%</td>
<td>0%</td>
</tr>
</tbody>
</table>

**NOTE:** 11 registered courses for Phase I and 5 registered courses for Phase II (selection for Phase II courses began on Oct 1st).
**Board of Governors Meeting**  
**Agenda Item**  
**Cover Memo**

<table>
<thead>
<tr>
<th>Date Submitted:</th>
<th>October 14, 2020</th>
</tr>
</thead>
<tbody>
<tr>
<td>BOG Meeting Date:</td>
<td>November 10, 2020</td>
</tr>
<tr>
<td>To:</td>
<td>Board of Governors</td>
</tr>
<tr>
<td>From:</td>
<td>The Nominating Committee</td>
</tr>
<tr>
<td>Presented by:</td>
<td>Tom Kurfess</td>
</tr>
<tr>
<td>Agenda Title:</td>
<td>New Candidate Application Process and Deadlines for June 2021</td>
</tr>
</tbody>
</table>

**Agenda Item Executive Summary:**

Provide an overview of the revised process for Candidate Applications and announce the new deadlines. Also, reinforce the desire for the Board members to work with and support the SVP’s in identifying qualified candidates.

**Proposed motion for BOG Action:**

**Attachment(s):** PowerPoint presentation
Candidate Application Process

- New streamlined process has eliminated:
  - Letter of Intent
  - Support Speakers
- Letters of Support- will be one page in length
  - Three letters of support will be required from ASME members
  - One letter from the applicant’s employer
- Online Applications – Opens December 1, 2020
- Application due in full February 15, 2021
- Virtual Interviews
  - Round one – April/May, TBD
    (includes possible elimination of a candidate)
  - Round two – June, TBD
- Candidates will apply for the position of President or Member-at-Large
Information/Questions

RuthAnn Bigley
bigleyr@asme.org
212.591.7650
Date Submitted: October 26, 2020
BOG Meeting Date: November 10, 2020

To: Board of Governors
From: Various Units/Sectors
Agenda Title: Unit/Committee Reports to the Board

Agenda Item Executive Summary:

Attached are the following reports to the Board, highlighting the top three accomplishments, challenges, and other information:

- Committee of Past President’s (CPP)
- Committee on Honors (COH)
- Technical Events & Content Sector
- Student and Early Career Development (SECD)
- Diversity and Inclusion Strategy Committee (DISC)
- VOLT Academy
- Industry Advisory Board (IAB)
- Council on Standards and Certification (S&C)
- Public Affairs and Outreach Sector (PA&O)
- Member Development and Engagement Sector (MDE)

Proposed motion for BOG Action: For information only.

Attachments: Reports attached.
Report to the Board
Committee of Past Presidents (CPP)
June 2020 – November 2020

Please provide a report to the Board of Governors on the activities of your unit. This report should be as succinct as possible and should cover the fiduciary responsibility of your unit. This report should not exceed one page.

Top Key Accomplishments (1-3):

1. All appointments within ASME that require a representative from the CPP have been filled. See chart below.

2. The Fellows Review Committee has revised its procedure for the Fellows Application that are considered unqualified. For any application that is marked as unqualified, the Fellows Review Committee will review the application and its reason for rejection. A 2/3 vote of the Fellows Review Committee is required to approve these applications to ensure the candidate meets the requirements for this member grade.

3. There has been a slight increase of women supporting candidates and becoming nominees for the Fellows process

Challenges:

None:

Other information:
(This can include new ideas/opportunities, next step actions and major meetings not covered in the top key accomplishments.)

The CPP will focus on identifying nominees for our ASME awards and will sunset outreach for nominees for Outside Awards.
Please provide a report to the Board of Governors on the activities of your unit. This report should be as succinct as possible and should cover the fiduciary responsibility of your unit. This report should not exceed one page.

Top Key Accomplishments (1-3):

1. **Program Effectiveness.**
   During the year, the General Awards Committee and the Committee on Honors (COH) reviewed and acted favorably upon nominations for seventy-two of the Society's seventy-nine awards.

   COH considered five nominations for Honorary Membership. Three nominees for Honorary Membership were recommended to the Board of Governors for approval. The Committee also considered four nominations for the 2020 ASME Medal and recommended one nominee for approval by the Board of Governors.

   COH continues to uphold the integrity of the Honors Program by carefully evaluating all awardees to ensure they meet the requirements of their award, and that the committee remains true to the purpose and intent of each and every award.

