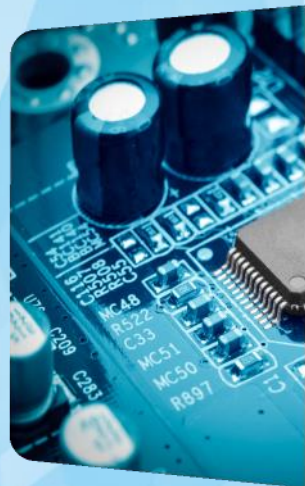
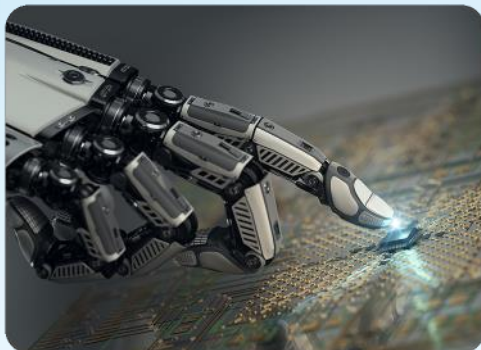




Technical Directions Board Orientation

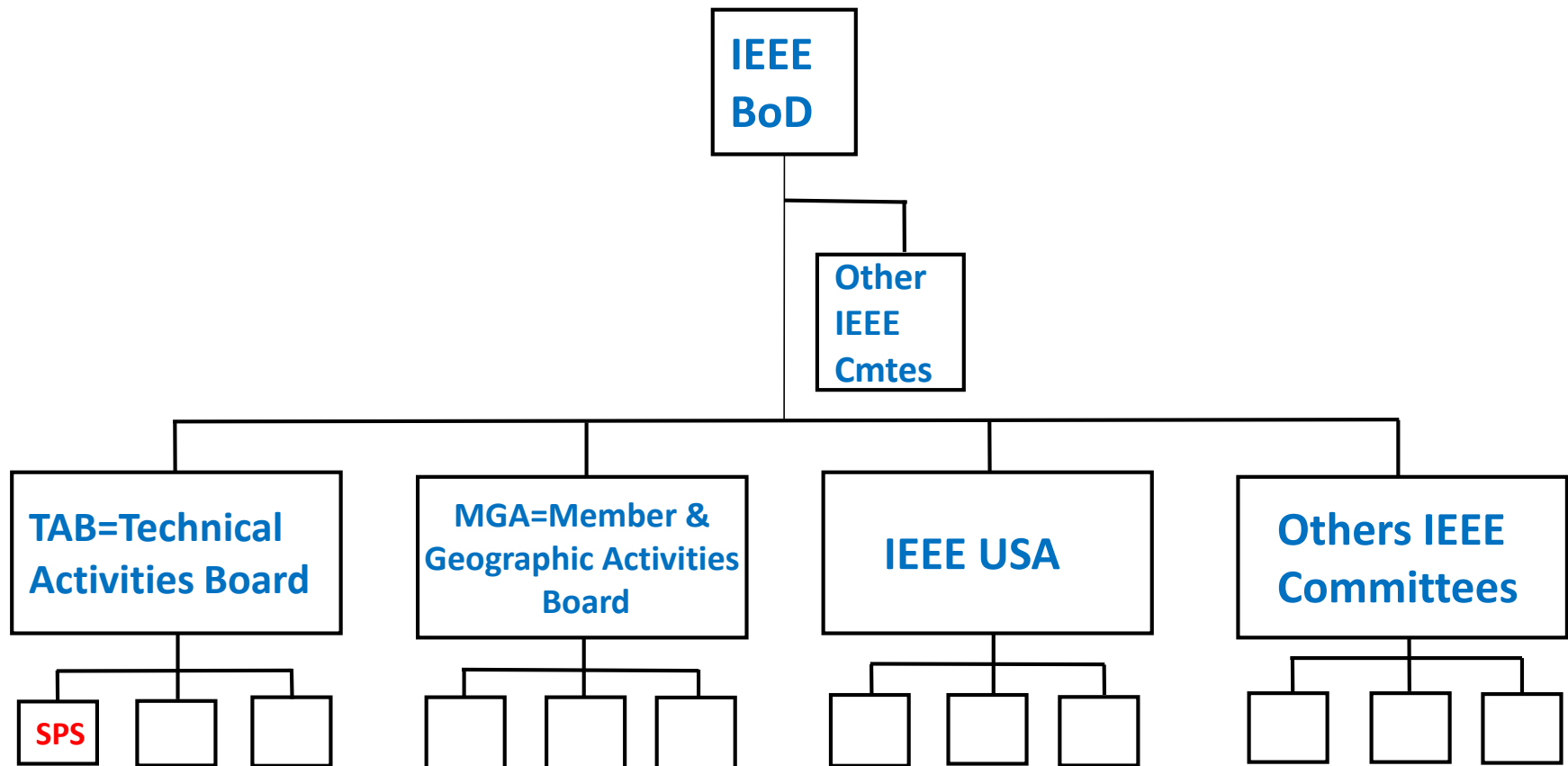
IEEE Signal Processing Society

Table of Contents

- **Overview of IEEE and TAB**
- **SPS's governance structure**
- **SPS's field of interest, mission statement, and vision statement**
- **SPS's Executive Office**
- **SPS's activities:**
 - Technical Committees
 - Publications
 - Conferences
 - Awards
 - Chapters
- **SPS's Recent Initiatives**
- **For more information ...**

The IEEE

a simplified view



IEEE is the parent organization. The Signal Processing Society reports directly to the Technical Activities Board. The Vice President-Technical Activities represents the Societies/Council on the IEEE Board of Directors.

TAB - Technical Activities Board

- **Represents the Societies and Councils to the IEEE Board of Directors**
- **Develops policy for Societies and Councils**
- **Provides support and guidance to Societies and Councils**
- **Monitors operation of Societies and Councils:**
 - Society and publication reviews
 - Approves Society budgets
 - Approves Society field of interest statements
 - Approves new publications
 - Approves changes in publications (title, FOI, etc.)
- **Voting members of TAB include:**
 - 46 society and council presidents
 - 10 division directors
 - 7 other officers/committee chairs

SPS as Part of TAB and IEEE

- ▶ SPS is in Division IX (Alex Acero, Director)
 - SP, AES, GRS, IT, ITS, OES, RFIC and VT
- ▶ SPS has high stature in TAB
 - 1st Society (SP-01)
 - 4th largest Society in membership
 - 2nd largest Society in # publications
 - 3rd largest Society in # meetings
- ▶ SPS has friends in high places IEEE
 - IEEE President: Jose' M.F. Moura
 - TAB Vice President-Elect: K.J. Ray Liu
 - TAB Division IX Director (2018-19): Alex Acero

