

# SPARK



A Newsletter for Don Bosco University family, alumni and friends

Volume 10 | Issue 1 | 2018



EU Ambassador at the University



Lifetime Achievement Award to the Vice Chencellor



National Symposium on Recent Trends in Nanobiology



Workshop on Plasma Physics

## Message from the Vice Chancellor

Malcolm Gladwell, in his seminal book “The Tipping Point: How Little Things Can Make a Big Difference” describes a ‘tipping point’ as “the moment of critical mass, the threshold, the boiling point”. It attempts to explain the “mysterious sociological changes that mark everyday life.” Once the ‘tipping point’ is reached, he states, “Ideas and products and messages and behaviors spread like viruses do.”

Margaret Rouse, commenting on Gladwell’s book, describes a tipping point as “simply an addition or increment that in itself might not seem extraordinary but that unexpectedly is just the amount of additional change that will lead to a big effect... A tipping point may simply occur because a critical mass has been reached.”

The term has its origins in the field of epidemiology where it is considered to be a turning point in an evolving situation that leads to a new and irreversible development, just like when an infectious disease reaches a point beyond any local ability to control it from spreading more widely.

\*\*\*\*\*

I would love to think that, here at the University, we have reached a ‘tipping point’ in creating a synergy between some key driving principles in our vision. As Swami Vivekananda says, “When an idea exclusively occupies the mind, it is transformed into an actual physical or mental state.” True! These are the ideas that have been on our minds over the last 10 years:

- a) Social Commitment as a fundamental and defining characteristic of our University and its graduates;
- b) Socially Relevant Research as a major focus in our research labs and as the first choice of our research scholars;
- c) Inter Departmental and Inter Disciplinary collaborations and research as the norm rather than the exception;
- d) Promotion of our wonderful God-given paradises (read ‘campuses’) at Azara, Tapesia and Kharguli to showcase our commitment to developing them as eco-friendly, eco-conscious enclaves that promote eco-diversity, adopt renewable sources of energy, ensure adequate water harvesting techniques to replenish ground water tables, promote eco-diversity and wildlife conservation, adopt solid waste management techniques and waste water recycling;
- e) Moving away and upwards from talk-shops on innovation, creativity and entrepreneurship to concrete research and incubation labs that promote their products through young, gifted and determined entrepreneurs.

\*\*\*\*\*

When I say that we have reached a ‘tipping point’ here at the University, this is what I mean:

1. Early on, we got into socially relevant research into the use of nano-materials in various fields, and have developed some fifteen or more products at our Centre of Excellence in Nanotechnology. One of these is for water purification, a major area of concern in our villages... The solar powered water purifier is a concrete product to evolve out of our own research labs
2. We incubated a company to handle the rolling out of this product, M/S Globinno Engineering Solutions, to mass produce and popularize this product... A significant step towards incubating a start-up.
3. Through this product and with our roof-top solar installations on campus (360 KWs as of now), we are promulgating the use of solar energy for



a variety of purposes... An initiative in tune with the government’s policy of promoting the use of renewable energy.

4. We train Village Youth in the maintenance of some of our research products for the benefit of the villages, remuneration for their services being paid by the beneficiary villages... A minor, but significant, contribution to employment generation
5. We are ensuring that these installations are located as close as possible to the anganwadies whose workers have been trained by us, and whose structures have been renovated by us - to ensure that the children who attend these anganwadies benefit from the availability of clean drinking water... A concrete expression of our social commitment.
6. Our Departments of Social Work, Psychology, Education and Mass Communications work at sustained developmental activities in the villages surrounding the campuses of the University... Thereby creating a synergy between inter-disciplinary research, inter-departmental collaborations and meaningful extension works in the villages.
7. Team after team of our computer engineers from the School of Technology have amazed us with their success at national levels in Hackathons held all over the country, excelling at finding viable solutions to actual problem situations posed to them by various government departments, coming on top when pitted against the best brains from IITs, NITs and other prominent universities... Thereby showcasing yet another focus of our University on project-based learning tackling real-life situations.
8. We have just been awarded by the Central Government one of the few Centres sanctioned across the country under ‘Atal Innovation Mission’ – in a spirited competition from well-heeled and connected institutions... Innovation, creativity, incubation form the raison d’être of these Centres.
9. Our young student engineers, again, garnered 22 out of the 32 research projects sanctioned by the Assam Science and Technology Centre last month, a record that has been taken note of at the highest levels of the government – again against stiff competition from well-known Universities and Research Institutes...

If THAT is not a tipping point, what is?

\*\*\*\*\*

Very soon we shall welcome the Peer Team from the National Assessment and Accreditation Council (NAAC) as they come to get a ‘feel’ of our vibrant faculty and students, our focus on teaching and learning, our obsession with research, innovation and extension works, the varied expressions of the social commitment that runs in our genes, and the magical appeal of our campuses bordering on the ethereal... We look forward to extending them a warm welcome.

- Fr Stephen Mavely  
Rector & Vice-Chancellor

## Lifetime Achievement Award to the Vice Chancellor



The Confederation of Indian Universities conferred a Lifetime Achievement Award to Fr.(Dr) Stephen Mavelly, the Vice Chancellor, on 12 February 2018 at the inaugural ceremony of the 4th International Conference on Environment and Ecology held at Gauhati University, Guwahati, Assam.

This award was presented as per the CIU's existing policy of locating talented Educational Planners and Administrators out of the existing inventory of academicians who have contributed in the specialised areas related to educational planning and administration besides applied research in the fields of art, culture, cleanliness, hygiene, sanitation, ecology, environment, sustainable development, and based on the academic and professional achievements.

## Don Bosco's Feast Day Celebration



The Feast Day of Don Bosco was observed on 31st January (the death anniversary of St John Bosco, the patron saint of the University) to celebrate the life of Don Bosco at the University's Atrium.

Speaking on the life of Don Bosco, Deboreena Sangma, a student from Social Work quoted a famous saying by Don Bosco, "Do not put off till tomorrow the good you can do today. You may not have a tomorrow", and thus urging the gathering to do every little good thing they can to create a better community and a better world to live in.

Showcasing the unique educational philosophy of Don Bosco, a group of students performed a short play on the Don Bosco way of educating the youth, which at his time was considered unconventional approach to teaching.

Floral tributes were paid to Don Bosco by the management, faculty and students while the University choir was singing songs of praise of Don Bosco.

In his message to the gathering, the Vice Chancellor, Fr Stephen Mavelly said, "Don Bosco is not a god, but a simple man, a person, just like you and I. A simple man can work wonders and influence the world when he has a dream. Don Bosco had a dream and that was all that made the difference. Have a dream, work hard to achieve that dream and you will see miracles".

## Staff Development Programme – Spring 2018

A two day Staff Development Programme of Spring Semester was held on 23-24 February, 2018 at Tapesia Campus.



