# **IEEE Bangladesh Section Report 2018**

# **PART A - SECTION SUMMARY**

# A.1 Executive Summary –

# **Section Executive Committee 2019**

Section Executive Committee 2017				
Full Name	Position	AffiliationPosition and name of University/Institute/Company/Industry		
Dr. Celia Shahnaz	Chair	Professor, Dept of EEE, BUET		
Yeasir Arafat	Vice Chair (Activity)	Associate Professor, Department of EEE, BUET		
Dr. Mohammed MoshiulHoque	Vice Chair (Technical)	Professor, Dept. of CSE, CUET		
Raihan Ur Rashid	Secretary	Institute of Business Administration, University of Dhaka.		
Abhijit Biswas	Treasurer	Lecturer, Eastern University		
Dr. Shaikh Anowarul Fattah	Nominations and Appointments Chair	Professor, EEE, BUET and Chair, IEEE Bangladesh Section 2015-2016		
Dr. Md Faruk Hossain	Membership Development Coordinator	Professor, Dept. of EEE, RUET		
Abul Al Arabi	Awards Coordinator	Lecturer, Northern University		
Shams Shad Islam Khan	Student Activity Coordinator	System Engineer, Bangla Phone Ltd.		
Dr. M Tanseer Ali	Educational Activity Coordinator	American International University- Bangladesh		
Dr. Muhibul Haque Bhuyan	Humanitarian Activity Coordinator	Professor and Chairman, Department of EEE, Southeast University		
AzfarAdib	Industrial Activity Coordinator	Manager, IoT-M2M Services, Grameenphone Ltd.		
Dr. Farseem Mannan Mohammedy	Newsletter Editor	Professor, EEE, BUET		
Faisal Mohsin	Professional Activity Coordinator	Bangladesh Communication Satellite Company Limited		
Dr. Md. Raju Ahmed	Publicity Coordinator	Professor, Department of EEE, DUET		
Dr. Mohammed Imamul Hassan Bhuiyan	Conference Coordinator	Professor, Dept. of EEE, BUET		

**Section Highlights** 

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Events	Dates	Venue
IEEE WIE International Leadership Summit 2018,	12-13 October,	BSMMU Convention
Dhaka	2018	Center
International Humanitarian Technology Project		BSMMU Convention
Competition 2018	12 October 2018	Center
IEEE WIECon-ECE 2018 jointly organized with	14-18 December	
IEEE Thailand Section	2018	Pattaya, Thailand
IEEE Bangladesh Section Vitality Summit 2018	28-Apr-18	BUET
IEEE Bangladesh Section Student, Young	30-Nov-18	BUET
Professional, WIE, Members Congress 2018		

# **Major Events (International, National)**

SL No.	Event Name	Date	Venue
1	SS12 Project Competition and Maker Fair -2018	07-Jun-18	DIU
2	Training Session on "Empowering the Future Through IoT" with Grameenphone	04-Feb-18	BUET
3	PES Day 2018 Celebration with IEEE PES Bangladesh Chapter	23-Apr-18	BUET
4	Workshop on Humanitarian Technology with Sustainable Development	25-Apr-18	BUET
5	IEEE Bangladesh Section Vitality Summit 2018	28-Apr-18	BUET
6	Fostering R&D Investment in Budgetary Policies Through IEEE Engagement	11-Jun-18	BUET
7	Training session on "Humanitarian Technology Project Design for Sustainable Development in Local Community" on CUET	28-Jun-18	CUET
8	IEEE R10 HTC 2017 – Volunteer Recognition Program	04-Jul-18	BUET
9	RoboFiesta 2018	12-Jul-18	BUET
10	IEEE Bangladesh Section Outreach Session	29-Sep-18	Metropolitan University
11	IEEE Bangladesh Section Outreach Session	09-Nov-18	North Bengal International University
12	IEEE BDS IAS Summit	24-Nov-18	Robi Axiata
13	IEEE Bangladesh Section Student, Young Professional, WIE, Members Congress 2018	30-Nov-18	BUET

14	IEEE Bangladesh Section 25th Anniversary Celebration	30-Nov-18	BUET
15	IEEE BDS SSIT Workshop	10-Dec-18	BUET
16	IEEE BDS Award Night and Annual Dinner	25-Dec-18	Hotel Asia and Resort
17	IEEE BDS SPS Forum	25-Nov-18	BUET
18	IEEE BDS EMBS Forum	26-Nov-18	BUET

# \*IEEE Foundation Funded Events

Workshops on "Demystifying Nuclear Power Technology"

SL No.	Venue	Date
1	BUET	19 November, 2018
2	ISTT (Institute of Science, Trade & Technology)	28 Nov, 2018
3	IIUC (International Islamic University Chittagong)	4 Dec, 2018
4	Premier University	4 Dec, 2018
5	CUET	5 Dec, 2018
6	DIU (Daffodil International University)	8 Dec, 2018
7	IUB (Independent University, Bangladesh)	9 Dec, 2018
8	UIU ( United International University )	11 Dec, 2018
9	UAP ( University of Asia Pacific )	12 Dec , 2018
10	ULAB (University of Liberal Arts Bangladesh)	13 Dec,2018
11	IEEE BDS YP Meet-Up 2018	15 Dec, 2018
12	NSU ( North South University )	17 Dec, 2018
13	IEEE PES BUET SB	18 Dec, 2018

# Major Chapter Activities (BDS conducted activities to promote chapters' membership development and engagement)

SL No.	Event Name	Date	Society	Venue
1	Power Buzz 2018	09-10 Feb 2018	PES	North South University
2	Introduction to Robotics and Automation	24-Mar-18	RAS	University of Dhaka
3	Workshop on Machine Learning Algorithms for Robotics and Automation	19-Apr-18	RAS	North South University