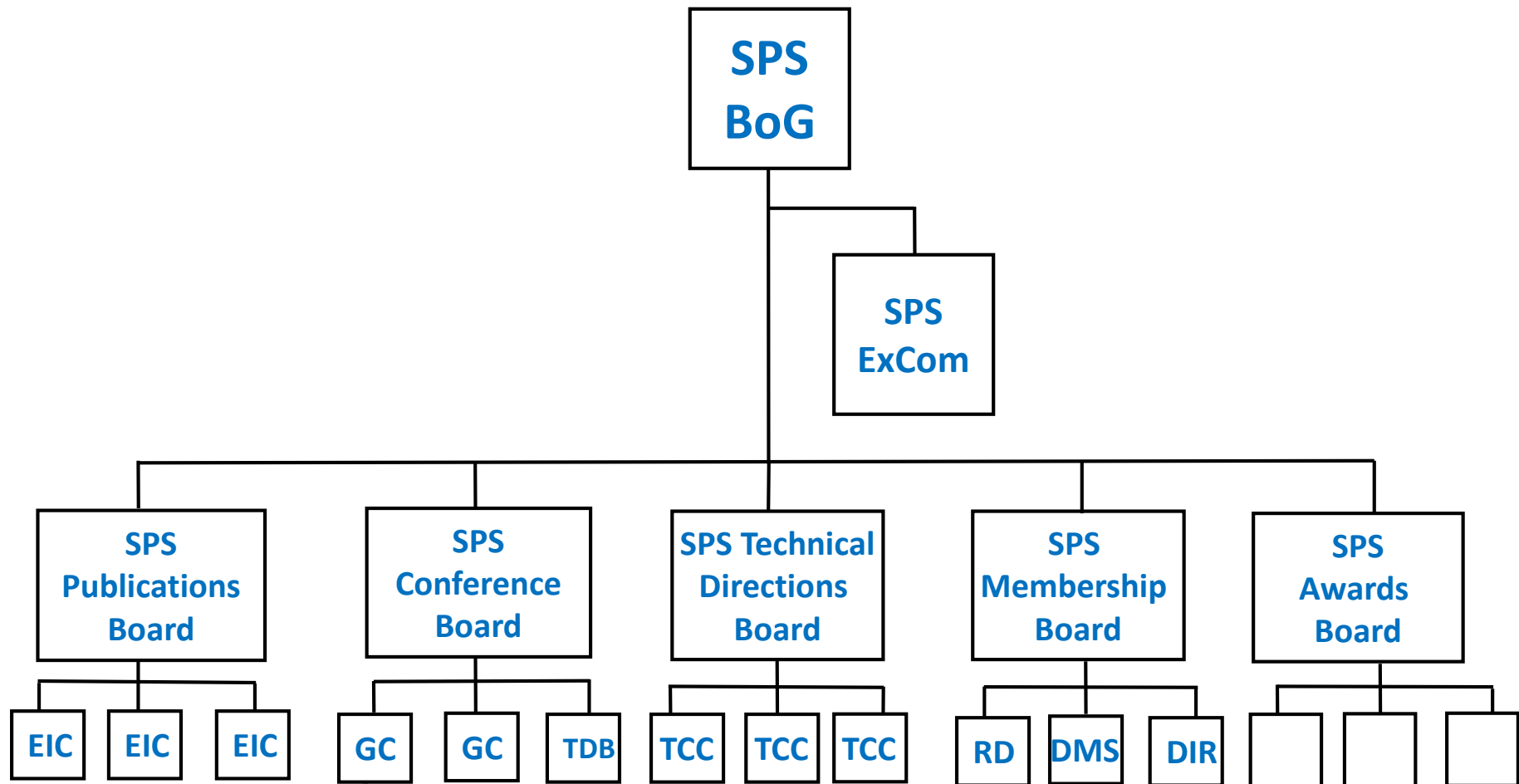
MGA - Member & Geographic Activities Board

- Region 1: Northeastern U.S
- Region 2: Eastern U.S.
- Region 3: Southeastern U.S.
- Region 4: Central U.S.
- Region 5: Southwestern U.S.
- Region 6: Western U.S.
- Region 7: Canada
- Region 8: Europe, the Middle East, Africa
- Region 9: Latin America
- Region 10: Asia and the Pacific Rim

Approximately 63% of all IEEE SPS members are outside Regions 1-6.

IEEE Signal Processing Society

simplified view



IEEE Signal Processing Society

Governance – the BoG

- The Board of Governors (BoG) sets policy for the Signal Processing Society. (So all bylaw changes must be approved by the BoG). However, SPS bylaws are subject to policy decisions of IEEE TAB and the IEEE BoD.
- Often, policy for operation of the Signal Processing Society is recorded in the SPS Bylaws, which are listed in the Volunteer Directory and on the Society's website.
- SPS also has codified policies and procedures that are recorded in our Policy and Procedures Manual; these are also listed in the Volunteer Directory and on the Society's website.

IEEE Signal Processing Society

Governance – the BoG

- The BoG normally meets twice a year:
 - at ICASSP in Spring
 - at ICIP in Fall.
- A Long-Range Planning retreat is convened by each President-Elect.
- The SPS President serves as moderator at BoG meetings.
- The Society follows Robert's Rules of Order.
- Non-controversial items are bundled together in a “consent agenda” which is approved as a whole.
- The BoG can conduct business by e-mail ballot; an affirmative vote of a majority of all the voting members is required to approve the action.

IEEE Signal Processing Society

Governance – the Officers

- **President (Ali H. Sayed) – 2 year term**
 - chairs BoG and ExCom, a member of TAB
- **President-Elect (Ahmed Tewfik) – 2 year term**
 - chairs Long Range Planning and Implementation Committee and TC Review Committee, prepares budgets and serves as BoG Secretary
- **VP-Membership (Nikos Sidiropoulos) – 3 year term**
 - chairs Membership Board and Chapters Review Committee
- **VP-Conferences (Fernando Pereira) – 3 year term**
 - chairs Conference Board and its Executive Subcommittee
- **VP-Publications (Sergios Theodoridis) – 3 year term**
 - chairs Publications Board
- **VP-Technical Directions (Tülay Adali) – 3 year term**
 - chairs Technical Directions Board and interfaces with our TC's

IEEE Signal Processing Society

SP Society – BoG Members-at-Large (MAL)

- Are elected by the membership
- Attend BoG meetings and participate
- General expectations include:
 - Represent the membership of the SP Society
 - Think long term
 - Think strategic
 - Accept volunteer involvements beyond MAL
- Current MAL (end-of-term)
 - Abeer A. H. Alwan (2019)
 - Antonio Ortega (2019)
 - Beatrice Pesquet-Popescu (2019)
 - Shoji Makino (2020)
 - Athina Petropulu (2020)
 - Paris Smaragdis (2020)
 - Douglas O'Shaughnessy (2021)
 - Ana Isabel Pérez-Neira (2021)
 - Zhi (Gerry) Tian (2021)

IEEE Signal Processing Society

SP Society – BoG Regional Directors-at-Large (RDAL)

▪ General expectations include:

- Provide liaison for the Society's Chapters with the IEEE's Regions and Sections
- Represent their region to the core of SPS
- Chair the Regional Committees to promote technical liaison, membership development and Conference organization to regions
- Promote and foster local activities (such as conferences, meetings, social networking)
- Encourage new chapter development with the support of the Chapters Cmte Regional Reps
- Assist established Chapters via promotion, topics, media or technical speakers for chapter meetings
- Offer advices to improve membership relations, recruiting and service to their regions
- Guide and work with their corresponding chapters to serve their members, as appropriate
- Foster nominations for Chapters for the "Chapter of the Year Award"
- Assist Vice President-Membership in conducting chapter reviews.