The Resource Person, Prof. (Fr) George Palamattathil explored the topic ‘VALUING SELF-REFLECTION...for transformation’, dealing with the importance of reflecting upon one’s own actions and thoughts.

During these two days, topics related to empathy, what one learns from experiences, reflection on classroom teaching, reflective writing, journaling and many more were covered. Some of these topics were also discussed in groups and presented. With visual aids and games, what began as an unstructured programme turned out to be one of the best staff development programmes organized in the University.

## EU Ambassador to India Visits the University

The Ambassador of the European Union to India, H.E. Mr. Tomasz Kozlowski, visited the University’s Azara Campus on 9th April 2018 and invited the students, researchers and faculty members to tap the various opportunities available under EU-funded programmes for higher education and research such as Erasmus+, the Jean Monnet programme and Marie Skłodowska Curie Actions and collaborative projects in Horizon 2020. Over 70 students and researchers from Assam have so far benefitted under these EU Programmes.



Friederike Tschampa, Head of the Political Section of the EU Delegation to India, also interacted with the students on the occasion of the EU day at Don Bosco University. They discussed the evolution of the EU, its global role and actions, as well as the growing EU-India cooperation across various fields including foreign and security policy, ICT, research and innovation, trade and investment, climate change, energy and sustainability, and people-to-people contacts.

Europe has 4000 higher education institutions, from top-level research establishments to small, specialized colleges, hosting about one-fifth of the world’s students (20 million) and 1.5 million academicians. It is recognized as the leading higher educational destination for international students, offering both cutting edge education and rich cultural experiences. Every year, 1.5 million international students come to Europe, of which around 50,000 are Indians.

On the same day the University’s Tapesia Campus held a function ‘Developmental & Social Commitment Initiatives’ to showcase various social commitment initiatives and socially relevant research of the University at Tapesia Campus, where the Ambassador was the Chief Guest.

Welcoming the dignitaries and guests, the Vice Chancellor, Fr. (Dr) Stephen Mavelly said, “The programme this afternoon has been organized to showcase the developmental and social initiatives of the University – its faculty, students and research scholars.” Highlighting around 15 areas of socially relevant research undertaken at the University he added, “Our research into socially relevant products are finding pride in our social commitment works in the villages around the University Campus...Social commitment runs in the genes of Don Bosco Society. Such commitments is writ large in the profile of Don Bosco University graduate...I am sure that the years ahead will see our graduates and researchers taking pride in the research to develop socially relevant products that impact and ameliorate the lives of people across our country and the globe”.

On this occasion, 12 solar powered water purifiers, developed in-house by the Center of Excellence in Nanotechnology were handed over to 12 villages and Certificates were distributed to the first graduates of a six-month Women Adult Education Programme, organized under the Center of Development Studies and Initiatives.

Appreciating the University’s deeply rooted involvement in the social commitment programmes and the developmental works being done for the local community, the Ambassador said, “This is exactly what a higher education institute should be engaged in, and I am happy to witness visible results of your hard work”.



A presentation on the Social Commitment programmes of the University by Ms Hazel Wahlang, Coordinator, Center of Development Studies and Initiatives, and a presentation on the socially relevant research of the University by Prof. Sunandan Baruah, Director, Center of Excellence in Nanotechnology gave insight to the many areas of developmental initiatives and social commitments of the University to the audience.

### MoU with Construction Skill Development Council of India

The University on 8th March 2018 signed a Memorandum of Understanding with the Construction Skill Development Council of India (CSDCI), in attempt to further its initiatives in Skill Development.



The University has introducing skill-based courses in various schools and departments under its aegis. The skill-based programmes of CSDCI will be introduced and its modalities, durations will be jointly decided by both parties.

Both the parties will jointly establish a skill development, “Center of Excellence” based at the University campus for alignment of all skill development initiatives within the University for Outcome Based Training, Assessment and Certification based on National Occupational Standards (NOS).

In addition, the proposed Center of Excellence would develop micro-entrepreneurs to carry out innovations, research and development of the sector in rural technology space apart from introducing skill development in the region.

## University Teams bagged prizes at Smart India Hackathon Finale

Two teams from the University's Department of CSE & IT – 'anTech' and 'Equalizer' won the 3rd and 4th prizes respectively in a nationwide competition Smart India Hackathon 2018 grand finale held in Kolkata on 30-31 March 2018. These teams had been selected to participate in the grand finale in a regional competition held late last year in the North East.



Team "anTech" bagged a cash prize of Rs.50,000/- under the Ministry Of Health & Family Welfare with Kolkata, West Bengal, as the Nodal City. The problem statement presented by the team was 'Smart Healthcare Assistant'. The team, led by Vidhi Bagadia with members Syed Nadeem Oyez Zikranul Haque, Reniyal Rahman, Sanjiban Roy, Sriparna Saha, Jayantajit Gogoi was mentored by Asst Professor Ms Nupur Choudhury.

Another team, 'Equalizer' also won a cash prize of Rs 10,000 under the Ministry of Women and Child Development, with Indore, Madhya Pradesh as the Nodal city. The team was led by Siva Agarwal with Meghna Saikia, Jintu Kumar Das, Mrijetunjoy Sarkar, Bishal Das, Anisha Sharma as members and Asst. Professors - Dr. Bobby Sharma and Dr. Gypsy Nandi as mentors.

Over 17,400 teams participated in Smart India Hackathon 2018 in the regional level, and out of that 1296 teams were selected to compete in the Grand Finale.

## National Conference on Emerging Trends in the Area of Biosciences

The Department of Life Science organised a one day National Conference in the Area of Biosciences on 9th April 2018 at Tapesia Campus.

The conference was chaired by Dr. Pawan Sharma, Senior Consultant Healthcare, NERBPMC, DBT, Govt. of India, Dr. Arup Kr. Misra, Director, ASTEC, Govt. of Assam, Dr. Bula Choudhury, Senior Scientist, Guwahati Biotech Park, IIT-G Campus and Fr (Dr) Stephen Mavely, the Vice Chancellor.

In his welcome speech, the Vice Chancellor highlighted two points that 'social relevance' is the guiding principles of research at the University and that researchers should question whether their research benefits humanity in some way or another, and, the fact that pharmaceutical companies are exploiting the common man and woman with high prices of drugs. He added, "It is our sincere hope and endeavour to see that our graduates make their presence felt in both these areas of concern in the world of research in biosciences".



The conference had a keynote address, 8 oral presentations and 7 poster presentations. The Best Award for oral presentation was bagged by Ms. Lima Hazarika (Research Scholar, DBU) and Mr. Akash Kalita (Assam Down Town University) won the Best Poster Presentation Award.

The Conference was attended by 85 participants including research scholars, teachers and students from various universities.