4	PES Day 2018 Celebration with IEEE PES Bangladesh Chapter	23-Apr-18	PES	BUET
5	Machine Learning Algorithm for Robotics and Automation at Expeditious '18	29-Jun-18	RAS	CUET
6	Expeditious 2018	29-Jun-18	RAS	CUET
7	A seminar on prospect and opportunities of Robotics in context of Bangladesh through IEEE Engagement	12-Jul-18	RAS	BUET
8	RoboFiesta 2018	12-Jul-18	RAS	BUET
9	SS12 Innovation Challenge and Maker Fair 2018: IEEE Bangladesh Section Pilot Round	20-Jul-18	SSIT	IUB
10	IEEE BDS IAS Summit	24-Nov-18	IAS	Robi Axiata
11	IEEE BDS SSIT Workshop	10-Dec-18	SSIT	BUET
12	IEEE BDS SPS Forum	25-Nov-18	SPS	BUET
13	IEEE BDS EMBS Forum	26-Nov-18	EMBS	BUET

# **Major Student and Affinity Group Activities**

#### **Major Student Activities Event Name** Venue SL Date No. Student Branch ExCom Summit 2018 18-May-18 1 Eastern University IEEE Bangladesh Section Vitality 16-May-18 Jahangirnagar 2 University Enhancement Series Event 1 29-Sep-18 3 IEEE Bangladesh Section Vitality Leading University, Enhancement Series Event 2 Sylhet

4	IEEE Bangladesh Section Vitality Enhancement Series Event 3	29-Sep-18	SUST, Sylhet
5	IEEE Branch Fest	05-Nov-18	BUP

# **Major WIE Events**

SL No.	Event Name	Date	Venue
1	International Women's Day Celebration	16 March, 2018	Stamford University
2	IEEE PES Day Celebration	28 April, 2018	University of Asia Pacific
3	IEEE WIE International Leadership Summit 2018	11-12 Oct 2018	BSMMU Convention Center
4	WIE International Humanitarian Technology Project Competition	11-12 Oct 2019	BSMMU Convention Center

# **Major YP Events**

SL No.	Event Name	Date	Venue
1	IEEE STEP	05-Oct-18	AIUB
2	YP Meet UP	07-Dec-18	UIU

#### **Awards**

Awards and Recognitions received by the Section and Members:

- 1. IEEE MGA Outstanding Large Section Award 2018 (IEEE Bangladesh Section)
- 2. Honorable Mention for the 2017 IEEE Women in Engineering Student Branch Affinity Group of the Year (IEEE BUET WIE SB AG)
- 3. 2018 R10 Young Professionals Affinity Group Award (IEEE Bangladesh Section Young Professionals Affinity Group)
- 4. Region 10 Exemplary Student Branch award for 2017-18 (winner: IEEE NSU Student Branch)
- 5. 2018 R10 WIE Student Branch Affinity Group Award (Winner: IEEE WIE Student Branch AG in BUET)
- 6. R10 Outstanding Volunteer Award 2018 (Winner: Dr. Shaikh Anowarul Fattah)
- 7. R10 Student Activities Committee outstanding Student Volunteer Award 2018 (Winner: Abhijit Biswas)
- 8. 1st Place in IEEE Region 10 SYWL Congress Infographics competition 2018 (Moin Uddin)
- 9. 2nd Place in IEEE Region 10 SYWL Congress Infographics competition 2018 (Kimia Tuz Zaman, Sakib Ahmed, Jahidul Islam, WordhUl Hasan)
- 10. 2nd place in "Living in the Future" Competition (WordhUl Hasan)
- 11. Honorable Mention in WIE Best Event Poster Competition (IEEE Bangladesh Section WIE Affinity Group).
- 12. In 2018, IEEE Bangladesh Section has been awarded 2018 Outstanding Section Membership Recruitment Performance recognition and 2018 Outstanding Section Membership Recruitment and Retention Performance recognition.
- 13. During 2018 membership year IEEE Bangladesh Section have earned an award of 500 USD in the **IEEE Member-Get-a-Member (MGM)** program for having a volunteer who is the **first place recruiter in the Asia Pacific Region**.
- 14. During 2018 membership year IEEE Bangladesh Section have earned an award of 300 USD in the IEEE Member-Get-a-Member (MGM) program for having a volunteer who is **the third place recruiter in the Asia Pacific Region**.
- 15. During 2018 membership year, Sakib Hasan has earned an award of 500 USD in the IEEE Member-Get-a-Member program as the first place recruiter in the Asia Pacific Region.
- 16. During 2018 membership year, IEEE Bangladesh Section has been awarded 200 USD as the first runner-up in the Student Member promoted to Young Professionals category in the R10 MD incentive grants.

# A.2 Financial Report –

# Financial Statement January 1 2018 to December 31 2018

Particulars	BD	T
Particulars	Dr.	Cr.
Opening Balance at Bank	22355.30	
Opening Balance Cash in Hand	1746	
Borrow from IEEE R10 HTC	200000.00	
Refund from IEEE ILS 2018	11000	
Total Income	2862925.00	
	3098026.30	
Total Expenditure	0	2984184.00
Advance for AGM, EXCOM - 10	0	30000.00
Closing Balance at Bank	0	10193.30
Closing Cash in Hand	0	73649.00
	3098026.30	3098026.30

# **Income Statement**

# **January 1 2018 to December 31 2018**

No.	Date	<b>Particulars</b>	Amount
1	14/01/2018	IEEE Transfer from Global Fund	41100.00
2	21/01/2018	IEEE Transfer from Global Fund	82450.00
3	02-05-18	IEEE Transfer from BDS Custody Account	413000.00
4	08-07-18	IEEE Transfer from BDS Custody Account	747000.00
5	15/10/2018	IEEE Transfer from BDS Custody Account	789450.00
6	11-07-18	IEEE Transfer from BDS Custody Account	789925.00
			2862925.00