   **New Society Award.**
   COH approved the elevation of the Thomas K. Caughey Dynamics Medal Award to a Society Level Award.

   **Awards Presentation.** The Committee scheduled presentations at functions specific to the administrative bodies whenever possible.

2. **Membership Promotion.**
   To attract and retain ASME membership, COH continues to offer award recipients who are non-members a free year of membership. Ten honorees were invited to join ASME, four have joined so far.

3. **Diversity.**
   COH demonstrated its agility in support of ASME’s goal of leadership development and diversity by restoring the Kate Gleason and the Johnson & Johnson Awards, with a generous financial contribution from the ASME Foundation.

**Challenges:**
None

**Other information:**
The Committee is committed to ASME’s goal of leadership development and diversity by working with the Special Awards Committee to seek and nominate women and underrepresented members willing to serve on award committees, and to actively seek nominations of underrepresented candidates for consideration for the various society awards.
Report to the Board  
TEC Sector  
November 2019 – June 2020

Please provide a report to the Board of Governors on the activities of your unit. This report should be as succinct as possible and should cover the fiduciary responsibility of your unit. This report should not exceed one page.

Top Key Accomplishments (1-3):

1. Virtual Conferences: Over the past 6 months, TEC Divisions successfully executed 17 technical conferences. More than 6,500 people registered for these events, and the overall revenue budget targets of the Sector were met.
2. TEC Fund Projects: There are several divisions that have executed projects using funds awarded by the TEC fund. Highlights include Student Hackathon (Computers & Information in Engineering Division) and a Career workshop by the Management Division.
3. All other events and meetings were transitioned to virtual while still producing quality content and keeping our volunteers engaged.
4. The Petroleum Division funded $100,000 towards the creation of the Guideline on Big Data/Digital Transformation Workflows and Applications for the Oil and Gas Industry. It will be published by December 2020 and will have taken less than a year to produce.

Challenges:
1. Managing the transition of volunteers within the new TEC structure.
2. For 2021 virtual conferences the challenge will be to improve conference attendee engagement and improve the quality of the question and answer sessions during the live virtual conference programs. Additionally, improving integrations of current ASME systems with the virtual conference platforms for a more seamless experience for the attendee.
3. Meeting the expectations and timelines of the 2.0 version of the webtool.

Other information:  
(This can include new ideas/opportunities, next step actions and major meetings not covered in the top key accomplishments.)

- Succession planning for Divisions – provide baseline guidelines for all Divisions with an emphasis on member/position terms and diversity of members within all committees.
- Divisions will begin working on updating current projects and creating new projects under the TEC Development fund, to adapt to virtual for calendar year 2021.
- Manufacturing Engineering Division (MED) and the Board on Standardization and Testing (BST) have put together a cross-functional team to develop a dashboard and web portal on Additive Manufacturing (AM).
REPORT TO THE BOARD OF GOVERNORS
Student & Early Career Development Sector
JUNE 2020 – NOVEMBER 2020

Key accomplishments:

1. Increasing focus on career development
SECD increased its focus on career development. E-Fest Careers, our most significant effort in this space, is a new virtual program designed to help student and early career engineers identify the careers that interest them most, learn how to find a job in a COVID world, share experiences of engineers in hot industries, and develop skills needed for engineering careers of the future. A half-day, multi-track, interactive summit held Saturday, 7 November 2020, included 16 live sessions, 6+ career path ask-me-anything speakers, and 8+ on-demand workshops — drawing 50+ speakers & volunteers from across the Society and creating hours of content that SECD will repurpose for social media and its online content library. As of the submission of this report, the event has generated 1000+ registrations. Moreover, the event generated discussions with four corporate sponsors who are interested in contributing ~$100,000 towards the E-Fest program.

2. Accelerating digital transformation
In concert with the announcement of ASME Anywhere, SECD moved all Academic Year (AY) 2020-2021 programs — E-Fests, EFx’s, competitions, town halls and lectures — to completely virtual. Virtual delivery enables SECD to reach a more global audience by reducing barriers to participation. To publicize its programs for AY 2020-2021, SECD held a virtual “Student & Early Career Town Hall” on 17 September 2020. The town hall garnered 436 unique registrations and generated 239 views on YouTube to date. SECD partnered with ASME Marketing to generate unique promo codes for all SECD virtual events, tied to Marketing’s membership pilot. The first test of using event-specific promo codes — at the September town hall — yielded 17 new members.