## ISO certified Workshop of the Dept. of Mechanical Engineering

The Mechanical Workshop of the Department of Mechanical Engineering has been certified by International Organization for Standardization under ISO 9001:2015. The certification has been done to facilitate product development, consultancy and improved teaching and learning.

Preliminary discussion, preparation of workshop as per ISO standard and investigation by a committee from ISO was held and an initial discussion between ISO member Mr Pradipta Kumar Bagchi, Auditor, ISO and faculty and staff of Department of Mechanical Engineering along with Pro Vice Chancellor Fr. Joseph Nellanatt and Dr. Manoranjan Kalita, Director, School of Technology of the university. Based on the guidelines suggested by ISO, the department prepared the workshop under the guidance and monitoring of Mr Ananga Das, Senior Manager, Emami Limited, Guwahati. After a final verification by ISO, the workshop was then certified.



A special assembly was held on 20th January morning at Azara Campus, where Mr Pradipta Kumar Bagchi and Mr Ananga Das, who helped the University in the whole process, were felicitated. Congratulating the University, Mr Ananga Das expressed his hope that the certification of the Workshop will help the University serve mechanical engineering students better.

## Project Grants from ASTEC

A sum of Rs. 10,000 each has been sanctioned to 22 students of the University by the Assam Science Technology and Environment Council (ASTEC), Science and Technology Department, Govt. of Assam. The details of these students, project names and guides are given below:

1. Biswarup Deb , Dept. of CSE– ‘Smart Border Monitoring system’ (Guide – Dr. Bobby Sharma)
2. Siva Aggarwal, Dept. of CSE & IT – ‘Blood donation & real time ambulance tracking mobile application’. (Guide - Nupur Choudhury)
3. Lory Kyntiewnam Syiemlieh, Dept. of CSE & IT – ‘Voice based communication System for visually impaired person’. (Guide – Dr. Pranab Das)
4. Heniel Kashyap, Dept. of EEE – ‘Centralised air pollution detection & monitoring’. (Guide - Gitu Das)
5. Abu Ibrahim Barbhuiya, Dept. of EEE – ‘Improvement of efficiency of solar PV assay during partial shading’. (Guide – Papul Changmai)
6. Nabajeet Sen – ‘Design of on off controller for monitoring the growth of tomatoes’. (Guide – Sarboni Das)
7. Arkinkerlang Nongdhar, Dept. of MNE – ‘ Disposable Plate making machine’. (Guide - Leena H Nemade)
8. Ferrarison D. Lynses – ‘Comparative analysis of different control schemes for OC-DC converter’. (Guide – Pushpanjalee Konwar)
9. Pritom Dutta, Dept. of MNE – ‘Mutipurpose Machine tool’. (Guide – Harajit Das)
10. Jyotishman Bordoloi, Dept. of MNE – ‘Design & Development of an intelligent braking system’. (Guide – Kamaldeep Kalita)
11. Manash Protim Bhuyan, Dept. of MNE – ‘Design & Fabrication of a green tea dryer’. (Guide – Pallav Gogoi)
12. Bishal Prasad, Dept. of MNE – ‘Design & Development of manually operated staircase climbing wheel chair’. (Guide – Tapash Jyoti Kalita)
13. Emmanuel Prince Gomes, Dept. of ECE – ‘IOT Based home security Automation System’. (Guide – Dipjyoti Sarma)
14. Udit Ranjan Kalita, Dept. of ECE – ‘Design & Centralised air pollution detection & monitoring System’. (Guide – Karen Das)
15. Sushmita Paul, Dept. of Civil Engg. – ‘Performance studies of Water hyacinth ash in construction & Water treatment’. (Guide – Dr. Girija TR)
16. Sourav Gogoi, Dept. of MNE – ‘Coupled regenerative braking & suspension system’. (Guide – Pranjal Sarma)
17. Nayan J Kakati, Dept. of MNE – ‘Manually Powered Machanized Cultivation’. (Guide – A. Sarmah)
18. Jaygick Dohutia, Dept. of MNE – ‘Design & Development of Mixed mode dryer for herbs and spices’. (Guide – Dr. Bipul Das)
19. Shreyashi Das, Dept. of ECE – ‘study of water Bodies for their impact on the Fish fauna using remote sensing’. (Guide – Dr. Bipul Das)
20. Ibadondorshisha Laistep, Dept. of Geotechnical Engg. – ‘Effect of Saw dust on the properties of soil’. (Guide – Mukul Kalita)
21. Abhijit Matak, Dept. of HSS – ‘Software development for after sales service’. (Guide - Dr. Rashmita Baruah)
22. Hirok Jyoti Sarma, Dept. of CSE – ‘Automated vertical farming’. (Guide – Dr. Uzzal Sharma)

## Workshop on Basic Plasma Physics

A two day workshop on 'Basic Plasma Physics' was organized by the Department of Physics on 19th and 20th January, 2018.



The workshop aimed at educating graduate students of North Eastern India about plasma physics and motivate them to take up plasma physics as a specialization in future. 33 graduate students from eleven institutions along with students of MSc Physics from the University participated in the workshop.

At the inaugural session, Fr. (Dr) Stephen Mavelly, the Vice Chancellor welcomed the participants and invited them to explore the university and participate in the workshop with a zeal to acquire new knowledge. Prof. K. S. Goswami, Centre Director, Centre of Plasma Physics –Institute for Plasma Research (CPP-IPR) who was the chief guest at the inaugural session said “It is estimated that 99.999% of the visible universe is in the plasma state. The Sun’s mass makes up over 99.85% of the Solar System., and since it is nearly all in the plasma state, over 99.9% of the mass of the Solar System is in the plasma state. The visible universe is 99.999% plasma. Hence the need for serious study of plasma”.

In the technical sessions of the first day i.e. 19th January 2018, Dr. N. Aomoa, ADBU, gave an introductory talk about plasma which was followed by a talk by Prof. K. S. Goswami about basic approaches to theoretical plasma research. In the afternoon session, the participants visited Centre of Plasma Physics –Institute for Plasma Research (CPP-IPR), Nazirakhat, Sonapur, and explored different laboratories and interacted with the scientist and students of the institute.

On the second day i.e. 20th January, 2018, the technical session started with a talk by Prof. H. Bailung, Institute for Advanced Studies in Science and Technology (IASST), Gauhati, on research in experimental plasma. He also gave a highlight of the research in plasma physics going on at IASST. After this, Dr. B. K. Das, Brahma Putra College, Gauhati gave a talk on Langmuir Probe followed by a lecture on Optical Emission Spectroscopy of Plasma by Dr. N. Aomoa, ADBU.

In the afternoon technical session, Dr. Bharat Kakati, Assam Science and Technology University, Gauhati, gave a presentation on the applications of plasma physics, with highlights of career prospects in taking up plasma physics in higher studies.