# Expenditure Statement

# **January 1 2018 to December 31 2018**

Activities	Amount
Student Activity	99,771.00
Educational Activity	102,500.00
Humanitarian Activity	37,200.00
Industrial Activity	41,365.00
Professional Activity	10,500.00
Conference Activity	189,350.00
IEEE ComSoc BD Chapter	16,900.00
IEEE EMBS BD Chapter	13,520.00
IEEE IAS BD Chapter	17,451.00
IEEE PES BD Chapter	10,000.00
IEEE SPS BD Chapter	2,010.00
IEEE WIE BD AG	3,280.00
IEEE YP BD AG	53,300.00
Annual Dinner and Award	99,285.00
Section Congress	95,400.00
R10 Congress	50,851.00
Bangladesh Section 25 Years Celebration	90,000.00
Demystifying Nuclear Technology	428,500.00
ILS	764,600.00
Reimbursement of IEEE R10 Award/Fund	723,750.00
Website Development	10,155.00
Meeting	18,520.00
Section office assistant salary	91,000.00
Section Office Cost	3,690.00
Bank Charge	3,786.00
Others	7,500.00
Total	2,984,184.00

#### PART B - ORGANIZATIONAL ACTIVITIES

## **B.1 Membership Development Activities**

#### Total number of active members in the past 3 years

Higher Grade Member			Student Member		7	Total Men	nber	
2016	2017	2018	2016	2017	2018	2016	2017	2018
645	984	980	1828	2153	2144	2473	3137	3124

- In 2018, IEEE Bangladesh Section has been awarded 2018 Outstanding Section Membership Recruitment Performance recognition and 2018 Outstanding Section Membership Recruitment and Retention Performance recognition.
- During 2018 membership year IEEE Bangladesh Section have earned an award of 500 USD in the **IEEE Member-Get-a-Member (MGM)** program for having a volunteer who is the **first place recruiter in the Asia Pacific Region**.
- During 2018 membership year IEEE Bangladesh Section have earned an award of 300 USD in the IEEE Member-Get-a-Member (MGM) program for having a volunteer who is **the third place recruiter in the Asia Pacific Region**.
- During 2018 membership year, Sakib Hasan has earned an award of 500 USD in the IEEE Member-Get-a-Member program as the first place recruiter in the Asia Pacific Region.
- During 2018 membership year, IEEE Bangladesh Section has been awarded 200 USD as the first runner-up in the Student Member promoted to Young Professionals category in the R10 MD incentive grants.

## **IEEE Bangladesh Section Membership Development Event:07**

1. Event Name: A session on IEEE Bangladesh Section Membership Development & Activities at the University of Rajshahi

Date: 8February2018; No. of Participants: 40; Venue: Seminar Room, Dept. of EEE, University of Rajshahi (RU)

2. Event Name: A session on IEEE Bangladesh Section Membership Development & Activities at Varendra University

Date: 8February2018; No. of Participants: 40; Venue: Seminar Room, Dept. of EEE, Varendra University

3. Event Name: A session on IEEE Bangladesh Section Membership Development & Activities at RUET

Date: 8February2018; No. of Participants: 60 Venue: Seminar Room, Dept. of EEE, Rajshahi University of Engineering and Technology (RUET)

# 4. Event Name: Session on IEEE Bangladesh Section Membership Development & Activities at Dhaka International University

Date: 30 March 2018; No. of Participants: 159; Venue: Dept. of EETE, Dhaka International University

# 5. Event Name: Seminar on "Introduction to IEEE: World's Largest Professional Organization" at University of Dhaka

Date: 4 April 2018; No. of Participants: 40; Venue: Department of EEE, University of Dhaka

# 6. Event Name: "Interactive sessions with IEEE Bangladesh Section Chief Executives" at IIUC

Date: 21st April, 2018; No. of Participants: 50 (36 IEEE members)

Venue: seminar room of Central Auditorium, International Islamic University Chittagong (IIUC)

## 7. Event Name: A Day Long Interactive Session on CUET

Date: 21st April 2018, No. of Participants: 105(40 IEEE Members) Venue: Chittagong University of Engineering and Technology (CUET)

## **B.2** Chapter Activities

## **Total number of Chapters in the Section -9**

Society Name	Formed Last Year	Number of Activities in 2018	Total Member
CH10374-Joint Chapter: Electron Device Society (ED15) and Solid State Circuit (SSC37)	No	11	116
CH10557: Communications Society (COM19)	No		32
CH10197: Power and Energy Society (PE31)	No	11	626
CH10749: Engineering in Medicine and Biology Society (EMB18)	No	12	28
CH10843: Industry Applications Society (IA34)	Yes	14	310
CH10829: Robotics and Automation Society (RA 24)	No	19	72
CH10844: Society on Social Implications of Technology (SIT30)	Yes	11	21
CH10813: Computer Society (C16)	No		187
CH10830: Signal Processing Society (SP01)	No	15	58

• Number of Chapters formed in the current year— 2

# **Chapter Activities:**

<b>Society Name</b>	Events	Date
IEEE Electron Devices and	Workshop on "RF Circuit Design using Computer Simulation Technology(CST)"	January 24, 2018
Solid-State Circuits Society	Workshop on "RTL Verification with System Verilog"	January 25, 2018
	Talk on "Innovation in low-carbon vehicle technologies- vehicle to grid (V2G) systems and integrated power train solutions"	April 01, 2018
	Talk on "Smart heterostructure design to overcome the efficiency bottleneck of deep UV photonics"	April 04, 2018
	Talk on "A Road to Professional Development"	July 04, 2018
	Interactive Panel Discussion on "Career and Opportunity in VLSI Industries"	December 12, 2018
	"Membership Drive 2018"	October 30, 2018
	Distinguished Lecture titled "Negative Capacitance Transistors to Continue CMOS Scaling"	December 23, 2018
	Executive Committee Meeting	March 24, 2018
	Executive Committee Meeting	October 24, 2018
	Executive Committee Meeting	December 10, 2018
IEEE Society for Social Implications of Technology - Bangladesh Chapter	Annual General Meeting	10 March 2018
	Executive Committee Meeting	June 6, 2018
	Executive Committee Meeting	July 19, 2018
	"SS12 Innovation Challenge and Maker Fair 2018: IEEE Bangladesh Section Pilot Round" at Independent University Bangladesh	July 20, 2018