▪ Current Regional Directors-at-Large, Non-voting Members (end-of-term):

- Bhuvana Ramabhadran – Regions 1-6 (2020)
- Eduardo A.B. Da Silva – Regions 7-9 (2019)
- Cédric Richard – Region 8 (2020)
- K.V.S. Hari – Region 10 (2019)

IEEE Signal Processing Society

Governance – the ExCom (meets 3X/yr & mthly conf calls)

- **The BoG generally reserves policy decisions to itself, but delegates operational decisions to the SPS ExCom**
 - the budget is considered a policy matter, although it is sometimes delegated to the ExCom
 - page budgets, subscription fees are part of the budget
 - any spending outside budget is an operational issue, subject to approval by ExCom (anything that entails supplemental funding needs be approved by the ExCom)

- **The ExCom is comprised of:**
 - the President and President-Elect
 - the four VPs (Membership, Conferences, Publications, and Technical Directions)
 - the Executive Director (ex-officio)

IEEE Signal Processing Society

SPS Staff

Executive Director: Rich Baseil

▪ **Administration**

- **Senior Manager, Operations: Theresa Argiropoulos**
 - Deborah Blazek, Administrator, Committees & Governance
 - George Olekson, Administrative Assistant, Operations
 - Jessica Perry, Membership Communications & Experience Specialist
 - Jaqueline Rash, Membership Assistant

▪ **Publications**

- **Senior Manager, Publications and Education Strategy & Services: William Colacchio**
 - Rupal Bhatt, Web Administrator
 - Adrienne Fisher, Publications Coordinator
 - Kathy Jackson, Publications Coordinator
 - Rebecca Wollman, Publications Administrator

▪ **Conferences**

- **Senior Manager, Conference Strategy & Services: Caroline Johnson**
 - Nicole Allen, Conference Administrator
 - Samantha Walter, Conference Coordinator

The IEEE Signal Processing Society

SPS Staff - Executive Director

▪Executive Director: Rich Baseil

Has strategic and administrative responsibility for the Society's operations, including, but not limited to:

- Responsible for all aspects of the Society's staff operations and property. Directly supervises the senior staff.
- Facilitates the activities of the Board of Governors and its major boards and committees.
- Advises the leadership and volunteers on matters of policy, law, strategy, and general business practice.
- Recommends new technical meetings, practices or services.
- Represents Society staff to IEEE; represents Society to other IEEE organizations, as well as organizations outside IEEE.
- An ex-officio, non-voting member of all Society Boards and Committees.

IEEE Signal Processing Society

SPS Administration Staff

▪Senior Manager, Operations: Theresa Argiropoulos

- Facilitates the Vice President-Membership, the Vice President-Technical Directions, Past President and Award Board Chair in running the operations and management of their activities and executing the decisions and policies of the corresponding Board, ExCom, and Board of Governors.
- Facilitates strategies for the Society's operations and its associated Boards, and manages the daily activities of SPS operations staff.
- Manages the daily finances of the Society, forecasting, and facilitation of the annual budget and works directly with the President-Elect on financial matters.
- Manages collection of overlength pages charges.
- Manages the governance activities including meeting notices, meeting schedules, agenda preparation, minutes, action/information items for the major Boards.
- Works with the Officers to prepare the agendas for relevant meetings and helps develop appropriate strategy for items.
- Supports the Long-Range and Strategic Planning activities.
- Drafts bylaws and policy matters and provides rationale for items.
- Manages the Officer, Member-at-Large, and Regional Director-at-Large and board/committee election activities.
- Manages the website development and creation of content.
- Manages the activities and approval of Distinguished Lecturer, Distinguished Industry Speaker and Chapter expenses.
- Manages the TC Review process.

IEEE Signal Processing Society

SPS Administration Staff

▪ **Administrator, Committees & Governance: Deborah Blazek**

- Supports the governance activities including production of meeting notices, agendas, minutes and action/information items for major Boards.
- Preparation of administrative meeting schedule for conferences.
- Supports award and DL/DIS related activities.
- Preparation of awards plaques/certificates/checks.
- Processes expense reports.
- Administration of e-mail aliases.

▪ **Administrative Assistant, Operations: George Olekson**

- Collection of overlength page charges.
- Organizes communications with all Society Members and new Members.
- Organizes Chapters activities and the Chapter Certification Program.
- Organizes all conference calls.
- Creation of the Volunteer Directory.
- Certifies volunteer member credentials to enable service.
- Organizes information on Society appointed liaisons/representatives/MOUs.

IEEE Signal Processing Society

SPS Administration Staff

■ **Membership Communications & Experience Specialist: Jessica Perry**

- Supports the development and fulfillment of the Society's communications scheme.
- Supports member recruitment, retention, and engagement activities.
- Markets Society products and services to members and non-members.
- Prepares membership statistics and subscription reports.
- Promotes the Society's activities and events.

■ **Membership Assistant: Jaqueline Rash**

- Supports the Membership Board and its Committees/Subcommittees activities.
- Supports Membership Board curated events.

IEEE Signal Processing Society

SPS Conference Staff

▪Senior Manager, Conference Strategy & Services: Caroline Johnson

- Supports the Vice President-Conferences and Conference Board
- Prepare the agenda for all Conference Board meetings
- Executes the decisions and policies of the Conference Board, ExCom, and Board of Governors related to SPS Conferences and Technical Meetings
- Assists in strategic projects and new and enhanced service offerings
- Facilitates strategic and brainstorming sessions regarding the conference portfolio and the future of the business
- Manages daily activities of SPS conference staff.
- Executes projects, decisions and policies of the Conference Board, ExCom, and Board of Governors related to Conferences/Meetings
- Partners with Conference Organizing Committees to facilitate all conferences and workshops from inception through audit, including all society and IEEE required items and checkpoints.
- Develops and maintains guidelines for the Society's conferences.
- Supports activity and partnerships with conference co-sponsors and steering committees as well as TCs overseeing the technical program quality.
- Vendor management and assistance in identifying conference vendors for services.
- Works with IEEE MCE and other external staff partners including the Publications, Xplore, IT and marketing teams on projects and goals.

IEEE Signal Processing Society

SPS Conference Staff

■ Conference Administrator: Nicole Allen

- Lead for ICASSP and ICIP, the two flagship conferences of SPS, as well as several workshops.
- Tasks include proposal facilitation, sponsorship review, historical data reporting, conference support throughout the planning, including contracts, budgets, banking, and general oversight and support.
- Assists volunteer organizers to assure that all IEEE and Society administrative requirements are complete and executed in a timely manner, including notification of intent to bid, preliminary, amended, and final budgets; preparation and dissemination of calls for papers; submission of contract approval; payment/ repayment of loans; opening/closing of bank accounts; facilitation of timely audit and closing, review of conferences to ensure appropriate milestones and/or deadlines are adhered to.
- Special projects to develop improvements through tools and resources for the conference organizers.