The workshop concluded with a valedictory function in which Fr. Biju Michael, the Registrar interacted with the participants and also distributed the certificates.

## A Talk on 'Act East Policy'

The Department of Mass Communication organised a special talk on 'Act East Policy' on 19th January 2018. The talk was delivered by veteran journalist Mr. Subir Bhaumik. Mr Bhaumik highlighted the importance of the geographical location of India's North East vis-a-vis South East Asia. He dealt in detail about the finer aspects of the policy and the challenges that it faces especially in terms of infrastructure and security.

Mr. Subir Bhaumik is associated with Myanmar's Mizzima Group. He was previously a South Asia Correspondent of BBC. The talk was attended by students and faculties of the School of Humanities and Social Sciences.

## National Workshop on Understanding Child Growth and Development

The Department of Social Work organised its first national workshop series on Understanding Child Growth and Development in Schools for school teachers on 1-2 March 2018. The workshop package aims at 'enhancing the effectiveness of a school as an institution of education through strengthening the capacity and ability of school teachers by understanding the child in the context of society, polity, economics, culture, physical, psychological, and special needs, thus making the teaching – learning process effective and child friendly within schools in relation to larger socio-cultural milieu' according to Mr. Jacob Islary, the programme coordinator.

The workshop covers the following modules: Child – Society, Polity, Economy and Culture; Child – Education and Methodology of Education; Child – Sex, Gender and Gender Roles; Child – Growth and Development: Physical, Psychological, Social, and Special Need; Child – Rights in the context of education and discipline.

Speaking on the occasion, Dr. Riju Sharma, Director SHSS, ADBU emphasised 'on the importance of understanding the child in the context of his or her location, background and orientation by teachers in the process of education.'

The first workshop was attended by the teachers of St. John Bosco School, Patgaon in Kokrajhar. The School has a wide pool of teachers from the states of Assam, Odisha, Sikkim and West Bengal. It has a strength of 368 students from class I to X, and 22 staff members. Majority of the students come from families and villages that have been victims of ethnic conflict and violence of lower Assam.



## Bhuyan Spoke at Nullcon 2018

Mr. Indrajeet Bhuyan, a student of Computer Science and Engineering and an independent researcher in cyber security addressed Nullcon 2018, held in Goa, as an invited speaker.

Nullcon is a cyber-security conference, held annually in India (either in Delhi or Goa) where internationally renowned cyber security experts share their research and concerns, as well as new developments in this area.

Indrajeet Bhuyan was the youngest and only college student to be an invited speaker.

His talk focussed on increasing the importance of security in banking system. Speaking on the significance and criticality of the security of personal details and banking transactions, he also highlighted the challenges faced by security researchers when reporting security lapses.



Earlier, he had reported a security flaw in Whatsapp by exposing the lapses in user privacy through a code of 2kb which could crash Whatsapp and potentially affect 500 million users. In August 2015, he identified a flaw in the Indian banking system affecting 20,000+ Indian banks through which an attacker can see the bank balance and transaction history of anyone. His work on banking flaw got selected in Ground Zero Summit, Asia's foremost information security conference 2015.

He had also been invited by various international security conferences like, Toorcon California, Andsec Argentina etc. and had contributed significantly towards cyber security for various organizations such as HTC, Samsung, Photobucket, Reverbnation, TVF etc. He was featured in various national and international news portals such as International Business Times, Russia today, Times of India, Digit, Kaspersky, The Independent, India Today, etc. for his work.

The 2018 Nullcon conference held on 2-3 March 2018 was inaugurated by Mr. Rajeev Chandrasekhar, Member of Parliament, Government of India. The Conference, sponsored by Google, Microsoft, Adobe, VISA, Vmware, Walmart labs etc. was attended by speakers from leading organizations such as Google, Axis Bank, Mumbai Police, Airtel, VISA, Reliance, NPCI, ISRA, CERT-IN, Flipkart and Microsoft etc.

## National Symposium on 'Recent Trends in Nanobiology'

A one day National Symposium was organized by the School of Life Sciences, Assam Don Bosco University (Tapesia Campus) on 'Recent Trends in Nanobiology' on 9th February 2018.

The symposium was conducted with an aim to provide the students of Life Sciences with a platform to attend lectures and discuss the various applications in the field of Nanoscience and Life Sciences, thus enhancing and widening their understanding.



The invited speakers who were a part of this initiative were:

- Samrat Paul, Head, Department of Energy Engineering, North-Eastern Hill University spoke on 'Application of nanomaterials in Bioenergy and Biofuel' wherein he spoke of the various way in which nanomaterials are being used and can be used to tackle the issues of biofuel production.
- Sunandan Baruah, Director, Centre of Excellence in Nanotechnology and Professor, Department of Electronics and Communication, Assam Don Bosco University enlightened the students on the topic 'Nanomaterials for Biological applications' which helped students further comprehend the wide application nanomaterials are in use in our day to day life.
- Probin Phanjom, Assistant Professor, Department of Microbiology, School of Life Sciences, Assam Don Bosco University spoke on the technical aspects on the 'Biosynthesis of Silver Nanoparticle using Fungus' in a manner that can be helpful for all to start with the process of nanoparticle synthesis.

The invited speakers not only answered queries by the participants but ensured to help the participants in their endeavours. Poster presentation was held on the theme of Nanobiology and students from various universities participated in it, showcasing various research works being carried out in this field. More than 90 students and research scholars participated in the Symposium.

## Popular Talk on Science for Conservation of Tiger and other Wildlife

On the occasion of National Science Day, 2018, the Department of Zoology organized a Popular Talk on "Science for Conservation of Tiger and other Wildlife". The resource person was Dr. M. Firoz Ahmed, Scientific Officer at Aaranyak (an NGO) and Wildlife Biologist of International repute.

Dr. Firoz shared his insight on Wildlife Research and Management in North East India. He stressed on the effects of anthropogenic activities on natural habitats which in turn have severe impact on species richness and diversity. Dr. Firoz further enlightened the participants about the ecology of *Panthera tigris* (Tiger) in Manas National Park, Assam. The lecture was followed by a brief practical session, in which he demonstrated the use of the equipments for accurate monitoring of Tiger population.

The event was held at the Crystal Hall, Tapesia Campus of the University. All the students and faculty of the Department as well as students and faculty of other Departments of the Campus attended the programme. The Department is grateful to Dr. Firoz for offering to train the students in Wildlife Conservation at Aaranyak, as part of their Summer Internship Programme.



## Workshop on Arduino and Raspberry Pi

The Department of Electrical and Electronics Engineering (EEE) organized a Workshop on Arduino and Raspberry Pi (WAR) on 10-11 Feb 2018. This is the third Edition of WAR, organized in the University.