	Executive Committee Meeting with NGO and Student Partners for IEEE HAC Funded Project	November 12, 2018
	Executive Committee Meeting	Dec 02, 2018
	Executive Committee Meeting	Dec 09, 2018
	IEEE SSIT Bangladesh Chapter Workshop on "Humanitarian Technology and Sustainable Development"	December 10, 2018
	Professional Talk on "Ethics and Sustainable Development" at Premier University, Chattogram	December 11, 2008
	Site Visit of IEEE HAC funded project "Bringing Life Back to Rohingya"	December 12- 13. 2018
	Interactive Forum with the Refugee Relief and Repatriation Commission	December 13, 2018
IEEE Power & Energy Society	Executive Committee Election 2018	February 13, 2018
	IEEE PES Day 2018	April 22, 2018
	IEEE PES Day 2018	April 23, 2018
	Technical Talk on "Research Trends in Power and Energy Systems"	May 16, 2018
	Technical Talk on "Transmission Network Plan of Bangladesh up to 2035"	May 21, 2018
	Workshop on DIGSILENT PowerFactory	July 12, 2018
	Technical Talk on "Entrepreneurship: Unlimited Opportunity for Engineers"	July 14, 2018
	IEEE DLP- Challenges and Opportunities of High Solar PV Penetrations to National Grids	December 18, 2018
	IEEE DLP- Challenges and Opportunities of High Solar PV Penetrations to National Grids	December 21, 2018
	IEEE DLP- Challenges and Opportunities of High Solar PV Penetrations to National Grids	December 22, 2018
	Workshop on "Modelling Physical Systems with MATLAB Simulink and Simpower"	December 22, 2018

IEEE Industry	Annual General Meeting	March 10, 2018
Application Society - Bangladesh Chapter	Executive Committee Meeting	July 10, 2018
	IEEE IAS BD Chapter Video Contest Forum	August 13, 2018 (Deadline)
	Executive Committee Meeting	August 13, 2018
	IAS Multicultural Video Contest at R10 SYWL Congress, Bali, Indonesia	September 1, 2018
	IEEE IAS CMD Robotic Contest	September 23 - September 27, 2018
	IEEE IAS CMD Humanitarian Contest	September 23 - September 27, 2018
	IEEE IAS Technical Paper Presentation	September 23 - September 27, 2018
	Executive Committee Meeting	November 4, 2018
	Workshop on "Pure Sine Wave Inverter Design"	November 8, 2018
	Technical Talk on "PCB Design and Prototyping"	November 5, 2018
	Workshop on "Pure Sine Wave Inverter Design"	November 23, 2018
	IEEE BDS IAS Summit	November 24, 2018
IEEE Signal Processing Society Bangladesh Chapter	Annual General Meeting	March 10, 2018
	Executive Committee Meeting	July 25, 2018
	Technical Talk "Emerging Research" at SPAC NSU	July 27, 2018

	Invited Talk on Isolated Bangla Digit Recognition Using MFCC and ANN at 2nd Symposium on Bangla	28 July 2018
	Computational Linguistics, SUST	
	Invited Talk on Word versus phoneme level Bangla speech analysis: trends and challenges at 2018 International Conference on Bangla Speech and Language Processing (ICBSLP), SUST	September
	Emerging Research for Competitive YP to the Future Rising Star at IEEE STEP, AIUB	October 6, 2018
	Executive Committee Meeting	October 8, 2018
	Women in Signal Processing at WIE ILS 2018, Dhaka	11 October 2018
	Invited Talk on Smart Technology/ Algorithm of Speech Communication for Smart Community at International Conference on Innovations in Science, Engineering and Technology 2018, IIUC	
	Technical Talk on Emerging Research in Signal Processing and its Application in Engineering, Medicine and Biology at IEEE Branch Fest, BUP	November 5, 2018
	Invited talk on Emotion Recognition from Facial Expression Images at 2018 International Conference on Advancement in Electrical and Electronic Engineering- (ICAEEE), DUET	22 November 2018
	Technical talk on Applications of Deep Learning in Natural Language Processing at 2018 International Conference on Advancement in Electrical and Electronic Engineering- (ICAEEE), DUET	23 November 2018
	Technical talk on A brief introduction to Signal Processing	28 November 2018
	Executive Committee Meeting	December 24, 2018
	IEEE Bangladesh Section SPS Forum	December 25, 2018
IEEE Robotics	Annual General Meeting	March 10, 2018
and Automation	Introduction to Robotics and Automation at DU	March 24, 2018

Society Bangladesh Chapter	Workshop on Machine Learning Algorithms for Robotics and Automation at NSU	April 19, 2018
	Executive Committee Meeting	June 25, 2018
	Machine Learning Algorithm for Robotics and Automation at Expeditious '18, CUET	June 29, 2018
	Expeditious 2018 at CUET	June 29, 2018
	Executive Committee Meeting	July 10, 2018
	A seminar on prospect and opportunities of Robotics in context of Bangladesh through IEEE Engagement at BUET	July 12, 2018
	RoboFiesta 2018 at BUET	July 12, 2018
	IoT in Robotics Workshop , IEEE ISTT Student Branch	25 Oct 2018
	Robotics and IoT Technical Session at BUP	5 November, 2018
	Workshop on Power Electronics &IoT Based Robotics at RUET	Nov 8-9, 2018
	IoT in Robotics Workshop at RUET	8 November, 2018
	Technical Seminar on Introduction to IoT in Robotics at IUB	Nov 17, 2018
	Robotics and IoT Technical Session at DUET	23 November, 2018
	Executive Committee Meeting	29 November 2018
	Technical Session on Robotics, IEEE BDS SYWMC 2018	30November, 2018
	IEEE IAS CMD Robotic Contest, 2 <sup>nd</sup> Prize Winner at IAS General Meeting, Oregon, USA	September 23 - September 27, 2018
IEEE	Annual General Meeting	January 5, 2018