IEEE Signal Processing Society

SPS Conference Staff

▪Conference Coordinator: Samantha Walter

- Lead for GlobalSIP, ISBI and logistics for the society board and committee meetings as well as several workshops.
- Tasks include proposal facilitation, sponsorship review, historical data reporting, conference support throughout the planning, including contracts, budgets, banking, and general oversight and support.
- Assists volunteer organizers to assure that all IEEE and Society administrative requirements are complete and executed in a timely manner, including notification of intent to bid, preliminary, amended, and final budgets; preparation and dissemination of calls for papers; submission of contract approval; payment/ repayment of loans; opening/closing of bank accounts; facilitation of timely audit and closing, review of conferences to ensure appropriate milestones and/or deadlines are adhered to.
- Special projects to develop improvements through tools and resources for the conference organizers.

IEEE Signal Processing Society

SPS Publications Staff

▪ Senior Manager, Publication and Education Strategy & Services: William Colacchio

- Supports the Vice President-Publications; manages the SPS Publications operations; and executes the decisions and policies of the Publications Board, ExCom, and Board of Governors related to SPS Publications.
- Facilitates strategies and manages daily activities of SPS publication staff.
- Works with the VP-Publications to prepare the agenda for all Publication Board meetings and helps develop appropriate strategy for items.
- Develops and maintains guidelines for the Society's publications.
- Supports the activities of the IEEE Transactions on Multimedia Steering Committee, IEEE Transactions on Computational Imaging and the IEEE Transactions on Signal and Information Processing over Networks, as well as co-sponsored publications.
- Assists the VP-Publications and Editors-in-Chief regarding policies, page budget issues, production schedules and performance reports, etc.
- Assists the VP-Publications and Editors-in-Chief in annual page budgets preparations.
- Maintains documentation relevant to issues of plagiarism and author misconduct.
- Develops the strategy formulation for the Society's educational offerings.

IEEE Signal Processing Society

SPS Publications Staff

▪ **Publication Administrator, Rebecca Wollman**

- Oversees/manages manuscript submission process for Signal Processing Magazine (SPM) from initial submission to timely transfer of final files to production; primary resource and liaison for volunteer leaders, associate editors, authors, reviewers and staff for designated journal; EIC support for SPM; coordinates administrative daily activities and assists the EICs for the Signal Processing Letters. Publication guidelines.
- Liaison for ScholarOne (S1) providing support to EICs, authors and reviewers; Works with S1 support staff to resolve issues and ensure necessary changes are updated; Trains staff and volunteers regarding new S1 releases and creates custom reporting.
- Work on ad hoc projects as needed in support of the Publications Board, VP-Publications, or Senior Managers of Publications and Conferences.
- Support of VP-Publications on open action items and prepare data, reports, agenda for the Publications Board Meetings and VP-Publications.
- Ensures content on SPS publications website are up-to-date and accurate.

IEEE Signal Processing Society

SPS Publications Staff

■ Publication Coordinators

- **Adrienne Fisher**

- Coordinates administrative daily activities and assists the EICs for the Transactions on Multimedia and Transactions on Signal Processing and Transactions on Computational Imaging.
- Supports educational programs such as webinars and short-course modules; training in Webex hosting, recording, editing, and prepare material for posting on the SPS Resource Center.

- **Kathy Jackson**

- Coordinates administrative daily activities and assists the EICs for the Transactions on Image Processing, Transactions on Audio, Speech, and Language Processing and Content Gazette.
- Supports educational programs such as webinars and short-course modules; training in Webex hosting, recording, editing, and prepare material for posting on the SPS Resource Center.

IEEE Signal Processing Society

SPS Publications Staff

■ Web Administrator: Rupal Bhatt

- Provides day-to-day content, quality assurance, and technical solution support for the Signal Processing Society newsletter, website, websites for managed joint products/services, as well as volunteers.
- Arranges all e-bursts to Society Members
- Handles content upload for the Resource Center.
- Assists SigPort team.

IEEE Signal Processing Society What We Are

■ Volunteer Organization

Serve our members and the community at large:

- Meetings – high quality, provide networking opportunities.
- Publications – high quality and fast publication.
- Make our technical areas visible.
- Educate our members in technical matters related to SPS.

IEEE Signal Processing Society

The First IEEE Society *

Early History of Society 01

- 1948 began as the IRE Professional Group on Audio
- 1953 IRE Transactions on Audio
- 1963 IEEE formed from IRE and AIEE, Professional Group on Audio becomes part of the IEEE
- 1965 renamed the Group on Audio and Electroacoustics
IEEE Transactions on Audio and Electroacoustics
- 1974 renamed Acoustics, Speech and Signal Processing Group
- 1976 first IEEE International Conference on Acoustics, Speech and Signal Processing (ICASSP)
- 1984 first publication of IEEE ASSP Magazine

* *Sixty Years of Signal Processing, May 2008*



IEEE Signal Processing Society

The First IEEE Society *

Later History of Society 01

- 1991 IEEE ASSP Magazine becomes IEEE Signal Processing Magazine
- 1991 IEEE Transactions on ASSP becomes IEEE Transactions on Signal Processing
- 1992 ASSP Society becomes the Signal Processing Society
- 1992 first publication of IEEE Trans. on Image Processing
- 1993 first publication of IEEE Trans. on Speech and Audio Processing
- 1993 Society Executive Office established
- 1994 first publication of IEEE Signal Processing Letters
- 1994 first International Conference on Image Processing (ICIP)
- 2005 first publication of IEEE Trans. on Information Forensics and Security
- 2006 launch of IEEE Journal of Selected Topics in Signal Processing
- 2009 launch of the IEEE Content Gazette
- 2015 launch of the IEEE Transactions on Computational Imaging
- 2015 launch of the IEEE Transactions on Signal and Information Processing over Networks

IEEE SPS Field of Interest

Signal processing is the enabling technology for the generation, transformation, extraction, and interpretation of information. It comprises the theory, algorithms with associated architectures and implementations, and applications related to processing information contained in many different formats broadly designated as signals. Signal processing uses mathematical, statistical, computational, heuristic, and/or linguistic representations, formalisms, modeling techniques and algorithms for generating, transforming, transmitting, and learning from signals.