The main objective of the workshop was to give the participants an insight of various applications of ARDUINO and RASPBERRY PI. The workshop started with inauguration of the event by the Chief Guest Prof. Durlav Hazarika of Electrical Engineering Department, Assam Engineering College.

Addressing the gathering, the HoD of Dept. of EEE, Prof. Shakuntala said that the workshop aimed at creating an environment to explore beyond the academic syllabus with the use of Arduino and Raspberry Pi, which will help the students to try different types of engineering projects. The workshop covered topics from basic theory to practical hands-on training and 15 participants were awarded certificates.

The resource persons of the Workshop were Assistant Professors of the department- Mr. Gitu Das, Mr. Jyoti Kumar Barman, Mr. Bikramjit Goswami and Ms. Pushpanjalee Konwar.

## AmazingNano 2018

Amazing Nano 2018, a one week National Workshop on Nanotechnology was organized by the Center of Excellence in Nanotechnology together with the Department of Electronics and Communication Engineering, Assam Don Bosco University from 29th January till 3rd February 2018

Apart from ADBU's own resource persons, sessions were also conducted by Prof. Gabor Louis Hornyak from Asian Institute of Technology, Thailand; Prof. Achintya N. Bezbaruah from North Dakota State University, USA; Prof. Somabrata Acharya from Indian Association for the Cultivation of Science; Dr. Hassan Mujtaba Jafri from Uppsala University, Sweden; Prof. Pranayee Datta from Gauhati University, Dr. Pabitra Nath and Dr. Shyamal Kumar Das from Tezpur University and Mr. Arup Borah from Indian Institute of Information Technology, Guwahati.

Out of the 6 days, sessions for 4 days including lab sessions were conducted in the Azara Campus of and one day each at Tezpur University and IIT Guwahati.

The workshop was organized in collaboration with Tezpur University and Indian Institute of Technology, Guwahati with financial support from STPI, Guwahati and NIELIT Guwahati.



## Kiddies' Day Camp

Through the Center of Development Studies and Initiatives of the University, the alumni of the University conducted a 5 Day Kiddies Day Camp at A. W. Thomas Girls Home for the children of 6-13 years old from 29th January to 2nd February 2018. The main aim of the camp was “to enhance the psycho-social competence of the children living in this institution”.



During these five days, a number of activities including sessions on – Body Image and Gender Sensitization by Ms. Adoreen Marbaniang, Superintendent, Green Pasture Children’s Home, Pyndengrei; Puppetry Workshop by Ms. Manribha Laloo, ICTC Counsellor, Jowai Unit, Meghalaya Aids Control Society; Body Safety Rules by Ms. Saphira Lidia Tynsong, Superintendent, William Lewis Boys’ Home, Mawphlang; Arts and Crafts by Ms. Hazel Berret Wahlang, Ms. Camilia Ryntathiang and Mrs. Ilasiewdor Marwein, District Civil Work Coordinator; and Games and Sports etc

A.W. Thomas Girls’ Home is a charity based home run by the KJP Assembly, East Khasi Hills District and it was established in the year 1981 by Wales Missionaries. The main purpose of starting this home was to support the poor and to reach out to those underprivileged children from all the districts of Meghalaya giving them shelter, food and education. The home has of 10 staff members and 38 inmates between the age of 6-17 years. It is collaborating with the Integrated Child Protection Scheme, Social Welfare for proper functioning as per the JJ Act.

## Visit to IOCL by the Department of Chemistry

The Master degree students of Chemistry paid a visit to Indian Oil Corporation Limited, Guwahati on 26th February 2018 with an aim to enhance their knowledge in the field of Quality Control procedures employed by the refinery in manufacturing petroleum products.

On arrival, a presentation on the history of the refinery, its unit processes and operations of crude oil obtained from Upper Assam oilfields and the present marketing scenario of the Indian Oil Corporation was given by the representatives.

At the Quality Control Center, students learned that there are about eight major products which are produced by this refinery including LPG (Indane), Motor Spirit (Petrol), Aviation Turbine Fuel (ATF), Superior Kerosene Oil (KO), High Speed Diesel (Diesel Oil), Light Diesel Oil (LDO), Raw Coke and Sulfur, with Naphtha and Bitumen being the minor bi-products of the refinery. The Quality Control Manager of the plant, Mr. Deka briefed them on the various Quality control techniques employed in making sure that the products manufactured meet the standard scientific and government regulations.

After this, students were shown various tests performed by the junior engineers on oil and petroleum samples including ignition point, flash point apparatus, knock number, octane number, chromatography, UV ray spectroscopy, distillation processes, carbon quantity and gamma ray spectroscopy.



The IOCL (Indian Oil Corporation Limited) Guwahati is the country’s first Public Sector refinery as well as Indian Oil’s first refinery serving the nation since January 1, 1962.

## Best Poster Presentation Award to Mechanical Engineering Students

A group of B.Tech final year students of Mechanical Engineering secured “Best Poster Presentation” position in the Poster Presentation competition at the recently concluded Research Conclave 2018 held at IIT Guwahati.

Research Conclave’18 is a prestigious research event organized by Indian Institute of Technology, Guwahati from 8-11th of March, 2018 where students from IITs, NITs, Govt./Private institutions from all the parts of India as well as abroad competed.

The title of the work for which they have been awarded is ‘Coupled Regenerative Braking and Suspension System’ which described an innovative system by the implementation of which a portion of the waste energy during braking and actuation of suspension can be harvested in the form of electrical energy. The system has a huge potential of reducing environmental pollution due to toxic gas emissions from the normal vehicles. This system will be helpful in the future design and conceptualization of different electric and hybrid vehicles in which it will help in assisting in the starting torque of the engine, during the time of cruising by cutting the fuel supply line and operating the vehicle on the regenerated energy etc. The system has the capability to generate energy from the uneven roads, speed breaker etc.



The students who presented this project were Sourav Gogoi, Johny Champramary, Debasish Kerketta, Chigam D Shira and Manoj Naidu. The research was conducted under the guidance and supervision of Pranjal Sarma, Assistant Professor of the Department of Mechanical Engineering.

## Workshop on YouTubing

The Department of Mass Communication in collaboration with city-based not for-profit organisation Brahmaputra Foundation organised a two day workshop on YouTubing from 23rd – 24th March 2018. The resource person for the workshop was Guwahati based YouTuber/actor of Social Being fame Mr. Raj Dutta. During the workshop the resource person shared various details of starting a YouTube channel, content creation, YouTube copyrights, monetizing YouTube channel among others. The workshop was attended by the 2nd semester BA mass Communication students. At the end of the two days students were awarded certificates of participation by Brahmaputra Foundation.



