

# HETC Chronicle

Hooghly Engineering & Technology College

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## e-Newsletter Committee

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Prof. Shyamal Pal

Prof. Rupam Some

## Campus News

The Orientation Programme for newly admitted 1<sup>st</sup> Year students was held on 9<sup>th</sup> August, 2016.



A half-day seminar was organized by the ED Cell of HETC, where Mr. S. K. Das of MSME, Kolkata and Mr. D. Bandyopadhyay of WEBCON delivered lectures on 10<sup>th</sup> September, 2016.

The Engineers' Day was celebrated on 15<sup>th</sup> September 2016 by the HETC Student Chapter of IE(I) through technical extempore and technical debate competition.



The annual lecture was delivered by Dr. Debashis Roy, ADG, WBHRC on the topic "Science, Mathematics and Computer", on 16<sup>th</sup> September, 2016.

Students of all the departments celebrated "Teachers' Day" by felicitating the teachers and organizing cultural programmes throughout the day.



Govt. of India sponsored 3-months training programme, "Suryamitra Skill Development Program" was inaugurated on 15<sup>th</sup> December 2016 in the august presence of Dr. S. P. Gon Chaudhuri, Sri S. Sarkar, SDO Sadar, Chinsurah and Sri G. K. Mukherjee, Chairman. HCM.



## Obituary



Prof. (Dr.) P. G. Bhattacharya, Vice President of Hooghly Engineering and Technology College Society, an eminent academician in the field of Civil Engineering with a prominent contribution as an Emeritus Professor of this college has left for his heavenly abode on 24<sup>th</sup> October, 2016 night at his residence.

Grief stricken

All the students and employees of HETC

## Admission Status 2016

An appreciable number of students, as mentioned subsequently, compared with the same in the previous years, have chosen this college for fulfilling their desire of studying in the engineering disciplines.

A total of 288 students (CE – 58, EE – 58, ME – 50, CSE – 63 and ECE/ETCE – 59) have taken admission in the 1<sup>st</sup> year and 50 students (CE – 16, EE – 8, ME – 23, CSE – 2, ECE/ETCE – 1) have taken admission in the 2<sup>nd</sup> year course of studies as Lateral Entry students.

## Departmental Academic Activities

### Civil Engineering Department

- Department of Civil Engineering took up consultancy work on Testing of Concrete Cubes of various grades for Mondal Construction Co. Ltd, Techno Waxchem Pvt Ltd, Greenwell Builders, and L.L.P.

## Seminars organized

### Computer Science & Engineering Department

- Prof. Sandeep Bhowmik delivered a lecture on the topic of “MapReduce” on 9<sup>th</sup> September, 2016.
- Prof. Shyamal Pal delivered a lecture on the topic of “Real-time Graphics” on 17<sup>th</sup> November, 2016.
- Prof. Sanghamitra Das delivered a lecture on the topic of “Digitization of Cultural Heritage” on 20<sup>th</sup> December, 2016.

### Civil Engineering Department

- Dr. Tapas Kumar Roy, Professor of the Civil Engineering Department, IEST, Shibpur, delivered a lecture on “Highway Construction Material” on 17<sup>th</sup> November, 2016.
- Prof. Arpita Chattopadhyay delivered a lecture on “Mechanical Stabilization of soil” on 18<sup>th</sup> November, 2016.
- Prof. Jayanta Bandyopadhyay delivered a lecture on “Cracks in Building” on 8<sup>th</sup> December, 2016

### Electrical Engineering Department

- Mr. Debasish Bose, Senior Technical Assistant delivered a lecture on “Protection and Safety for High Voltage Testing” on 3<sup>rd</sup> September, 2016.
- Mr. Sajal Kumar Banerjee, Senior Technical Assistant delivered a lecture on “Installation of Power Transformer” on 3<sup>rd</sup> September, 2016.
- Mr. Ranjit Majhi, Senior Technical Assistant delivered a lecture on “Fire Fighting Protection System and Fuel Handling Package in Thermal Power Plant” on 3<sup>rd</sup> September, 2016.

## **Electronics & Communication Engineering / Electronics & Tele-Communication Engineering Department**

- Prof. Subhajit Roy delivered a lecture on the topic of “Channel Assignment in Cognitive Wireless Sensor Network” on 31<sup>st</sup> August, 2016.
- Prof. Subhojit Malik delivered a lecture on the topic of “Effect of Electromagnetic Field on Human Health” on 19<sup>th</sup> November, 2016.

## **Mechanical Engineering Department**

- Mr. Uttam Kumar Samanta, Technical Assistant of Mechanical Engineering Department, delivered a lecture on “An Introduction to Ventilation System” on 8<sup>th</sup> September, 2016.
- Prof. Abhijit Dutta, Assistant Professor of Mechanical Engineering Department, delivered a lecture on “Entropy Generation in Human Lung” on 15<sup>th</sup> September, 2016
- Prof. Smitadhi Ganguly, Assistant Professor and D.I.C. of Mechanical Engineering Department, delivered a lecture on “Gyroscope” on 17<sup>th</sup> November, 2016.