(Approved by TAB in 2010)

IEEE SPS Mission Statement

The Signal Processing Society is an international organization whose purpose is to:

- advance and disseminate state-of-the-art scientific information and resources
- educate the signal processing community
- provide a venue for people to interact and exchange ideas

(Adopted by SPS Board of Governors 11 September 2003)

IEEE SPS Vision Statement

The Signal Processing Society is a dynamic organization that is the preeminent source of signal processing information and resources to a global community. We do this by:

- being a one-stop source of signal processing resources
- providing a variety of high quality resources to a variety of users in formats customized to their interests
- adapting to a rapidly changing technical community
- being intimately involved in the education of signal processing professionals at all levels

(Adopted by SPS Board of Governors 11 September 2003)

The IEEE Signal Processing Society

Budget and Finance

	2010	2011	2012	2013	2014	2015	2016	2017	2018B	2019B
Income	8.32 M	9.05 M	8.96 M	10.39 M	9.18 M	9.08 M	9.63 M	10.35 M	9.76 M	8.87 M
Expense w/o Investment Income	8.32 M	9.05 M	8.96 M	9.44 M	7.93 M	8.01 M	8.93 M	8.90 M	9.61 M	8.83 M
Operation Surplus	607.5 K	202.3 K	124 K	1.02 M	1.38 M	1.44 M	1.03 M	1.79 M	145.5. K	34.5 K
IEEE Invest Income minus Tax	913 K	-1.43 M	1.10 M	3.47 M	-28.4K	-1.08 M	1.19 M	3.95 M		
Reserves	15.41 M	14.18 M	15.65 M	19.94 M	21.16 M	21.14 M	20.74 M	26.14 M		

SPS Finances

Revenue Streams

■ Products

• Periodicals

- Transactions (5 sole + 11 financially co-sponsored)
- Magazine (1) augmented by e-newsletter
- Letters (1)

• Events

- Conferences/Symposia (3 sole + 5 co-sponsored)
- Workshops (12 sole + 4 co-sponsored)
- Technically Co-Sponsored Events (9-15/year) Contribute delayed revenue from Conference Publication in *Xplore*.

• Electronic media

- Content Gazette

■ Investment returns

SPS Finances

Expense Streams

▪ Providing services to larger community

- SPS Web pages and publicity
- SPS Distinguished Lecture/DIS Program & IEEE History Center
- SPS sponsorship of Society and IEEE Awards
- Webinars

▪ Funding SPS initiatives

- New initiatives: SP Visibility Campaign, VIP Cup, Industry Outreach, Chapter Development, Distinguished Industry Speaker Program, Publication and Conference Initiatives, etc.
- Streamlining conference organization
- Expanding our membership benefits, \$1 Student Membership starting 2019

▪ Operational and administrative expenses

- SPS Staff Office
- Travel assistance for volunteers on SPS Boards
- ICASSP/ICIP/GlobalSIP Travel Grants

▪ IEEE and TAB Infrastructure costs

SPS Finances

- **Annual operating budget:** approximately \$8.87 M
- **Healthy reserves:** approximately \$26.14 M
- **IEEE Infrastructure Expense:** \$1,434 M in 2019 budget

SPS Technical Committees

Technical Committees of the Signal Processing Society:

- Audio and Electroacoustics
- Bio Imaging and Signal Processing
- Computational Imaging
- Design and Implementation of Signal Processing Systems
- Image, Video and Multidimensional Signal Processing
- Information Forensics and Security
- Machine Learning for Signal Processing
- Multimedia Signal Processing
- Sensor Array and Multichannel
- Signal Processing for Communications and Networking
- Signal Processing Theory and Methods
- Speech and Language Processing
- Industry DSP Technology (standing committee)

SPS Technical Committees

Technical Committees:

- A Technical Committee functions in a specific technical area.
- The Industry DSP Technology Standing Committee shall in every way function like a technical committee; its chair shall serve ex-officio, with vote on the Technical Directions Board.
- Technical Committee Chairs are voting members of the Technical Directions Board.
- The creation of a new technical committee, changes in charters, or changes to the name of a technical committee must be approved by the Board of Governors.
- A Technical Committee shall operate in accordance with the bylaws and policies of the Society, in furtherance of the Society's mission.

SPS Technical Committees

Specific activities of Technical Committees:

- Vet credentials and recommend associate editors within scope
- Organize workshops
- Vet requests for technical co-sponsorship of meetings
- Assist in selection of Distinguished Lecturers
- Nominate for Society awards
- Review papers for conferences

SPS Technical Committees

Technical Subgroups:

- A Technical Subgroup may be organized to cover a specified portion of the Society's Field of Interest. Each Technical Subgroup shall be governed by a Technical Committee.
- Subgroups may organize special issues of transactions or a special section in an issue of a transactions.
- Any service for subgroup members, beyond those provided to all Society members, is the financial responsibility of the subgroup members. Any assessment to defray subgroup activities, whether monetary or otherwise, requires the endorsement of the Board of Governors and any other approval required by the rules and practices of the IEEE.

SPS Technical Committees

Technical Committee Reviews:

- Technical Committees will be subject to a formal review. Each Technical Committee will undergo a review at least once every five years with the frequency of the review decided on by the TC Review Committee and the Vice President-Technical Directions at the end of the review process.

SPS Technical Committees

Technical Committee Reviews:

- No later than 31 January of each year, the TC Review Committee shall provide to each Technical Committee Chair being reviewed the TC Review template. The template provides a snapshot of the TC's membership and activities, including, but not limited to, sponsored/co-sponsored workshops; paper review for sponsored/co-sponsored major conferences; session organization for major sponsored/co-sponsored conferences; awards nominations; associate editor nominations by EDICS and journal; distinguished lecturer nominations; TC elections; TC bylaws; number of TC meetings, attendance and quorum; diversity of membership; web page address and date of last update. The TC Review Committee will individually meet with each TC Chair at ICASSP to discuss the review report. The TC Review Committee will study the reports and make formal remarks and recommendations via the review report. The TC Review Committee will submit the final report, which includes their recommendations, for every Technical Committee reviewed to the Board of Governors for formal acceptance.

SPS Technical Committees

Technical Committee Review Goals

- ▶ Maintain historical records
- ▶ Identify trends
- ▶ Propose strategic direction
- ▶ Accumulate Best practices:
 - Awards subcommittee
 - Bylaws
 - Other conferences (SIGGRAPH, NIPS, AACM Multimedia, HLT, EURASIP)
 - Is acceptance rate too high?
- ▶ Circulate TC Review documents to your TC

SPS Special Interest Groups

Special Interest Groups (SIG) are provisional groups that are created to quickly address emerging technical areas. Special Interest Groups will have a life-span of up to three years. They will follow the same composition structure as a Technical Committee and will also function in the same way.

The current Special Interest Groups are:

- Big Data Special Interest Group
- Internet of Things Special Interest Group

SPS Megatrends

A Megatrend is a “hot” technical direction area that is relevant to the signal processing committee and cuts across many of the Society’s Technical Committee.

Currently, there are two Megatrends, which are:

- SPS Data Science Initiative.
- SPS Autonomous Systems Initiative.

SPS Technical Committees

SPS Vice President-Technical Directions

The Vice President-Directions (Tülay Adalı):

- Chairs the SPS Technical Directions Board, which establishes, evaluates, and nurtures the technical goals of the Society
- Represents the Technical Directions Board to the BoG and the ExCom
- Oversees the activities of the Society's technical community in order to improve the Society's technical profile within and outside IEEE
- Assists the Society in identifying emerging technologies at the nexus of signal processing
- Proactively engages the Society's members in strengthening the technical mission of the Society as defined in its Field of Interest.

SPS Technical Committees

Technical Directions Board

Technical Directions Board is responsible for:

- Evaluating the Society's technical goals, objectives, organization and operational plans in light of the scientific, technological, economic, and social climate for the purpose of identifying strategic issues for attention by appropriate entities of the Society
- Assisting the Board of Governors in the Society's strategic and long-range planning
- Being proactive with regard to the Society's technical oversight and profile.