## Portrait Photography Workshop

A two days Portrait Photography workshop was organised by the Department of Mass Communication from 22nd -23rd March, 2018.

The workshop was organised by renowned photographer/cinematographer Mr. El Dhar, who introduced the students to studio lights and put it to use to capture portrait photographs with depth and dimension. The resource person also highlighted the techniques of image manipulation during post-production. The workshop was attended by the MA Mass Communication students.



## Workshop on Cryptocurrency and Block Chain

The Department of CSE & IT organized a workshop on Blockchain and Cryptocurrency on 3rd April 2018 at Azara Campus. The workshop covered both Financial and Technical aspects of Blockchain. Financial topics like how to get started with Bitcoin & Altcoins as well as security aspect of Cryptocurrency were covered. In technical part how to develop blockchain based Dapps and applications using smart contract etc were covered.

Speakers at this workshop were Mr. Hrishikesh Barman, A Microsoft Student Partner and CCC of Mozilla, Mr. Surajit Sarkar, Cryptocurrency Investor and Trader; and Indrajeet Bhuyan, Security Researcher and student of CSE&IT, ADBU. A total of 120 participants took part in the workshop.



## Prajjwal Day

The School of Commerce and Management (SCM) on 18th March organized Prajjwal Day at the Amphitheatre of Kharguli Campus. Prajjwal is a social outreach programme where school children in Joypur locality are given free tuition and various workshops every weekend.



The programme began with lighting of the lamp by members of Prajjwal, followed by a welcome speech by Mr. Hrishikesh, the teacher in charge of Prajjwal, and felicitated the guests Fr. (Dr.) P.D. John (Director of DBIM), Fr. Pojit, and Fr. Paulus.

Mr. Alakesh, one of the teacher in charge spoke on the history of Prajjwal and progresses made since its inception highlighting visible improvements and positive changes in the lives of the neighbourhood children year after year. The day long programme included dance performances from the Management students, group song and skit from the local children, and ended with certificate and prize distribution.

## Extension Lecture on StockMind-6

The School of Commerce and Management organized Extension Lecture 'Stock Mind-6' on 9th January 2018 for the 1st and 2nd Year batch of MBA students at Kharguli Campus.

The event aimed at creating an interest in investment in the stock market among the management students. Stock-Mind, which is in its sixth season, challenges the sharpest minds across the country by offering them a platform to learn, compete and win exciting prizes. It is a nationwide initiative that allows students to understand the nuances of stock investing in an easy, exciting and risk-free manner and has been featured as a 'Largest Competition on Stock Investments' under Business section of 2016 edition of Limca Book of Records. Ms. Smita Chakraborty, Zonal Marketing Manager-East, ICICI Securities Ltd. gave a presentation on Stock Mind Competition and explained the importance of Stock Market trading, and the opportunity of virtual trading platform that allows risk free trading with virtual money.



## RESEARCH PULSE

This quarter (January to March 2018) at ADBU was full of activities with regard to research, namely, PhD intake 2018, research proposal presentations, pre-submission seminars, viva voce examinations and award of PhD degrees.

**Ph.D. Admission 2018:** In response to our advertisement in the month of December 2017, close to 200 aspirants applied for admission to our PhD programme. Out of this, 142 candidates were interviewed and 37 candidates were selected and admitted. All these admitted research scholars have started their PhD Course Work with the Introductory Phase of it on 5th April 2018.

#### Research Proposal Presentation/Registration

This period of January to March 2018 had Research Proposal Presentations of the following research scholars. The proposals were approved, some with modifications and some without modifications for the next step of applying for registration.

Hakani D. Simli (Biotechnology), Patrick Zolawma Lawlor (Biotechnology), Rene Barbie Browne (Biochemistry), Leo Lakra (Microbiology), Suklang Kharnaor (Biotechnology), Pearlin Shabna Naziz (Biotechnology), Runima Das (Biotechnology), Nupur Choudhury (Computer Science Engineering), Yohana Marwie (Psychology and Counselling), Daisy KJ (Social Work), Parag Bhattacharya (Physics), Madhushree Sharma (Electrical and Electronics Engineering), M. Babita Devi (Electrical and Electronics Engineering), Moyurakhi Gogoi (Microbiology).

#### Pre-submission Seminar/PhD Thesis Submission

Research Scholars Viraho Abgami (North East India Studies), Nabamita Das (Language Studies), Anupa Lahkar (Mass Communications) and Kisholoy Choudhury (Mass Communications) after completing their Pre-submission seminars successfully have submitted their theses for examination.

#### Viva Voce Examination

Ms Gypsy Nandi (Computer Science Engineering), Ms Rashi Borgohain (Electronics and Communication Engineering), Ms Shalu Gupta (Computer Science Engineering), Mr Daino Basumatary (Social Work), Mr MV Johnson (Comparative Religion) and Ms Jhimli Kumari Das (Electronics and Communication Engineering) successfully completed their Viva Voce examinations during January to March 2018.

#### PhD Degree Awarded

This quarter has been most fruitful in terms of the number of PhD degree awarded to our research scholars. Eight of our research scholars, namely, Xavier Jeyaraj, Rachel Kabi, Gypsy Nandi, Rashi Borgohain, Shalu Gupta, Daino Basumatary, MV Johnson and Jhimli Kumari Das have been awarded PhD degree during this period.

#### Research Publications

- Arcadius Puwein, Shiny C. Thomas, and Laishram Indira Singha (2018). A Review on Paris Polyphylla Smith: As an Effective and Alternative Treatment of Cancer. *International Journal of Pharmaceutical Science Invention*, 7 (2):6-12
- A. Sarmah, M. Kherkatary, J. Rijal, B. Sarma, R. Paul, "Effect of triaxiality factor on failure behaviours and relative strengths of different riveted lap joints", *International Conference on Mechanical Engineering 2018*, Jadhavpur University.
- Bikramjit Goswami, and Manoranjan Kalita. "Prediction of cloudburst using passive microwave remote sensing." *ADBU Journal of Engineering Technology* 6, no. 2 (2017).
- Bibhab Kumar Das, Girija T.R & Koushik Sarkar(2018)"Bamboo as an alternative to Course Aggregate", *Journal of Civil Engineering and Environmental Technology*, p-ISSN:2349- 8404;e-ISSN:2349- 879x;Volume 5,Issue 1;January-March, 2018, pp.12-16.
- Borah, V.V., Ghosh, A., Shahbaaz, Mohd., Hassan, I. and Saikia, K.K. (2018) Omp36 mediated meropenem resistance in clinical isolates of *Klebsiella pneumoniae*. *International Journal of Current Advanced Research*, 7(2): 9954-9959.
- B. J. Rapphap and P. Das, "Review: English to Khasi Translation System," *Int. J. Comput. Appl.*, vol. 179, no. 9, pp. 975–8887, 2018.
- Darihun Sawkmie, Julene Seka H Thabah, Maitshaphrang Lyngdoh, Smriti Dey, "A Review on Stability Improvement of Wind Farm using FACTS Device", *National Exhibition and Conference on New and Renewable Energy (NECONRE-2017)*, 6-7 Oct 2017, Paper ID: NECONRE-26