## **Basic Science & Humanities Department**

- Prof. Dr. Abir Bandyopadhyay delivered a lecture on “Quantum optical vortices for quantum information theory on 29<sup>th</sup> July, 2016.
- Prof. Arup Maiti delivered a lecture on “How to save tax” on 7<sup>th</sup> September, 2016.
- Prof. Sourav Chowdhury delivered a lecture on “Windows vs Linux vs MAC” on 19<sup>th</sup> November, 2016.

## **Students' Achievements**

- Aishwarya Mukherjee, 4<sup>th</sup> year CE and Anwesha Mukherjee, 3<sup>rd</sup> year CE, jointly secured 2<sup>nd</sup> position in Extempore Competition organized by Students' chapter of IE(I) of HETC held on 15<sup>th</sup> September, 2016.
- Rupam Nandan, 4<sup>th</sup> year CE secured 3<sup>rd</sup> position in Extempore Competition organized by Students' chapter of IE(I) of HETC held on 15<sup>th</sup> September, 2016.
- Abir Baran Pal and Anwesha Mukherjee, 3<sup>rd</sup> year CE were among the winners of Technical Debate organized by Students' chapter of IE(I) of HETC held on 15<sup>th</sup> September, 2016.
- For the first time in the history of HETC, Sumit Bajaj of ECE/ETCE topped the department consecutively in all of the eight semester examinations conducted during 2012-2016.

## **Faculty Participation**

- Prof. Sandeep Bhowmik represented the College in the “Sensitization Workshop on Social Entrepreneurship Education” held on 1<sup>st</sup> December, 2016. The programme was conducted under the aegis of British Council and EDII in partnership with University of East London for helping in mainstreaming social enterprise across disciplines. It was held at Bengal National Chamber of Commerce & Industry (BNCCI House), Kolkata.
- Prof. Tanumoy Ghosh delivered a seminar on “Construction of Highway, Material of Construction, Machinery used and Manpower Requirement” on 5<sup>th</sup> November, 2016 at Technique Polytechnic Institute, Hooghly.
- Sannistha Banerjee, Asst. Prof. of EE department, attended a Short Term Course under TEQIP-II on “Emerging Trends and Challenges of Modern Power Systems (ETCMPSS2016)” from 5<sup>th</sup> to 9<sup>th</sup> July, 2016 at Department of Electrical Engineering, NIT Durgapur.
- Mr. Debasish Bose, Mr. Ranjit Majhi and Mr. Sajal Kumar Bandyopadhyay (Senior Technical assistant, EE department) and Miss Priyanka Ghosh (Technical assistant, EE Department) successfully completed a one week

training program on “Electrical Safety & Code of Practices” in NITTTR, Kolkata from 25<sup>th</sup> to 29<sup>th</sup> July, 2016. The training was conducted under the guidance of Professor P Sarkar, HOD, EE Department, NITTTR, Kolkata.

- Debolina Pradhan, Asst. Prof. of EE department, successfully completed a short term training program on “Hardware-in-Loop Simulation for Power Electronics Applications” during 1<sup>st</sup> to 5<sup>th</sup> August, 2016 at Department of Electrical Engineering, NITTTR Chandigarh.
- Prof. Jagadish Bhattacharya and Prof. Subhajit Roy of ECE/ETCE Department have successfully completed the AICTE-QIP Short Term Course entitled “Advanced Computer Architecture Prototyping” organized by Department of Computer Science & Engineering, IIT Kharagpur from 20<sup>th</sup> June, 2016 to 25<sup>th</sup> June, 2016.
- Prof. Writi Mitra and Prof. Subhojit Malik of ECE/ETCE Department have successfully completed Short Term Course on “Efficient Antennas and Guided Systems” organized by Department of Electronics and Electrical Communication Engineering Department at IIT Kharagpur from 20<sup>th</sup> June, 2016 to 2<sup>nd</sup> July, 2016.
- Prof. Abhijit Dutta attended an international workshop on “Solidification and Phase Transformation” at Jadavpur university from 26<sup>st</sup> to 27<sup>th</sup> August, 2016.
- Prof. Abhishek Mandal attended a workshop on “Advances in Joining Processes” at Jadavpur University from 22<sup>nd</sup> September, 2016 to 23<sup>rd</sup> September, 2016.
- Prof. Abhijit Dutta attended an international workshop on “Thermo-Fluids Sciences: Analysis and applications” at College of Engineering and Management, Kolaghat from 1<sup>st</sup> to 3<sup>rd</sup> October, 2016.
- Prof. Arup Maiti participated in the Photography Master Class at the title “Explore EOS: Intermediate Photography” on 24<sup>th</sup> July, 2016 organized by Canon EOS Academy, Canon India Private Limited at Kolkata.