Engineering in Medicine and Biology Society - Bangladesh Chapter	Seminar on "Importance of Biomedical Engineering Education: Potentialities and Challenges"	February 15, 2018
	Technical Talk on "Automatic Disease Detection Using Machine Learning Schemes for Biomedical Engineering"	March 20, 2018
	Talk on "Research Scope for Biomedical Engineering Education"	April 21, 2018
	Technical Session on EMBS Awareness	July 27, 2018
	ExCom Meeting with researchers in EMBS BD	September 12, 2018
	Talk on "Emerging Research for Competitive YP to the Future Rising Star"	October 5, 2018
	Talk on "Emerging Research in Signal Processing and its Application in Engineering, Medicine and Biology"	November 5, 2018
	Talk on "Aspects and Goals of Deep Learning in Biomedical Imaging"	November 23, 2018
	Executive Committee Meeting	November 24, 2018
	EMBS Forum Distinguished Lecture by Prof V.R. Singh, Fellow, IEEE	November 25, 2018
	Talk on "Aspects and Goals of Deep Learning in Biomedical Imaging"	December 12, 2018

## **B.3 Professional and Continuing Education Activities:**

## **IEEE Bangladesh Section technical Cosponsored Conferences at 2018:**

- 1) International Conference on Electrical Engineering and ICT (iCEEiCT) MIST
- 2) 2018 International Conference on Advancement in Electrical and Electronic Engineering-(ICAEEE) DUET
- 3) 21st International Conference of Computer and Information Technology (ICCIT) 2018 UIU
- 4) 2018 10th International Conference on Electrical and Computer Engineering (ICECE) BUET
- 5) International Conference on Innovations in Science, Engineering and Technology 2018 IIUC

- 6) International Conference on Innovation in Engineering and Technology-2018 Dhaka University
- 7) 2018 International Conference on Bangla Speech and Language Processing (ICBSLP)
- 8) International Conference on Networking, System and Security BUET

#### **IEEE Bangladesh Section Organized Conference**

1) 2018 IEEE International WIE Conference on Electrical and Computer Engineering (WIECON-ECE) – jointly with IEEE Thailand section

#### **Pre-university and University Programs:**

- 1. TISP workshop at BUET, Dhaka (November 19, 2018)
- 2. TISP Workshop: Training the Teachers of Rural Areas in Bangladesh (Khulna, BD) (12 November 2018)
- 3. TISP Workshop: Training the Female Teachers from Underprivileged Schools (Co-located with the IEEE ILS 2018) (12 October 2018)
- 4. Seminar on "Importance of Biomedical Engineering Education: Potentialities and Challenges" (February 15, 2018)
- 5. Authorship Workshop at IUT
- 6. Authorship Workshop at DIU
- 7. Authorship Workshop at Canadian University
- 8. Project Competition at iCEEiCT-2018 at MIST

#### **Benefits:**

- Technical seminar, talks, workshops help to get knowledge on recent advancements
- Program helps our community and makes IEEE visible
- Encouraging engineering education
- Training of school teacher
- Students and volunteer get opportunity to know engineering education opportunities

#### Other Professional and Continuing Education Programs:

- 1. Student Transition and Elevation Partnership (STEP) program (5 October 2018)
- 2. Training session on "Humanitarian Technology Project Design for Sustainable Development in Local Community" (June 28, 2018)
- 3. Student Professional Awareness Conference, SPAC at NSU (July 27, 2018)
- 4. Student Professional Awareness Conference, SPAC at BUET (13 December, 2018)
- 5. PowerBuzz 2018: Composition of many segments of competitions and talk sessions (February 09-10, 2018)
- 6. Training Session on "Empowering the Future Through IoT" (February 04, 2018)
- 7. Workshop on "Humanitarian Technology with Sustainable Development" (April 25, 2018)

#### **Benefits:**

- Section actively organizes events for professional development of the members
- Various internationally reputed professional events have been carried out in Bangladesh e.g. SPAC and STEP which were very well responded by the members
- Professional skills necessary in industry and job market were trained, which helped fresh engineers and final year graduates
- Collaboration with leading industries
- Choice of profession helped the beginners

## **B.4 Students Activities**

- Total number of Student Branches in the Section -39
- Number of Student Branches formed in the current year -3
- Section Level Student Activities: (Total 20)
  - 1. SPAVe 2.0 (AIUB-Jan 20)
  - 2. Student Branch ExCom Summit (EU-May 18)
  - 3. SPAC (NSU-July 27)
  - 4. SPAW (AIUB-Aug 04)
  - 5. InfoGraphic Poster Competition (Aug 08)
  - 6. IEEEXTREME workshop in 5 universities RUET, NSU, CUET, SUST and EWU
  - 7. IEEE Bangladesh Section Vitality Enhancement Series (LU-Sep 29)
  - 8. IEEE Bangladesh Section Vitality Enhancement Series (SUST-Sep 29)
  - 9. IEEE Bangladesh Section Outreach Program (Metropolitan University-Sep 29)
  - 10. IEEE WIE ILS Research Ignite Session (Oct 12-13)
  - 11. IEEE Day 2018 (Oct 13)
  - 12. Workshop on PCB Designing and Prototyping (BUBT-Oct 27)
  - 13. Workshop on Cybersecurity & RoboCamp (NSU-Nov 2)
  - 14. Branch Fest (BUP-Nov 5)
  - 15. Workshop on Power Electronics &IoT based Robotics (RUET-Nov 9)
  - 16. IEEE Bangladesh Section Outreach Program (North Bengal International University-Nov 9)
  - 17. SYWMC 2018 (BUET-Nov 30)
  - 18. SPAVe 3.0 (AIUB-Dec 1)
  - 19. Workshop on Ethical Hacking & Block chain Technology (CUET-Dec 3-4)
  - 20. Total 14 Workshops on Demystifying Nuclear TISP, ISTT, SYWMC, IIUC, Premier University, CUET, DIU, IUB, UIU, UAP, ULAB, YP Meet Up, NSU and PES BUET chapter
- Summary of Student Branch activities (Student Branch wise with attachment table/information)

Summary link: <a href="https://goo.gl/U45UrB">https://goo.gl/U45UrB</a>

# **B.5** Affinity Group Activities -

# **Young Professional Activities:**

IEEE Young Professional Affinity Group of Bangladesh Section has done tremendous activities in 2018. At present, this group has more than 800 professional members from academia and industries. For their activities, they have won the **2018 R10 Young Professionals Affinity Group Award.** 

