PART A - SECTION SUMMARY

A.1 Executive Summary – (Please follow the format given below)

- Section Executive Committee Member List (2018.1.1-2018.12.31)

<table>
<thead>
<tr>
<th>Name</th>
<th>Position</th>
<th>Email</th>
</tr>
</thead>
<tbody>
<tr>
<td>Shaoqian LI</td>
<td>Chair</td>
<td><a href="mailto:lsq@uestc.edu.cn">lsq@uestc.edu.cn</a></td>
</tr>
<tr>
<td>Pingzhi Fan</td>
<td>Awards &amp; Recognition Committee Chair</td>
<td><a href="mailto:p.fan@ieee.org">p.fan@ieee.org</a></td>
</tr>
<tr>
<td>Dezhong RAO</td>
<td>Educational Activities</td>
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<tr>
<td>Qi HUANG</td>
<td>Liaison</td>
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<tr>
<td>Qingchun CHEN</td>
<td>Professional Activities</td>
<td><a href="mailto:qingchunchen@foxmail.com">qingchunchen@foxmail.com</a></td>
</tr>
<tr>
<td>Gang WU</td>
<td>Secretary</td>
<td><a href="mailto:wugang99@uestc.edu.cn">wugang99@uestc.edu.cn</a></td>
</tr>
<tr>
<td>Zheng MA</td>
<td>Secretary</td>
<td><a href="mailto:zma@swjtu.cn">zma@swjtu.cn</a></td>
</tr>
<tr>
<td>Lei Zhang</td>
<td>Secretary</td>
<td><a href="mailto:leizhang@scu.edu.cn">leizhang@scu.edu.cn</a></td>
</tr>
<tr>
<td>Xinhao XU</td>
<td>Secretary/Treasurer</td>
<td><a href="mailto:xuxinhao@uestc.edu.cn">xuxinhao@uestc.edu.cn</a></td>
</tr>
<tr>
<td>Gang Wu</td>
<td>Secretary/Treasurer</td>
<td><a href="mailto:wugang99@uestc.edu.cn">wugang99@uestc.edu.cn</a></td>
</tr>
<tr>
<td>Sheng SUN</td>
<td>Student Activities</td>
<td><a href="mailto:sunsheng@ieee.org">sunsheng@ieee.org</a></td>
</tr>
<tr>
<td>Bo ZHAGN</td>
<td>Technical Activities</td>
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</tr>
<tr>
<td>Su HU</td>
<td>Newsletter Editor</td>
<td><a href="mailto:husu@uestc.edu.cn">husu@uestc.edu.cn</a></td>
</tr>
</tbody>
</table>

- Section Highlights
  1). Development of new members, especially in student membership
  2). Various activities were held by Chapters and Student Branches
  3). Academic exchanges and communications
  4). Ranked Global No. 2 (No. 1 in Asia) of IEEE Xtrema 11.0 Programming

- Major Events (International, National)
  1). Totally 11 international conferences have been sponsored or co-sponsored by Beijing section

<table>
<thead>
<tr>
<th>Meeting Title</th>
<th>Meeting Date</th>
</tr>
</thead>
<tbody>
<tr>
<td>The 2017 14th IEEE International Computer Conference on Wavelet Active Media Technology and Information Processing, the 14th ICCWAMTIP</td>
<td>2017/12/15-17</td>
</tr>
<tr>
<td>The 9th International Conference on Advanced Infocomm Technology, 2017 ICAT</td>
<td>2017/11/22-24</td>
</tr>
<tr>
<td>2017 Workshop on Advances in Wireless Communications–II</td>
<td>2017/07/20</td>
</tr>
</tbody>
</table>
### Major Chapter Activities