- Dehingia, M., Sen, S., Bhaskar, B., Joishy, T.K., Deka, M., Talukdar, N.C. and Khan, M.R. (2017) Ethnicity influences gut metabolites and microbiota of the tribes of Assam, India. *Metabolomics*. 13: 69.
- Deba Kumar and Shakuntala Laskar "Investigation of Transformer Oil Breakdown using Optical Fiber as Sensor" *IEEE Transactions on Dielectrics and Electrical Insulation* Vol. 25, No. 1; February 2018
- Deba Kumar and Shakuntala Laskar "Water Quantity-Based Quality Measurement of Transformer Oil Using Polymer Optical Fiber as Sensor" *IEEE SENSORS JOURNAL*, VOL. 18, NO. 4, February 15, 2018
- Deibanehok Nongdhar, Raynauld Mark Pasi, and Bikramjit Goswami. "Soil Moisture determination from Passive Microwave Remote Sensed data using ANN." *ADBU Journal of Engineering Technology* 6, no. 2 (2017).
- Devi N., Bhattacharyya K. (2018) Automatic Brain Tumor Detection and Classification of Grades of Astrocytoma. In: Mandal J., Saha G., Kandar D., Maji A. (eds) *Proceedings of the International Conference on Computing and Communication Systems*. Lecture Notes in Networks and Systems, vol 24. Springer, Singapore, DOI: [https://doi.org/10.1007/978-981-10-6890-4\\_11](https://doi.org/10.1007/978-981-10-6890-4_11) , Publisher Name: Springer, Singapore, Print ISBN978-981-10-6889- Online ISBN978-981-10-6890-4, 2018.
- Dinesh Kumar Mallik, Jesif Ahmed, "Status and Potential of mini/microhydro power in Nepal: A Review", *National Exhibition & Conference on New and Renewable Energy (NECONRE-2017)*, 6-7 Oct 2017, Paper ID: NECONRE-12
- Gitu Das and Prof Durlav Hazarika, "Design and Simulation of a Hybrid Solar Street Lighting and Water Pump System", *National conference on Non-conventional Energy: Harvesting Technology and its Challenges* 17-18 Nov, 2017
- Jai Narain Vishwakarma, Shilpika Khanikar, Utpalparna Kalita, Shunan Kaping and Madhushree Saha, "Ultrasound assisted synthesis of 1-amino-3-ferrocenyl-3-oxoprop-1-enes" *Current Chemistry Letters*, 2018, 7, 27-34.
- Johny Champramary, Debasish Kerketta, Chigam D Shira, Manoj Naidu, Pranjali Sarma, 'Design and Conceptualization of a Coupled Regenerative Braking and Suspension System', *National Conference on Recent Advances in Science and Technology (NCRAS-2018)* 15-17th March, 2018, ASTU.
- J. K. Das and S. Laskar, "Determination of Protein Content of Castor Leaves Using UV- Based Sensor System," in *Advances in Systems, Control and Automation: ETAEERE-2016*, Springer Singapore, 2018, pp. 415 – 422.
- Jyoti Kumar Barman, Prof.(Dr.) Durlav Hazarika, "Controller Design for Different Converters Required for Grid Connection of 10kW Solar Power Plant", *National Conference on non-conventional Energy: Harvesting Technology and it's challenges*, 17-18 November, 2017
- Lari Kupar Lyngdoh, Jesif Ahmed, "Study of Power Flow Control in Transmission lines using FACTS Devices", *National Exhibition & Conference on New and Renewable Energy (NECONRE-2017)*, 6-7 Oct 2017, Paper ID: NECONRE-29.
- Lavita Sarmah, N. Aomoa, Trinayan Sarmah, S. Sarma, A. Srinivasan, G. Sharma, Ajay Gupta, V. R. Reddy, B. Satpati, D. N. Srivastava, S. Deka, L. M. Pandey and M. Kakati "Synthesis of finest superparamagnetic carbon-encapsulated magnetic nanoparticles by a plasma expansion method for biomedical applications", *Journal of Alloys and Compounds* 749 (2018) 768 – 775
- Mahua G. Choudhury, Suman Kumari, Kuheli B. Das, Nirmalendu Saha (2018). Lipopolysaccharide causes NFκB-mediated induction of inducible nitric oxide synthase gene and more production of nitric oxide in air-breathing catfish, *Clarias magur* (Hamilton). *Gene*. 658:18–27.