#### YP Activities in 2018:

	T	<u> </u>
IEEE Young Professionals - Bangladesh	IEEE SPAVe 2.0	January 20, 2018
	Get Together and Farewell Program	February 20, 2018
Section	Talk on "Get Prepared – For the next challenge in career: Hear it from the champions"	March 15, 2018
	Talk on "Benefits of joining IEEE Young Professionals"	April 3, 2018
	IEEE SPAC 2018	July 27, 2018
	IEEE SPAW	August 04, 2018
	Seminar on "Embedded System and Interfacing"	September 29, 2018
	Seminar on "Networking Systems"	September 29, 2018
	Talk on "IEEE Young Professionals Outreach"	September 29, 2018
	Workshop on "Pure Sinewave Inverter Design"	October 04, 2018
	IEEE STEP 2.0	October 06, 2018
	Workshop on "PCB Designing and Prototyping"	October 27, 2018
	IEEE Bangladesh Section Outreach Session	November 9, 2018
	Workshop on "Power Electronics & IoT Based Robotics"	November 9, 2018
	IEEE SPAVe 3.0	December 1, 2018
	IEEE BDS YP Meetup 2018	December 15, 2018
	Talk on "Electric Vehicle Motor Driver"	December 22, 2018

## Women in Engineering (WIE) Activities:

With more than 1000 members and numerous international achievements, WIE Affinity Group of Bangladesh Section organized 21 events in 2018. The biggest event of this group was IEEE WIE International Leadership Summit (WIE ILS) 2018 jointly organized by IEEE Bangladesh Section and IEEE Women in Engineering. Another significant event was WIE International Humanitarian Technology Project Competition (WIE-IHTPC) 2018 that was held along with IEEE WIE ILS 2018.

#### WIE Activities in 2018:

Women in	Annual General Meeting	27 January 2018
Engineering	Executive Committee Meeting	16 February 2018
Affinity	International Women's Day Celebration	16 March 2018
Group, IEEE	Workshop on Web Design	24 March 2018
Bangladesh	Workshop on Advanced Microsoft Excel	6 April 2018
Section	IEEE PES Day Celebration	28 April 2018
	IEEE PES Day Celebration	30 April 2018
	Workshop on Structural Characterization of	6 May 2018
	Nanoparticles using XRD Data	
	Writing Scientific Article using LATEX	12 May 2018
	Session on Fundamentals of Chip Designing and its	14 May 2018
	Future Aspects	
	PCB Design using Proteus	15 May 2018
	Workshop on LATEX	19 May 2018
	Workshop on Graphics Design	16 July 2018
	Self Defense for Women	16 July 2018
	Workshop on PCB Designing with Proteus	22 July 2018
	IEEE WIE International Leadership Summit 2018	12-13 October
		2018
	WIE International Humanitarian Technology Project	12 October 2018
	Competition 2018	
	IEEE Day 2018	13 October 2018
	Industrial Application Society Summit 2018	24 November
		2018
	IEEE BDS SYWMC 2018	30 November
		2018
	IEEE WIECON-ECE 2018	14-16 December
		2018

## **B.6 Awards & Recognition Activities**

- Award constituted by the Section
  - o IEEE Bangladesh Section Best Student Branch Award
  - o IEEE Bangladesh Section Best Student Branch Honorable Mention

- IEEE Bangladesh Section Best Student Volunteer Award
- o IEEE Bangladesh Section Best Student Volunteer Award- Honorable Mention
- o IEEE Bangladesh Section Best Student Branch Counselor Award
- o IEEE Bangladesh Section Infographics Competition Winner
- o IEEE Bangladesh Section Infographics Competition 1st Runner-up
- o IEEE Bangladesh Section Infographics Competition 2nd Runner-up
- o IEEE Bangladesh Section Infographics Competition Honorable Mention
- o IEEE Bangladesh Section Video Competition Winner
- o IEEE Bangladesh Section Video Competition 1st Runner-up
- o IEEE Bangladesh Section Video Competition 2nd Runner-up
- o IEEE Bangladesh Section Video Competition Honorable Mention
- Awards and Recognitions received by the Section and Members:
  - 1. IEEE MGA Outstanding Large Section Award 2018 (IEEE Bangladesh Section)
  - 2. Honorable Mention for the 2017 IEEE Women in Engineering Student Branch Affinity Group of the Year (IEEE BUET WIE SB AG)
  - 3. 2018 R10 Young Professionals Affinity Group Award (IEEE Bangladesh Section Young Professionals Affinity Group)
  - 4. Region 10 Exemplary Student Branch award for 2017-18 (winner: IEEE NSU Student Branch)
  - 5. 2018 R10 WIE Student Branch Affinity Group Award (Winner: IEEE WIE Student Branch AG in BUET)
  - 6. R10 Outstanding Volunteer Award 2018 (Winner: Dr. Shaikh Anowarul Fattah)
  - 7. R10 Student Activities Committee outstanding Student Volunteer Award 2018 (Winner: Abhijit Biswas)
  - 8. 1st Place in IEEE Region 10 SYWL Congress Infographics competition 2018 (Moin Uddin)
  - 9. 2nd Place in IEEE Region 10 SYWL Congress Infographics competition 2018 (Kimia Tuz Zaman, Sakib Ahmed, Jahidul Islam, WordhUl Hasan)
  - 10. 2nd place in "Living in the Future" Competition (WordhUl Hasan)
  - 11. Honorable Mention in WIE Best Event Poster Competition (IEEE Bangladesh Section WIE Affinity Group).
  - 12. In 2018, IEEE Bangladesh Section has been awarded 2018 Outstanding Section Membership Recruitment Performance recognition and 2018 Outstanding Section Membership Recruitment and Retention Performance recognition.
  - 13. During 2018 membership year IEEE Bangladesh Section have earned an award of 500 USD in the **IEEE Member-Get-a-Member (MGM)** program for having a volunteer who is the **first place recruiter in the Asia Pacific Region**.
  - 14. During 2018 membership year IEEE Bangladesh Section have earned an award of 300 USD in the IEEE Member-Get-a-Member (MGM) program for having a volunteer who is **the third place recruiter in the Asia Pacific Region**.
  - 15. During 2018 membership year, Sakib Hasan has earned an award of 500 USD in the IEEE Member-Get-a-Member program as the first place recruiter in the Asia Pacific Region.