<table>
<thead>
<tr>
<th>Event Title</th>
<th>Event Date</th>
<th>Speaker</th>
</tr>
</thead>
<tbody>
<tr>
<td>Advances in image/video compression using graph transforms</td>
<td>2017/01/13</td>
<td>Enrico Magli</td>
</tr>
<tr>
<td>Sparsity and compressive sensing for large-scale and distributed multimedia applications</td>
<td>2017/01/17</td>
<td>Enrico Magli</td>
</tr>
<tr>
<td>Multimedia Search: From Academic Exercise to Practical Deployment</td>
<td>2017/04/02</td>
<td>Alan Hanjalic</td>
</tr>
<tr>
<td>Computational Spectral+Depth Imaging</td>
<td>2017/04/06</td>
<td>Gonzalo R. Arce</td>
</tr>
<tr>
<td>Point Cloud Compression</td>
<td>2017/04/18</td>
<td>Huifang Sun</td>
</tr>
<tr>
<td>Low-dimension structure and deep model of high-dimension vision data</td>
<td>2017/05/02</td>
<td>Yi Ma</td>
</tr>
<tr>
<td>Kernel System Features of Distributed Systems</td>
<td>2017/05/08</td>
<td>Jeffrey Voas</td>
</tr>
<tr>
<td>Deep Neural Networks from a Developmental Perspective – A Lecture</td>
<td>2017/05/16</td>
<td>B. H. Juang</td>
</tr>
<tr>
<td>Signal Processing on Graphs</td>
<td>2017/05/16</td>
<td>Jose M. F. Moura</td>
</tr>
<tr>
<td>Non-orthogonal Multiple Access Techniques for downlink wireless communications</td>
<td>2017/06/08</td>
<td>Chin-Liang Wang</td>
</tr>
<tr>
<td>Sharing Secret Message Using Meaningful Digital Images with Cheating Detection</td>
<td>2017/06/06</td>
<td>Zhen-chen Chang</td>
</tr>
<tr>
<td>Multi-Robot Path Finding</td>
<td>2017/06/11</td>
<td>Sven Koenig</td>
</tr>
<tr>
<td>Reconstruction and Analysis of Hyperspectral Imagery Using Random Projections</td>
<td>2017/06/14</td>
<td>James Edwin Fowler</td>
</tr>
<tr>
<td>Introduction to Wireless Power Transfer</td>
<td>2017/06/29</td>
<td>Chris Mi</td>
</tr>
<tr>
<td>Visual Objects Tracking: Challenges and Opportunities</td>
<td>2017/07/04</td>
<td>Yu-heng Hu</td>
</tr>
<tr>
<td>Short Course on Signal Integrity for High-Speed Digital Design</td>
<td>2017/07/10</td>
<td>Jun Fan</td>
</tr>
<tr>
<td>RF vs Lightwave Wireless Power Transfer</td>
<td>2017/11/10</td>
<td>George K. Karagiannidis</td>
</tr>
<tr>
<td>Real-Time Internet of Things</td>
<td>2017/12/15</td>
<td>Chenyang Lu</td>
</tr>
<tr>
<td>Next-Generation Digital TV standard: ATSC 3.0</td>
<td>2017/12/19</td>
<td>Yiyan Wu</td>
</tr>
</tbody>
</table>

### Major Student and Affinity Group Activities

- Aug. 10-11, Chair of IEEE Chengdu Student branch, Ms. Fang Cheng, attend 2017 IEEE ANZSCON, held by IEEE South Wales Section

### Awards

- Ph.D. student Jie Li and Prof. Xiaohu Tang of SWJTU receive IEEE Jack Keil Wolf ISIT Student Paper Award with the paper entitled “A Generic
Transformation on Optimal Repair Bandwidth and Rebuilding Access in MDS Codes” in 2017 IEEE International Symposium on Information Theory (ISIT)

- IEEE Chengdu Student branch at UESTC win 2017 China YP-WIE-student Branch Congress, Aug. 4-5, 2017, Shenzhen, China.
- Student Mr. Jie Zhou of UESTC win IEEE MTT-Society Undergraduate Scholarship Award (1 of 8 globally)
- MS. Student Mr. Pengfei Zhang of UESTC win IEEE APS2017 Finalist with the paper entitled “A Novel Feeding Structure for Second Higher Order Mode Excitation of Microstrip Leaky Wave Antenna”
- Ms. Yun Liu of UESTC win ACES2017 Best Student Paper Award with the paper entitled “Design of a Wideband Filtering Power Divider with Stub-Loaded Ring Resonator”
- Ph.D. student, Xudong Li of UESTC received Best Student Paper Award in IEEE International Conference on Multimedia and Expo (ICME 2017) as first author of the paper entitleld “Memory-Based Pedestrian Detection Through Sequence Learning”
- Prof. Qing He of SWJTU received Best Paper Award in ITEC Asia-Pacific 2017 with the paper entitled “Fault Diagnosis and System Reconfiguration Strategy of Single-phase Cascaded Inverter”
- Prof. Jun Xu received MWCL “Tatsuo Itoh” award by IEEE MTT-S

A.2 Financial Report – (Please follow the format given below)

- Summary (as per submitted L50)
  As submitted in the NetSuite System
- Any other financial activities

PART B - ORGANIZATIONAL ACTIVITIES

B.1 Membership Development Activities

- Total number of active members in the past 3 years.
  72

- Summary and evidence of work done to improve the value of membership, which leads to retention and growth of members
  We encourage and develop the student membership by IEEE Chengdu student branches with various events and publicity.