3. Decreasing operating costs
Delivering all events virtually greatly reduces the cost of providing SECD programs. New costs for virtual event platforms and tools are only a fraction of the food, travel and venue costs associated with in-person events. For example, the September town hall leveraged ASME’s existing Zoom infrastructure — reaching 500+ persons at $0 marginal cost. E-Fest Careers’ total non-labor cost will be less than $20,000 to reach 2,000+ students. Moving all E-Fest events online will save at least $300,000 in FY21.

Challenges:


- Attendees willingly paid substantial registration fees ($100/person for US events) for SECD’s in-person events, like E-Fest. Student & early career engineers’ willingness to pay for virtual programs is closer to $0, resulting in a loss of revenue of roughly $150,000 for FY21.
- Technical limitations in ASME’s existing virtual platforms prohibit implementation of freemium models where we could monetize premium content and experiences. This limitation will be resolved by ASME’s implementation of an Identity Access Management (IAM) solution.
- While virtual events substantially reduce operating costs, the effort to develop highly engaging content for virtual delivery consumes significantly more resource time from staff and volunteers. Moreover, volunteers report finding the effort far less rewarding than developing content for in-person delivery and are experiencing Zoom fatigue with more meetings and iterations. We are exploring new ways to ensure volunteers continue to find the volunteer experience meaningful and rewarding.
- Student Competition Committees have had to take into consideration what the students, universities, state/country and ASME will allow during the pandemic. Competitions have been refactored for fully virtual delivery. Though some volunteers had resigned overall, the Committee Members support the safety protocol and have stepped up and adapted their design and rules for digital testing.
- The Virtual Events Platform market is rapidly evolving. We anticipate a learning curve as SECD experiments with different platforms to identify the ideal ratio of cost to experience for our virtual events.

Other information:
Over the past year, SECD has seen increased interest in its programs from high school students. In a joint pilot with Public Affairs & Outreach, 100 juniors and seniors from Brooklyn Tech’s mechatronics program received VIP treatment at E-Fest Careers including a live panel on robotics, followed by several sessions created and delivered by PAO’s K-12 Education Committee.

Please join us on 4 February 2021 for our spring town hall and on 24 April 2021 for E-Fest Digital.
Report to the Board
Diversity and Inclusion Strategy Committee (DISC)
June 2020 – November 2020

Please provide a report to the Board of Governors on the activities of your unit. This report should be as succinct as possible and should cover the fiduciary responsibility of your unit. This report should not exceed one page.

Top Key Accomplishments (1-3):

1. DISC is working on a D&I volunteer toolkit, a bias-free language guide, and the creation of a D&I repository. The toolkit will consist of information on ASME’s D&I activities, accomplishments, and key relationships with other organizations, with tools to help spread the message. The D&I directory will be a place to house information on all ASME diversity-related activities and events. These resources should be available by February 1, 2021.

2. The first virtual Women In Engineering reception will be held on Tuesday, November 17, 2020, during IMECE. A distinguished panel of women engineers will discuss “Online/Virtual Networking.” Time will be set aside for optional networking breakout sessions to put those tips to practice.

3. All activities that fall under D&I scope are being collected for the SROI dashboards that is being pulled together by the Programs and Philanthropy group.

Challenges:

Not all ASME constituents disclose their race/ethnicity or gender, which means we do not have a clear picture of ASME’s demographics. We are reviewing how to best capture the data.

Other information:

DISC filled two open member-at-large positions. Amy Betz and Ruander Cardenas joined the committee on July 1. Marianne Chan is continuing to serve as the DISC liaison to the LGBTQ Pride group.

DISC appointed the members of the Johnson & Johnson Medal Committee and the award has been funded.
Top Key Accomplishments (1-3):

1. The New Chair and Volunteer Leader Orientation and Training was delivered in August and September for 55 volunteer leaders from all five sectors. This was the first time this training was delivered as an online event. The reception was positive, and the event reached a larger audience than when it was held as a face-to-face event.
2. The VOLT Academy Executive Committee held its annual planning meeting in August. The committee affirmed its structure moving forward and identified project leads for all VOLT programs and activities.
3. VOLT delivered its first online Leadership Workshop in June and July. The topic was “Why You Need Resilience and How to Build It.” More than 60 volunteers and staff participated in the two sessions. The evaluations were very favorable. This will serve as a model for future VOLT online workshops.

Challenges:

VOLT has had to evaluate the move of all program offerings to a virtual environment. This is easier for some programs than others. The committee has created a team to address these challenges.