SPS Technical Committees

Technical Directions Board

The SPS Technical Directions Board comprises:

- The Vice President-Technical Directions, who serves as Chair of the Technical Directions Board and moderates the meetings
- The chairs of each of the Society's Technical Committees
- The technical chairs of the next two, approved ICASSP, ICIP, GlobalSIP, ISBI and ICME conferences (ex-officio, non-voting)
- Special Interest Group and Megatrend Initiative Chairs, Education Committee Chair, SPS Vice Presidents and Executive Director (ex-officio, non-voting)
- The President of the SPS is an ex-officio member of all Society Boards and Committees

SPS Publications

Wholly-owned Publications of the Signal Processing Society:

- IEEE Journal of Selected Topics in Signal Processing
- IEEE Signal Processing Magazine
- IEEE Signal Processing Letters
- IEEE Transactions on Signal Processing
- IEEE Transactions on Image Processing
- IEEE Transactions on Audio, Speech, and Language Processing
- IEEE Transactions on Information Forensics and Security
- IEEE Content Gazette

SPS Publications

Co-Sponsored Publications

Financially co-sponsored publications of the Signal Processing Society :

- IEEE Journal on Biomedical and Health Informatics (15%)
- IEEE Transactions on Big Data (7.5%)
- IEEE Transactions on Cognitive Communications and Networking (20%)
- IEEE Transactions on Computational Imaging (70%)
- IEEE Transactions on Green Communications and Networking (10%)
- IEEE Transactions on Medical Imaging (35%)
- IEEE Transactions on Mobile Computing (20%)
- IEEE Transactions on Multimedia (50%)
- IEEE Transactions on Signal and Information Processing over Networks (70%)
- IEEE Trans. on Wireless Communications (varies by subscriptions)
- IEEE Wireless Communications Letters (30%)

SPS Publications

Co-Sponsored Publications

Technically co-sponsored publications of the Signal Processing Society:

- IEEE Computing in Science and Engineering
- IEEE Internet of Things Journal
- IEEE MultiMedia Magazine
- IEEE Reviews in Biomedical Engineering
- IEEE RFID Virtual Journal
- IEEE Security & Privacy Magazine
- IEEE Sensors Journal
- IEEE Transactions on Affective Computing
- IEEE Transactions on Computational Social Systems
- IEEE Transactions on Molecular, Biological, and Multi-Scale Communications
- IEEE Transactions on Network Science & Engineering
- IEEE Transactions on Smart Grid

SPS Conferences

Wholly-Owned Annual Conferences of the Signal Processing Society:

- IEEE International Conference on Acoustics, Speech, and Signal Processing (ICASSP)
- IEEE International Conference on Image Processing (ICIP)

Co-sponsored Annual Conferences/Workshops of the Signal Processing Society:

- IEEE International Conference on Multimedia & Expo (ICME)
 - 25% SPS, CAS, Computer, ComSoc. Lead by SPS
- IEEE International Symposium on Biomedical Imaging (ISBI)
 - 50% SPS, EMBS. Lead by EMBS
- IEEE Conference on Advance Video and Signal-Based Surveillance (AVSS)
 - 50% SPS, Computer Society. Alternate leads every other year.
- ACM/IEEE International Conference on Information Processing in Sensor Networks (IPSN)
 - 50% SPS, ACM. Alternate leads every other year.
- IEEE International Symposium on Signal Processing and Information Technology (ISSPIT)
 - 50% SPS, Computer Society. Alternate leads every other year.
- IEEE Workshop on Signal Processing Systems
 - 50% SPS, Circuits and Systems. Alternate leads every other year.

Note: Because IEEE is a not-for-profit, 501(c)(3) organization, it cannot enter into shared business arrangements with for-profit entities. This prohibition extends to the relationships of the Societies with for-profit companies or other types of for-profit entities.

SPS Workshops

Wholly Owned Annual Workshops of the Signal Processing Society:

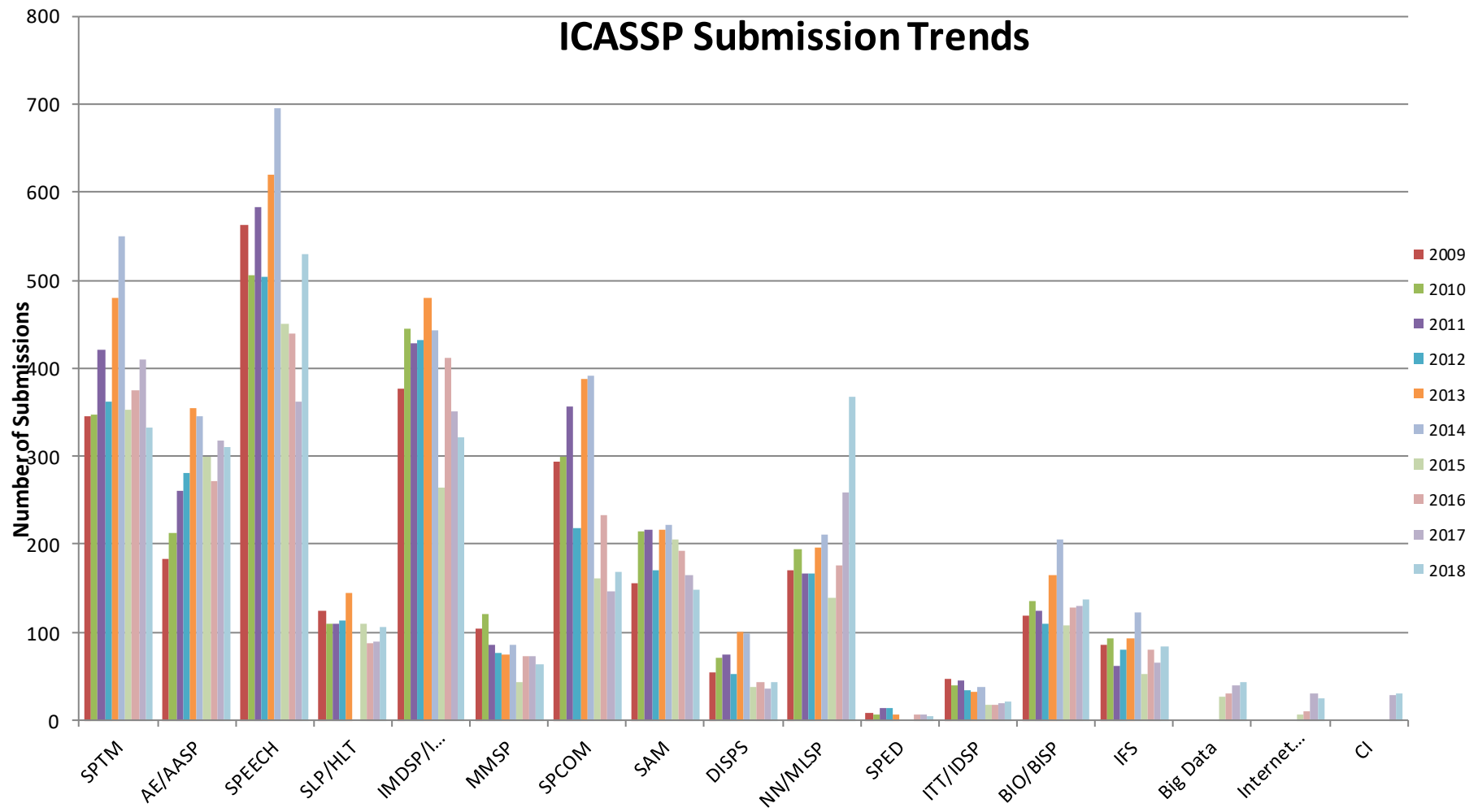
- IEEE Workshop on Data Science
- IEEE Workshop on Information Forensics
- IEEE Workshop on Machine Learning for Signal Processing
- IEEE Workshop on Multimedia Signal Processing
- IEEE Workshop on Signal Processing Advances in Wireless Communications
- IEEE Workshop on Statistical Signal Processing