B.2 Chapter Activities

- Total number of Chapters in the Section
  12

- Number of Chapters formed in the current year
  1 (IEEE Signal Processing Chengdu Chapter)

- Number of active Chapters (Chapters who have reported required number of meetings during the year)
• Summary of Chapter activities (Chapter wise with attachment table/information)
  Various chapter majorly hold academic exchange such seminars and holding the
  conferences with independent financial sponsorship.

B.3 Professional and Continuing Education Activities

Summary of continuing Educational activities including conferences, technical activities,
training courses, and distinguished lecture programs with attachment table / information

B.4 Students Activities

• Total number of Student Branches in the Section
  1
• Number of Student Branches formed in the current year
  0
• Section level student activities (student congress, paper and other contests, awards etc)
  See listed awards above.
  In particular, student members from UESTC win the 2nd place globally in
  IEEEXtreme 11.0 programming contest.
• Number of active Student Branches (Student Branches who have reported
  required number of meetings during the year)
  1
• Summary of Student Branch activities (Student Branch wise with attachment
table/information)
  o Aug. 10-11, Chair of IEEE Chengdu Student branch, Ms. Fang Cheng,
    attend 2017 IEEE ANZSCON, held by IEEE South Wales Section
  o Female delegate from Chengdu Student branch at UESTC win 2017 China
    YP-WIE-student Branch Congress, Aug. 4-5, 2017, Shenzhen, China.

B.5 Affinity Group Activities

• Young Professional (YP)
  Chengdu Section Affinity Group

• Women In Engineering (WIE)
  Student Branch of UESTC win “2016-2017 Best Student Branch Award” in China
  in 2017 China YP-WIE-student Branch Congress, Aug. 4-5, 2017, Shenzhen, China

• Life Member
  0

B.6 Awards & Recognition Activities

• Award constituted by the Section
  2017 Best student paper award, held on Jan. 9, 2018, co-located with 2017
  EXCOM meeting of IEEE Chengdu Section.
• Please list all Awards and Recognitions received by the Section, and members in the Section, from R 10 and IEEE HQ during the year 2017
  o See awards above.

B.7 Communication Activities (Newsletter, Home Page, E-mail etc.)

• Newsletter (name and number of issues in the year)

• Home Page of the Section (give the URL and how often it is updated)
  Currently, some of problems encountered with maintenance.

• Other means of contacts with Section members including social media
  A communication mechanism by Wechat group has been set up.

B.8 Industry Relations

• Membership growth and retention
  No statistical data

• Activities for/with industrial members

B.9 Humanitarian Technology Activities

• Humanitarian Technology related activities supported by the Section including collaboration with other OUs.
  None

• SIGHT Activities
  None

B.10 Community Activities

• IEEE Social activities (Family day, IEEE day, Engineers Week)
  None

PART C - OTHERS

C.1 Special Events

• Please briefly describe the importance of special events and the outcomes achieved
• Funding secured from the IEEE and external sources including sponsorships

C.2 Relationship with National and International Societies and Non-Government Organizations (NGO)

• Nature of relationship and details of any formal agreement signed
• Details of joint activities
• Benefit to IEEE members (for example discounts, access to technical information etc.)
• Benefit to Section (for example help in membership development, venue facilities, cost saving etc.)

C3. Collaboration with other IEEE Sections

• Support extended to neighboring Sections
• Joint activities with any other Section
  Attend the events held by IEEE Souths Wales Sections in 2017.

C.4 Support extended to Sub-sections & Society Chapters within the Section

• Support extended for organising technical, educational and professional activities
• Joint activities for membership development
• Support extended for the formation of a Sub-section or transition of a Sub-section into a full Section

C.5 Best Practices of your Section (which you would like to share with other Sections for the benefits of members)

C.6 Problems anticipated and suggestions for solutions, if any

PART D - GOALS AND PLANS

D.1 Continuation of project/activity in progress and their implementation plans
  Re-union of IEEE members in Chengdu by organizing more events and building the bridge to the whole IEEE communities.

D.2 Goals and Future Plans
  Our goal is to develop section members smoothly up to 2,000 in the near future and serves our members better by more academic activities, including conferences, workshops, seminars, visit exchanges etc.

D.3 Any innovative ideas to make IEEE more creative and value added for sustaining the membership retention and recruitment goals.
  To hold joint events with local institute and industrial companies, and develop professional and carrier training.

  Hold 1~2 workshop and 1 conferences to maintain the sustainable growth and financial stability.