Other information:
(This can include new ideas/opportunities, next step actions and major meetings not covered in the top key accomplishments.)

In October, the VOLT Academy Executive Committee selected the VOLT Chair for 2021-2024, as well as the Vice Chair, ECLIPSE for 2021-2024. The committee also drafted its Operation Guide reflecting its new status as a committee reporting to the Board of Governors.

The application period is now open, and marketing is underway for the 2021-2022 ECLIPSE program. The application deadline is January 6, 2020.
Top Key Accomplishments (1-3):

1. IAB continued its exploration of the topic of digital transformation and how it is affecting the engineering industry in its virtual meeting on September 2, 2020. The meeting highlighted a specific example by Siemens of a digital twin of an opensource ventilator and its design and uses in the biomedical industry. The ASME Foundation joined the IAB at this meeting to discuss the Campaign for Next Generation Engineers.
2. To improve member engagement during virtual meeting, the IAB Executive Committee held an optional brainstorming session on October 16, 2020. The Executive Committee is looking into holding some optional virtual tours in the coming months.

Challenges:
COVID is challenging some of the IAB companies, which may affect individual and overall company engagement in ASME until this COVID period concludes.

Other information:
1. The IAB will hold its next virtual meeting on December 1. The topic is related to the use of data analytics in more mature engineering issues.
2. Jennifer Herron, Founder and CEO, of Action Engineering, recently joined the IAB as a new member.
Top Key Accomplishments (1-3):

1. **Big Data.** The *Guideline on Big Data/Digital Transformation Workflows and Applications for the Oil and Gas Industry* is being developed to explain the current use and application of data analytics/science in the oil and gas industry. It will provide guidance on the steps to utilize data analytics and machine learning/artificial intelligence to address a given business need. The guideline is being produced with financial and subject matter expert support from the Petroleum Division and ASME Standards Technology-LLC to significantly reduce the time to market and will be published by December 2020, less than a year since the project began.

2. **Research.** The Standards Technology LLC manages all technical research projects to advance the technical rigor of ASME Standards. Two recent strategic initiatives have resulted in a US-DOE grant to manage a multi-year research project to develop a *Standardized Test Method and Calculation Protocol for Determining and Reporting Annual Heat Rate for Coal-Fueled Electricity Generating Units*, and a project supported by NASA with work to be done by NIST to examine the *Toughness of Austenitic Stainless Steels at Liquid Hydrogen and Helium Temperatures*. Those two initiatives will result in close to $500,000 in research for a cost of only $80,000 to ASME.

3. **Certification.** To meet the continuing challenges of COVID-19, Conformity Assessment (CA) implemented a robust virtual auditing program to continue the issuance, maintenance, and renewal of ASME’s Certification programs in the absence of physical onsite activities. ASME has conducted 791 auditing activities from July to October, in which 171 were virtual, contributing 22% of scheduled activities. Also, “Remote Inspections performed by the Authorized Inspector” initiated in June has been utilized 65 times by ASME AIAs. Finally, the 2nd phase of CA’s industry quality improvement initiative (QPS-1 document) started through two virtual global workshops.

Challenges:

1. **Procedure Changes.** Work is underway to obtain approval from the Council to implement 107 recommendations to improve process and efficiency of standards development. This includes developing one common set of Standards Committee Operating Procedures that all 70+ standards committees will be required to follow, without deviation. Consistency within the approval processes and operating procedures will increase volunteer and staff’s operational efficiency.

Other information:

1. **Standards Development Meetings.** The second virtual Boiler Code Week was conducted August 16th–21st. 750 individuals were registered for approximately 190 meetings. This represents an increase of roughly 45 meetings from May 2020 Code Week. At the peak of the event on Monday, 62 meetings were conducted and supported by staff on that day alone. The post-event satisfaction survey indicated a 93% overall satisfaction rate and 97% indicated they would attend future virtual BCWs.

2. **Collaboration.** Standards & Codes, in collaboration with other Business Units, is organizing a Robotics Documentary Series to provide engaging technical content to support ASME’s outreach to practicing engineers, decision-making managers, public policy representatives, and early-career and students with an initial focus on unmanned vehicles (robotics) for inspection and maintenance. This series aims to position ASME as the robotics for inspection and maintenance thought leader.