- Meghna Saikia, Saini Chakraborty, Suranjan Barman and Sarat Kr. Chettri, "Aptitude Question Paper Generator and Answer Verification System," Advances in Intelligent Systems and Computing, Springer, 2018
- Muktimani Brahma, Bikramjit Goswami, and Manoranjan Kalita. "Design of Soil Moisture Sensor for Validation of Passive Microwave Remote Sensed Soil Moisture Data." ADBU Journal of Engineering Technology, No. 2 (2017).
- Nibedita Kapil "Increasing soil organic carbon pool as a means to regulate global warming", Journal of Applied and Fundamental Sciences, 2017, 3, 2.
- Nandita Prodhani and Monmoyuri Baruah, "The galactic luminous supersoft X-ray source RXJ0925.7 – 4758/MRVel" Pramana – J. Phys (2018), 90:28
- Phanjom, P. and Ahmed, G. (2017). Effect of different physicochemical conditions on the synthesis of silver nanoparticles using fungal cell filtrate of *Aspergillus oryzae* (MTCC No. 1846) and their antibacterial effect, Adv. Nat. Sci.: Nanosci. Nanotechnol. 8:041086
- Pranjal Sarma, Sourav Gogoi, Johny Champramary, Coupled Regenerative Braking and Suspension System, Poster Presented at Research Conclave'18, IIT Guwahati, 8-11th March, 2018.
- Pranjal Sarma, P. K. Patowari, 'Alternate Soft Lithographic Approaches for Microfluidic device Fabrication Using PCM and EDM based tools, National Conference on Recent Advances in Science and Technology (NCRAS-2018) 15-17th March, 2018, ASTU.
- Pranjal Sarma, P. K. Patowari, 'Fabrication of microchannels on metal using WEDM and EDM for microfluidic applications', National Conference on Recent Advances in Science and Technology (NCRAS-2018) 15-17th March, 2018, ASTU.
- Parag Bhattacharya and Monmoyuri Baruah, "SUPERSOFT X-RAY SOURCES: A REVIEW STUDY" Journal of Applied and Fundamental Sciences, Vol. 3 No. 1 (2017)
- P. Tribedi, and S. Dey "Pre-oxidation of low-density polyethylene (LDPE) by ultraviolet light (UV) promotes enhanced degradation of LDPE in soil", Environmental Monitoring and Assessment, 189, 624 (8 pages) (2017), I.S.S.N. NUMBER (print version) – 0167 6369. I.S.S.N. NUMBER (electronic version) – 1573 2959. (Impact Factor: 1.687)
- Pushpanjalee Konwar, Jesif Ahmed, Biswajit Sengupta, Mriganka Gogoi, "A Review on Distribution Network Reconfiguration", National Exhibition & Conference on New and Renewable Energy (NECONRE-2017), 6-7 Oct 2017, Paper ID: NECONRE-21.
- Swapnali Hazarika, Smriti Dey, "Optimal operation of Distributed Network embedded to wind - Battery storage system for revenue enhancement" National Exhibition and Conference on New and Renewable Energy (NECONRE-2017), 6-7 Oct 2017, Paper ID: NECONRE-16.
- Smriti Dey, Prof (Dr.) Durlav Hazarika; "A Solution for Short Term Wind-Thermal Scheduling Problem Based on Penalty Factor Method" National Conference on Non-Conventional Energy Harvesting Technology and Its Challenges -2017
- Saurav Bharadwaj, Biswajit Sengupta, Dr. Shakuntala Laskar "Designing of a Wind Power System in Azara area of Guwahati, Assam" National Exhibition & Conference on New and Renewable Energy (NECONRE-2017), 6-7 Oct 2017 (NECONRE-2017).
- Saurav Bharadwaj Biswajit Sengupta Dr. Shakuntala Laskar "Comparative Analysis on Low Cost Horizontal Shaft Wind Rotor with Savonius and Darrieus Rotor" Non Conventional Energy: Harvesting Technology and its Challenges, held at Assam Engineering College Guwahati on 17-18th November 2017
- Saurav Bharadwaj, Biswajit Sengupta, Dr. Shakuntala Laskar "Comparative Analysis of a Proposed Design of Wind Turbine with other Commercial Turbines" All India Seminar On Energy, Power and Electrical Engineering held at the institution of Engineers (India Assam centre) on 24-25th November 2017
- Santhalembi Lisham, "Courtship, Marriage, Consent and Violence against Women in the Meitei Society: A Feminist Viewpoint" The Journal of Development Practice, Vol 3, 2017, p 40 – 45
- Saha, R. K, Debanath, M. K, Saikia, E., Borah, V.V. and Saikia, K. K. (2017). Use of tools of NLD in analysis and calibration of Cu-doped ZnO nanoparticles (NPs) for biological applications. Advanced Material Proceedings, 2(1):26-31.
- Sen, S., Dehingia, M., Talukdar, N.C. and Khan, M.R. (2017) Chemometric analysis reveals links in the formation of fragrant bio-molecules during agarwood (*Aquilaria malaccensis*) and fungal interactions. Sci. Rep. 7:44406.
- Subhrangshu Purkayastha and Bimlesh Kumar (2018) "Analytical solution of the one-dimensional contaminant transport equation in groundwater with time-varying boundary conditions" ISH Journal of Hydraulic Engineering, DOI: 10.1080/09715010.2018.1453879, p-ISSN: 0971-5010; e-ISSN: 2164-3040.
- Sur Roy, Tania., (2018), Distance education, as a supportive system for the late bloomers, dropouts and to the deprived :A conceptual view, International Journal of Applied Research, Vol- 4(2); pp 95-98, ISSN : 2394-7500
- S. Dey and P. Tribedi, "Microbial functional diversity plays an important role in the degradation of polyhydroxybutyrate (PHB) in soil", 3 Biotech, 8, 171 (8 pages) (2018), I.S.S.N. NUMBER (print version) – 2190-572X. I.S.S.N. NUMBER (electronic version) – 2190-5738. (Impact Factor: 1.361)
- Saugata Purkayastha and Hemen Bharali, "On the of Nilpotent Elements of Zn as a Ring and Z<sub>d</sub> as a Module over Zn", International Journal of Recent Scientific Research, ISSN: 0976-3031, Vol. 9, Issue, 1(F), pp. 23257-23258, January, 2018
- Shunan Kaping, Melbourne Sunn, Haishram Indira Singh and Jai Narain Vishwakarma "Regioselective synthesis of pyrazolo[1,5-a]pyrimidines containing antiprenyl group assisted by ultrasound in aqueous media and their anti-cancer and anti-inflammatory activities" (Communicated)
- Trinayan Sarmah, Ngangom Aomoa, G. Bhattacharjee, Sidananda Sarma, Biswajit Bora, D. N. Srivastava, H. Bhuyan, M. Kakati and G. De Temmerman, "Plasma expansion synthesis of tungsten nanopowder" Journal of Alloys and Compounds 725 (2017) 606 – 615
- Trinayan Sarmah, N. Aomoa, Sidananda Sarma, U. Deshpande, B. Satpati, Divesh N. Srivastava, Sanjiv Kumar, M. Kakati and G. De Temmerman "Studies on synthesis of plasma fusion relevant tungsten dust particles and measurement of their hydrogen absorption properties", Fusion Engineering and Design 127 (2018) 120–126
- Utpalparna Kalita, Shunan Kaping, Revinus Nongkynrih and Jai Narain Vishwakarma, "Design, synthesis, structure elucidation and biological activities of 3-(substituted amino)-1-(pyridine-4-yl) propenones and 5-isonicotinyl-1,2,3,4-tetrahydropyrimidine-adamantane hybrids" Monatshefte für Chemie-Chemical monthly; 2017, 148, 12, 2155-2171.



## Admissions Open

BTech|MTech|BCA|MCA|BCom|MCom|MSW|MBA  
 BSc Physics, Chemistry, Maths, Psychology  
 BA English, Mass Com, Education, Economics  
 MA English, Mass Com, Education  
 MSc Biotechnology, Biochemistry, Microbiology  
 MSc Physics, Chemistry, Zoology, Maths, Psychology

Get University Prospectus free  
 from [www.dbuniversity.ac.in](http://www.dbuniversity.ac.in)

©assamdonboscouniversity

Published by ASSAM DON BOSCO UNIVERSITY  
 Airport Road, Azara, Guwahati, Assam- 781 017 | Tapesia Gardens, Kamarkuchi, Sonapur- 782 402  
 Phones: +91 9476 690 950 / +91 9435 545 754, Fax: +91 3612 841 949  
[www.dbuniversity.ac.in](http://www.dbuniversity.ac.in) / [contact@dbuniversity.ac.in](mailto:contact@dbuniversity.ac.in)  
 Editor and Layout Designer- James Famkima

For private circulation only