16. During 2018 membership year, IEEE Bangladesh Section has been awarded 200 USD as the first runner-up in the Student Member promoted to Young Professionals category in the R10 MD incentive grants.

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

- Newsletter Name: IEEE Bangladesh Section Newsletter
  - o Number of Issue in 2018: 02
  - o Issue 1: https://goo.gl/VkMRuA
  - o Issue 2: https://goo.gl/SPWz3e
- Home Page of the Section: <a href="http://www.ieee.org.bd">http://www.ieee.org.bd</a>
- Other means of contacts with Section members including social media

Facebook Page: https://www.facebook.com/IEEEBangladeshSection/

#### **B.8 Industry Relations**

#### **Activities for/with industrial members:**

- Training session "Empowering the Future Through IoT" with Grameenphone in BUET
- Panel Session: "Fostering R&D Investment in Budgetary Policies Through IEEE Engagement" in BUET
- Panel Session "Fostering Industry-Academia Collaboration in Chattogram, the Commercial Capital of Bangladesh" in IIUC, Chattogram
- IEEE Membership awareness session in Grameenphone
- "Power Buzz 2018" in North South University- Industry tracks
- IEEE WIE ILS 2018 Industry, Entrepreneurship and Leadership tracks

#### **B.9** Humanitarian Technology Activities (Total 5 Activities an 1 HAC Funded Project)

1. Event Name: Training session on "Humanitarian Technology Project Design for Sustainable Development in Local Community" at CUET

Date: 28 June2018; No. of Participants: 100; Venue: Operating System Laboratory, Department of CSE, CUET

2. Event Name: Humanitarian Activity Workshop at SPAC

Venue: North South University, Date: 27 July, 2018 Keynote: Dr. S. A. Fattah, No. of Participants – 150

3. Event Name: SS12 Innovation Challenge and Maker Fair 2018: IEEE Bangladesh Section Pilot Round

Venue: Independent University Bangladesh, Date: 20 July, 2018; No. of Participants – 120

4. Event Name: Workshop on "Humanitarian Technology with Sustainable Development"

Date: 25 April 2018; No. of Participants: 40; Venue: ECE Building, BUET

5. IEEE SSIT Bangladesh Chapter Workshop on "Humanitarian Technology and Sustainable Development"

Date: 10 November 2018; Venue: ECE Building, BUET

## Project Name: Bringing Back Life to Rohingya

IEEE Humanitarian Activities Committee Funded Project.

#### **B.10** Community Activities (Total 8)

## 1. IEEE Day Celebration

Date: 13 October 2018; Venue: BSMMU Convention Center

# 2. IEEE Bangladesh Section 25th Anniversary Celebration

Date: November 30, 2018; Venue: BUET

## 3. IEEE BDS Award Night and Annual Dinner

Date: December 25, 2018; Venue: Hotel Asia and Resort

## 4. IEEE R10 HTC 2017 – Volunteer Recognition Program

Date: 4July2018; Venue: ECE Building, BUET, Dhaka

## 5. IEEE Bangladesh Section Executive Committee Iftar

Date: 31 May,2018; Venue: NobabiVhoj ,Lalbag, Dhaka

## 6. Get Together & Farewell Program:

Date: 20/02/2018; Venue: Mad Chef; Organizer- IEEE YP Affinity Group Bangladesh

## 7. Farewell Program of Section Executive

Date: 20/02/2018; Venue: Mad Chef; Organizer- IEEE YP Affinity Group Bangladesh

## 8. Iftar Program with YP and WIE Executive

Date: 12-06-2018; Venue: BUET Café; Participants: 25

#### PART C- OTHERS

#### **C.1** Special Events

- This year IEEE Bangladesh Section has successfully organized IEEE Women in Engineering International Leadership Summit (WIE-ILS) 2018, Dhaka where 55 speakers including 13 foreign speakers and 300 participants from 8 different countries joined.
- IEEE Bangladesh Section has achieved prestigious funding from IEEE Humanitarian Technology Committee to organized Women in Engineering International Humanitarian Technology Project Competition (WIE-IHTPC) -2018 during EEE Women in Engineering International Leadership Summit (WIE-ILS) 2018 where 33 participants including 8 foreign participants participated.
- IEEE WIECON-ECE 2018—this technical conference for WIE members was initiated first time in globe at Bangladesh Section in 2015. In 2018, it was organized for the 4th time in collaboration with IEEE Thailand section in Pattaya, Thailand.
- IEEE Foundation Funded 14 Workshops on "Demystifying Nuclear Power Technology" at TISP, ISTT, SYWMC, IIUC, Premier University, CUET, DIU, IUB, UIU, UAP, ULAB, YP Meet Up, NSU and PES BUET chapter

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

- Collaboration with Bangladesh Energy and Power Research Council (EPRC)
- Jointly organized Workshops on Demystifying Nuclear Power technology with Institute of Nuclear Power Engineering (INPE), BUET
- Collaboration with BangabandhuSatellite Company Limited.
- Collaboration with Bangladesh Hi-Tech Park Authority
- Collaboration with Ministry of Women and Children Affairs of Government of Bangladesh at WIE ILS 2018
- Collaboration with Ministry of Science and Technologyof Government of Bangladesh at WIE ILS 2018
- Collaboration with Information and Communication Technology Division of Government of Bangladesh at WIE ILS 2018
- Collaboration with Access to information in Bangladesh (a2i) Programme
- Collaboration with SDG Coordinator of Prime Minister's Office of Bangladesh at WIE ILS 2018
- Collaboration with Bangabandhu Sheikh Mujib Medical University (BSMMU) at WIE ILS 2018
- Collaboration with NGO PHALS (Programme for Helpless and Lagged Societies) on IEEE HAC Funded Project "Bringing Back Life to Rohingya".
- Collaboration with Rahim Afroz on IEEE HAC Funded Project "Bringing Back Life to Rohingya".