Wholly Owned Bi-Annual Workshops of the Signal Processing Society:

- IEEE Workshop on Applications of Signal Processing to Audio and Acoustics
- IEEE Workshop on Automatic Speech Recognition & Understanding
- IEEE Workshop on Computational Advances in Multi-Sensor Adaptive Processing
- IEEE Sensor Array and Multichannel Signal Processing Workshop
- IEEE Spoken Language Technology Workshop
- IEEE Workshop on Image, Video, and Multimedia Signal Processing

■Note: Because IEEE is a not-for-profit, 501(c)(3) organization, it cannot enter into shared business arrangements with for-profit entities. This prohibition extends to the relationships of the Societies with for-profit companies or other types of for-profit entities.

ICASSP Submission Trends



SPS Conferences

ICASSP Submission Trends by EDICS

	SPTM	AE	SPEECH	SLP/ HLT	IMDSP/I VMSP	MMSP	SPCOM	SAM	DISPS	NN/ MLSP	SPED	ITT/ IDSP	BIO/ BISP	IFS	Big Data	IOT	CI	TOTAL	Increase from Prev Year
2006	448 14.8%	179 5.9%	666 22%	-	536 17.7%	92 3%	419 13.8%	204 6.7%	96 3.2%	199 6.6%	11 .4%	75 2.5%	102 3.4%	-				3027	15.0%
2007	443 15.6%	162 5.7%	670 23.6%	-	466 16.4%	97 3.4%	380 13.4%	165 5.8%	69 2.4%	142 5%	11 .4%	50 1.8%	91 3.2%	93 3.3%				2839	-6.2%
2008	343 12.9%	204 7.7%	518 19.5%	101 3.8%	397 14.9%	56 2.1%	289 10.9%	202 7.6%	39 1.5%	178 6.7%	11 .4%	99 3.7%	138 5.2%	83 3.1%				2658	-6.4%
2009	345 13.1%	184 7%	563 21.4%	125 4.7%	377 14.3%	104 3.9%	293 11.1%	156 5.9%	55 2.1%	170 6.5%	9 .3%	47 1.8%	119 4.5%	86 3.3%				2633	-.9%
2010	347 12.4%	212 7.6%	505 18.1%	110 3.9%	444 15.9%	121 4.3%	299 10.7%	215 7.7%	71 2.5%	195 7%	6 .3%	39 1.4%	135 4.8%	93 3.3%				2792	6%
2011	421 14.3%	260 8.8%	582 19.8%	109 3.7%	428 14.5%	85 2.9%	356 12.1%	216 7.3%	75 2.5%	167 5.7%	14 .5%	45 1.5%	125 4.2%	62 2.1%				2945	5.5%
2012	362 13.8%	281 10.7%	503 19.2%	114 4.4%	432 16.5%	77 2.9%	218 8.3%	170 6.5%	53 2.0%	167 6.4%	13 .5%	35 1.3%	109 4.2%	81 3.1%				2615	-11.2%
2013	479 14.3%	354 10.6%	619 18.5%	145 4.4%	479 14.3%	74 2.2%	387 11.6%	217 6.5%	100 3.0%	196 5.9%	6 .2%	33 .9%	164 4.9%	93 2.7%				3346	28.0%
2014	550 16.1%	346 10.1%	695 20.3%		442 12.9%	86 2.5%	391 11.4%	222 6.5%	98 2.8%	210 6.1%	0 0%	38 1.1	206 6.1%	123 3.6%				3407	1.8%
2015	352 15.4%	300 13.1%	450 19.7%	109 4.7%	265 11.6%	44 1.9%	161 7%	205 9%	38 1.6%	139 6.1%	0 0%	17 0.7%	107 4.7%	53 2.3%	27 1.1%	6 .2%		2273	-33.3%
2016	375 14.5%	271 10.5%	439 17.0%	87 3.3%	412 16%	73 2.8%	233 9.0	192 7.4%	44 1.7%	176 6.8%	6 0.2%	17 0.6%	128 4.9%	81 3.1%	30 1.1%	11 .4%		2575	13.3%
2017	410 16.2%	317 12.5%	362 14.3%	89 3.5%	350 13.9%	73 2.9%	147 5.8%	164 6.5%	36 1.4%	258 10.2%	6 0.2%	19 0.8%	130 5.1%	66 2.6%	40 1.6%	31 1.2%	29 1.1%	2527	-1.9%
2018	333 12.1%	310 11.3%	529 19.3%	106 3.9%	322 11.8%	64 2.3%	169 6.2%	148 5.4%	43 1.6%	367 13.4%	5 0.2%	21 0.8%	138 5.0%	83 3.0%	43 1.6%	24 0.9%	31 1.1%	2736	8.3%