3. **Women in Standards & Certification (WiSC).** On October 6, 2020 WiSC held a webinar entitled “ASME Adapting to a COVID World.” Over 175 attendees participated in this webinar. The speakers and attendees engaged on the topic of adapting while in a global pandemic and the effects it has had on ASME’s ecosystems.
Top Key Accomplishments (1-3):

1. **Broadening ASME’s Influence Virtually:** With the suspension of in-person events, the ASME Global Public Affairs (GPA) team has tailored virtual events to key audiences—recording town halls with government officials, thus far including Members of Congress and the Director of NIST; congressional briefings with technical/policy panel discussions; and community events, including highlighting the ASME Federal Fellows program. Whereas pre-COVID Government Relations events were typically reserved for public policy-focused audiences in Washington, the virtual platform has extended interactive participation in the U.S. policymaking process to include a broader cross-section of ASME’s membership and stakeholders. Eight of these virtual GR events, thus far, have received over 2,300 views on Zoom and YouTube.

2. **Transforming Technical Education:** The Engineering Education (EE) team is working on a multi-pronged initiative to transform technical education, with the aim of strengthening the faculty community, curriculum, and alignment to better meet industry needs—and transitioning two-year and non-traditional pathways into skilled technical roles. Through a strategic planning initiative, faculty town halls, and a new peer-to-peer monthly webinar series, EE is working to improve channels of communication and cooperation while building an engagement framework that can evolve rapidly to meet this moment of transformative change in higher education.

3. **Increasing Scale while Reducing Costs of ASME K-12 STEM Programs:** ASME has entered a national partnership with Discovery Education, the global leader in standards-based digital curriculum resources for K-12 classrooms worldwide. The ASME-Discovery Education partnership will scale ASME’s reach from 100,000 K-12 STEM students/year to 500,000 students/year, while reducing $250,000 in K-12 STEM implementation costs in FY2021. This initiative will further ASME’s goal of providing equitable access to engaging and compelling “E in STEM” content to a diverse population of students, educators, and K-12 community stakeholders. ASME also secured a $185,000 grant from the United Engineering Foundation for CY2021 to chart a collaborative path forward in K-8 STEM education, in collaboration with ASME’s sister engineering societies.

Challenges:

As ASME faces external revenue limitations and internal fiscal constraints, PAO’s programmatic expenses (at a unit and sector level) have been significantly reduced. The ASME Programs and GPA teams have worked to maintain and bolster value-added content for ASME’s membership and external stakeholders, while reimagining ways to innovate and pivot virtually. Engaging with and captivating stakeholders, nonetheless, remains challenging given the all-encompassing uncertainty of the COVID-19 pandemic and U.S. political unknowns. ASME’s GR relationships, for instance, are heavily dependent on the November 2020 elections—with many congressional and executive offices in a wait-and-see mode until 2021.

Other information:

Report to the Board
Member Development and Engagement Sector
November 2019 – June 2020

Please provide a report to the Board of Governors on the activities of your unit. This report should be as succinct as possible and should cover the fiduciary responsibility of your unit. This report should not exceed one page.

Top Key Accomplishments (1-3):

1. Member engagement: 2 new international sections (Ecuador and UAE) launched reaching an additional 700 members locally, 16 sections reactivating to expand local reach to 7,300 members and 4 international inactive sections self-identified to reactivate their local presence to include over 650 members.

2. Sector continues to build infrastructure for local professional sections success, to include a new professional section handbook, monthly regional meetings for section leaders, all new forms for annual leadership transition to allow for data gathering and better understanding of local programming, launching SharePoint site for MDE and Regional leads use and successful onboarding process for over 550 volunteer leaders.

3. Sector established leadership teams for student section support, launched townhalls for student sections, partnered with SECD on several student related programs, recruited student section advisors for key committees, supported SLTC for upcoming leadership training, onboarded over 200 student sections and continued one on one outreach with local student section leaders.

Challenges:

1. Identifying content and engagement opportunities for virtual local meetings to maintain interest and value of the local section experience.

2. The need for an online payment system in this new virtual landscape to allow sections to collect funds for educational and philanthropic endeavors.

3. Engaging with students in the current unstable environment in local universities.

Other information:
(This can include new ideas/opportunities, next step actions and major meetings not covered in the top key accomplishments.)

1. Opportunity to partner with SROI project to begin to identify section benefits to their local community and the achievement of the ASME mission.

2. Continued dialogue with IT team on programs and objectives of future platforms available to local volunteers to ensure integration with ASME systems.

3. Challenges of the new virtual environment and engagement of both professionals and students in ASME endeavors.