#### C3. Collaboration with other IEEE Sections

- SS12 Project Competition and Maker Fair -2018 in collaboration with IEEE Madras Section and IEEE Sri-Lanka Section
- IEEE WIECON-ECE 2018 Joint collaboration with IEEE Bangladesh Section and IEEE Thailand Section.

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

- Jointly celebrated PES Day 2018 with IEEE PES BD Chapter.
- Jointly organized IEEE Bangladesh Section SPS Chapter Forum with IEEE SPS BD Chapter where keynote speaker was Fellow of IEEE, Dr. Mohammad Alam.
- Jointly organized IEEE Bangladesh Section EMBS Chapter Forum with IEEE EMBS BD Chapter where keynote speaker was Fellow of IEEE, Dr. V.R. Singh.
- Jointly organized workshop with IEEE SSIT BD Chapter titled "IEEE SSIT Bangladesh Chapter Workshop on Humanitarian Technology and Sustainable Development" where the instructor was IEEE SSIT President and IEEE HAC Chair Paul Cunningham.
- Jointly organized IEEE Bangladesh Section IAS Summit 2018 with IEEE IAS BD Chapter
- Supported and conducted 5 promotional workshops in different student branches for IEEE Extreme competition

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

## **Industry Engagement**

Jointly organizing events with industries to increase the awareness and improve the professional member number. Also, working with various industries with related projects so that they can engage with IEEE activities.

#### **Government Engagement**

Engaging with various government ministries and organization so that they can get aware about the importance of IEEE activities and collaborating to match and progress the national goal and global IEEE vision.

## **NGO Engagement**

Working with local NGOs to facilitate the need of community because various NGOs are specialized in providing the help to the community directly. IEEE Section collaborating and providing technological help to the NGOs will better help the community.

#### **Engagement with Entrepreneurs**

To help the entrepreneurs, IEEE Bangladesh Section has organized Entrepreneurship Boot camp to train and educate the future entrepreneurs of the country.

#### **Innovating membership Retention Programs:**

Counselling sessions for students with low CGPA, programs focusing industry requirements and skills to be developed, mandatory awareness and information exchange programs about student scholarships and travel grants, internships with industry and company, part-time campus technical and professional jobs can motivate students for retention of their membership from year to year.

#### **Designing Career lab:**

It will help guiding a student for proper choice of career (academia and industry) based on the information and interest provided by the students. Developing Web based information tool for higher study: based on the qualification (resume) and Toefl/IELTS/GRE scores of the student. Arranging student competition in IEEE conferences as in ICASSP to boost up student membership as well as to ensure student participation in those conferences. Arranging student competition on IEEE New initiatives: for gathering brainstorming, ideas about possible funding applications to apply to IEEE NIPs making online education for disabled students accessible and affordable.

#### PART D - GOALS AND PLANS

## D.1 Continuation of project/activity in progress and their implementation plans

- Teacher in Service Program (TISP)
- IEEE WIECON-ECE 2019
- DLP
- IEEE HAC Funded Project "Bringing Back Life to Rohingya"
- Outreach Program for STEM Education

#### **D.2** Goals and Future Plans:

# Maintain and enhance the vibrant activities of IEEE Bangladesh Section in the following ways:

- Launching new societies of Bangladesh Chapter, such as IEEE CIS, IEEE TEMS, IEEE AP-MTTS join chapter, IEEE PELS
- Enhancing activities of societies of Bangladesh chapter, such as IEEE SPS, IEEE RAS, IEEE SSIT and IEEE IAS.
- Implementing Engineering Projects in Community Service (EPICS) in IEEE
- Implementing projects funded by IEEE HAC, IEEE SIGHT, and IEEE Foundation
- Implementing the Teacher In-Service Program (TISP) under IEEE Pre-university Education.
- Inspire Society sponsored conferences from EMBS, RAS, SPS, IAS and SSIT.
- IEEE WIE NEW Initiative Program (WIENIP): IEEE WIECON-ECE, was held in Dhaka, Bangladesh, Dec 19- 20, 2015. Considering its mega success in south Asian countries in 2015. 2016, 2017, 2018, we will be organizing it with IEEE Bangalore Section.
- Arranging DL program: to energize inactive societies by presenting role models in front
  of them for sharing their views, exchange ideas and latest findings for EMBS, RAS, SPS,
  IAS and SSIT members
- Mentor and Mentee Program (MMP): MMP can be implanted via webinars, online chats, and Women in Leadership Collaboratec (WIL) Community to guide less active/ inactive students/YP/ WIE groups about designing innovative events.

#### Future Programs at a glance –

- IEEE Foundation Program
- WiECON-ECE 2019 at Bangalore
- SS12 Project Competition and Maker Fair 2019
- IEEE TENSYMP 2020
- World Bank supported WIE Power Initiative

# D.3 Any innovative ideas to make IEEE more creative and value added for sustaining the membership retention and recruitment goals.

- Strategy for sustainable membership: Design and conduct online survey and develop a
  student network to make strategies for sustainable membership. Registration benefit for an
  IEEE member in IEEE programs, webinars, tutorials, workshops, internships, skill
  development and industry related programs, which will add value to membership, have to
  be funded/promoted as special events for the retention of membership
- Developing student Branch activation Program: Encourage student branches to update and report their activities by vtools. For inactive branches, web based mentoring programs can be initiated, where active student branches will serve as mentors for energizing inactive branches.

## D.4. Business Plan for Sustainable Growth and Financial Stability.

Inspire Society activities and include them in the business

- IEE EMBS BDS chapter conference
- IEEE IAS BDS Student-led conference
- IEEE RAS BDs chapter nationwide competition
- IEEE SPS BDS chapter workshop and competition
- IEEE SSIT BDS chapter webinar/virtual conference
- Rising Star Conference for YP in Bangladesh
- World Bank supported WePower Initiative
- Industry Forum for Women in Engineering.

#### **Financial Stability:**

Funds will be managed from local industries and registration fees to ensure each program to be self-sustainable.