SPS Conferences

ICASSP Acceptance Trends by EDICS

	SPTM	AE	SPEECH	SLP/ HLT	IMDSP/I VMSP	MMSP	SPCOM	SAM	DISPS	NN/ MLSP	SPED	ITT/ IDSP	BIO/ BISP	IFS	Big Data	IOT	CI	Total	Acpt Ratio
2006	219 15.1%	90 6.2%	312 21.6%	-	242 16.7%	46 3.2%	201 13.9%	96 6.6%	45 3.1%	95 6.6%	6 .4%	41 2.8%	53 3.7%	-				1446	47.77%
2007	198 15.5%	73 5.7%	289 22.7%	-	202 15.9%	39 3.1%	174 13.7%	81 6.4%	30 2.4%	67 5.3%	7 .5%	29 2.3%	42 3.3%	43 3.4%				1274	44.87%
2008	166 12.9%	103 8%	247 19.3%	53 4.1%	184 14.4%	29 2.3%	149 11.6%	93 7.3%	16 1.2%	85 6.6%	10 .8%	45 3.5%	63 4.9%	39 3.0%				1282	48.23%
2009	155 13.4%	83 7.2%	237 20.6%	50 4.3%	165 14.3%	46 4%	129 11.2%	70 6.1%	23 2.0%	76 6.6%	6 .5%	21 1.8%	53 4.6%	39 3.4%				1153	43.79%
2010	167 11.7%	113 7.9%	249 17.5%	59 4.1%	197 13.8%	56 3.9%	142 10%	108 7.6%	35 2.5%	104 7.3%	4 .3%	39 2.7%	58 4.1%	42 6.5%				1373	49.18%
2011	201 13.1%	230 15%	281 18.4%	55 3.6%	197 12.9%	42 2.7%	169 11%	107 7%	40 2.6%	81 5.3%	8 .5%	26 1.7%	66 4.3%	28 1.8%				1531	51.99%
2012	182 14%	138 10.6%	241 19%	60 4.5%	195 15%	41 3.2%	115 8.8%	85 6.5%	30 2.3%	90 7%	12 1%	17 1.3%	53 4.0%	37 2.8%				1296	49.56%
2013	267 15.1	188 10.6%	328 18.5%	73 4.1%	247 13.9%	38 2.2%	205 11.6%	114 6.5%	52 2.9%	103 5.8%	5 .3	18 1.0%	83 4.7%	47 2.7%				1768	52.84%
2014	287 17.5	165 10%	349 21.3		188 11.5%	43 2.6%	187 11.4%	106 6.4%	46 2.8%	101 6.1%	0 0%	9 .5%	97 5.9%	56 3.4%				1634	47.96%
2015	185 16.6%	156 13.9%	203 18.7%	49 4.4%	111 10%	22 2%	74 6.6%	111 10%	23 2.1%	72 6.5%	3 0.3%	10 0.9%	49 4.4%	26 2.3%	15 1.3%	6 .5%		1115	49.05%
2016	201 15.9%	133 10.5%	205 16.2%	40 3.1%	191 15.1%	36 2.8%	116 9.1%	97 7.6%	23 1.8%	90 7.1%	3 0.2%	9 0.7%	59 4.6%	37 2.9%	16 1.2%	6 .4%		1262	49.01%
2017	201 16.5%	160 13.1%	168 13.8%	41 3.4%	167 13.7%	37 3.0%	71 5.8%	80 6.6%	16 1.3%	132 10.8%	0 0.0%	8 0.7%	66 5.4%	25 2.0%	19 1.6%	16 1.3%	13 1.1%	1220	42.28%
2018	166 6.1%	156 5.7%	256 9.4%	50 1.8%	151 5.5%	31 1.1%	74 2.7%	74 2.7%	21 1.8%	171 6.3%	5 0.2%	10 0.4%	61 2.2%	36 1.3%	23 0.8%	11 0.4%	15 0.5%	1341	47.93%

SPS Awards

IEEE Level Awards

- IEEE Jack S. Kilby Signal Processing Medal
- IEEE James L. Flanagan Speech and Audio Processing Award
- IEEE Fourier Award for Signal Processing

SPS Awards

- Best Paper Award
- Best PhD Dissertation Awards (pending approval by TAB)
- Carl Friedrich Gauss Education Award
- Chapter of the Year Award
- Claude Shannon-Harry Nyquist Technical Achievement Award
- Conference Best Paper Award for Industry
- Donald G. Fink Overview Paper Award
- Early Career Technical Achievement Award (new 2019)
- Industrial Leader Award
- Industrial Innovation Award
- Leo L. Baranek Meritorious Service Award
- Meritorious Regional/Chapter Service Award (new 2018)
- Norbert Wiener Society Award
- Regional Distinguished Teacher Award (pending approval by TAB)
- Signal Processing Letters Best Paper Award
- Signal Processing Magazine Best Column Award
- Signal Processing Magazine Best Paper Award
- Sustained Impact Paper Award
- Young Author Best Paper Award

SPS Chapters

- 13 Active chapters in Region 1
 - 10 Active chapters in Region 2
 - 9 Active chapters in Region 3
 - 7 Active chapters in Region 4
 - 5 Active chapters in Region 5
 - 14 Active chapters in Region 6

 - 10 Active chapters in Region 7
 - 39 Active chapters in Region 8
 - 16 Active chapters in Region 9
 - 66 Active chapters in Region 10
- The current list of SPS Chapters can be found on the web at:
<http://signalprocessingsociety.org/sps-chapters>

SPS Chapters

Chapter Support:

- SPS provides annual support up to \$500 per Chapter for coffee breaks or other small social gathering expenses.
- SPS provides an annual allotment up to \$3,500 per Chapter for use of the Society's Distinguished Lecturer (DL) and Distinguished Industry Speaker (DIS) Programs. The annual allotment can be used toward SPS appointed DL/DIS Lecturers or pre-approved invited lecturers.
- **Member-Driven Initiatives:** SPS will provide up to \$10K in 2018 for Society members, Chapters and Committees to submit proposals for funding activities. All proposals must include the involvement of the local Chapter to encourage geographic development. Allocation of funds will be competitive. Full details can be found at <https://signalprocessingociety.org/get-involved/member-driven-initiatives>.

SPS Distinguished Lecturer (DL) and Distinguished Industry Speaker (DIS) Programs

- SPS provides financial support to chapters to support talks by visiting lectures and SPS DL and DIS Lecturers.
- Each year, up to ten (10) technically diverse and geographically dispersed individuals shall serve as SPS DLs and DISs. The formal term of appointment is two calendar years with five (5) individuals appointed each year.
- Information on the SPS DL Program can be found on the web at:
<http://signalprocessingsociety.org/professional-development/distinguished-lecturer-program>.
- Information on the SPS DIS Program can be found on the web at:
<https://signalprocessingsociety.org/professional-development/distinguished-industry-speaker-program>

Challenges Ahead

■ Publication

- Reducing revenues due to IEL distribution
- Further improve quality, impact factors
- Open Access

■ Membership

- Create more values and benefits
- Outreach to emerging regions and segments of membership

■ Finance

- More services and programs – more expenses!
- Create more new products and models?

Challenges Ahead

- 537K is available for new/existing initiatives, plus additional funds are available via the 50% spending rule.
 - Need to focus on initiatives that invest in our future.
- Individual Conference Revenue continues to vary greatly by location and organizing committee each year.
 - Fluctuations create difficulty with conference budget review and society forecasting.
 - Finalizing a new Conference Budget template to help with more realistic budget and forecasting.

Challenges Ahead

■ Continuing Education

- Meeting with Education Committee on a monthly basis
- Proposed honorarium of US\$1,000 for 5-hour course; \$1,500 for 10-hour course. (More than one speaker possible per course, with honorarium split)
- Letter to Volunteers to create short-course modules
- Letter to Tutorial presenters of top attended tutorials to create short-course modules
- Letter to Journal authors of top 25 most popular articles to create one-hour webinars

■ The growth in IEEE Corporate expenses (IT, Legal, Global Offices, etc.) have effectively capped Society income, since Corporate expenses are immediately subtracted from our revenue.

- We will continue to be active in TA Financial Transparency efforts and in urging movement of some corporate functions away from a flat tax model and toward a Service Center model.

For More Information

- ▶ IEEE Signal Processing Society Constitution, Bylaws and Policy and Procedures are located in the *Society Volunteer Directory* and on the Society's *website* at:
<http://signalprocessingsociety.org/volunteers/governance-documents>.