## Faculty Achievements

- Prof. (Dr.) N. Tarafder acted as member of Benches of Monthly National Lok Adalat at Sub-Divisional Legal Services Committee, Chinsurah on 13<sup>th</sup> August and 10<sup>th</sup> September, 2016.
- Prof. Arpita Das enrolled for PhD work in NIT, Durgapur.
- Dr. Akash Roy became the Editorial Board Member of “American Journal of Nanosciences”.
- Dr. Akash Roy became the Editorial Board Member of “International Journal of Engineering, Technology, Science and Research”.
- Dr. Akash Roy became the Editorial Board Member of “International Journal of Materials, Mechanics and Manufacturing”.
- Dr. Akash Roy became the Technical Committee Member of “European Conference on Materials, Mechatronics and Manufacturing” (ECMMM 2017), to be held in Paris, France during 15<sup>th</sup> – 17<sup>th</sup> February, 2017.

## Publications of Faculty Members

### Publications in Journals

#### ❖ International Journal

#### Computer Science & Engineering Department

- Hore Sirshendu et.al “An Integrated Interactive Technique for Image Segmentation using Stack based Seeded Region Growing and Thresholding” in International Journal of Electrical and Computer Engineering (IJECE) [Scopus Index Journal, IF 0.3], published by Institute of Advanced Engineering and Science (IAES), Vol 6, No. 6, ISSN: 2088-8708.

## **Electronics & Communication Engineering / Electronics & Tele-Communication Engineering Department**

- Anindita Sinha, Mainak Nath, Nisha Sarkar, Sumit Bajaj, Prof. (Dr.) S. K. Bandyopadhyay published the paper “Face Authentication Based on Surf Features”, in “Journal of Environmental Science, Computer Science and Engineering & Technology” (JECET), e-ISSN: 2278-179X, Sec. A, Volume 5, No. 2, March 2016-May 2016, PP: 33-46.

## **Basic Science & Humanities Department**

- Anindya Banerji, Ravindra Pratap Singh, Druba Banerjee, Abir Bandyopadhyay, “Generating a perfect quantum optical vortex”, Physical Review A 94, 053838 (2016).
- Rajesh Patra, S. P. Barik and P.K.Chaudhuri, “Frictionless Contact of a Rigid Punch Indenting an Elastic Layer having Piezoelectric Properties”, Acta Mechanica, Vol. 227, No. 9, September 2016, DOI 10.1007/s00707-016-1700-8.
- Rajesh Patra, Sakti Pada Barik and Pranay Kumar Chaudhuri, “Steady State Thermoelastic Problem in an Infinite Elastic Layer Weakened by a Crack Lying in the Middle of the Layer”, International Journal of Engineering Science Invention, Vol. 5, Issue 10, October 2016, pp.21-36.

### **❖ National Journal**

## **Basic Science & Humanities Department**

- N Tarafder, “Application of Textile Materials in the Investigation of Crimes”, Man-Made Textiles in India, Vol. XLIV, June 2016, pp. 203 - 208.
- N Tarafder, “Applications of Electrically Conductive Textiles”, Journal of Current Trends in Electrical Engineering, Vol. I, Issue 2, 2016, pp. 1-9.

## **Publications in Conferences**

### **❖ International Conference**

## **Computer Science & Engineering Department**

- Chatterjee Sankhadeep and Hore Sirshendu et.al “Dengue Fever Classification using Gene Expression Data: A PSO based Artificial Neural Network Approach” in proceedings of 15th International Conference on Frontiers of Intelligent Computing: Theory and applications (FICTA ), Advances in Intelligent Systems and Computing (AISC) series, Springer, 16<sup>th</sup> - 17<sup>th</sup> September, 2016, ISBN 978-981-10-3155-7.
- Hore Sirshendu et.al “A Vulnerability Analysis Mechanism Utilizing Avalanche Attack Model for Dependency Based Systems” in Advances in Computing Applications: Select Proceedings of ICACM 2016 Springer, Springer Verlag, (Information Systems and Applications), ISBN-13: 978-981-10-2629-4, Barcode: 9789811026294, 29<sup>th</sup> November, 2016, LSN: 981-10-2629-7.
- Energy Aware Load Balancing Scheme in a Mobile Wireless Sensor Network-Rupam Some,Tuhina Samanta,Indrajit Banerjee published in 15<sup>th</sup> International Conference on Information Technology ‘2016.
- Energy Aware Cluster Head Load Balancing Scheme for Heterogeneous Wireless Ad Hoc Network-- Rupam Some,Tuhina Samanta,Indrajit Banerjee ,published in 18<sup>th</sup> International conference in distributed computing and networking (ICDCN 2017).

## ❖ National Conference

### Electrical Engineering Department

- Sannistha Banerjee, “Investigation of Guidelines for Stable Operation of Grid Connected Co-Generation Plant” Science and Technology Congress Kolkata (Presidency Division) – NITTTR, Kolkata, 13<sup>th</sup> – 14<sup>th</sup> November, 2016.

## ❖ Book Chapters

- Hore Sirshendu et.al “Analysis of Different Feature Description Algorithm in object Recognition”, pp. 66-99 in Feature Detecots and Motion Detection in Video Processing: A volume in Multimedia and Interactive Technologies (AMIT) Book Series, published in USA by IGL Global Information Science Reference, Hershey, USA 17033.
- Chakroborty Shouvik and Hore Sirshendu et.al “A Study on different edge detection techniques in Digital image processing”, pp. 100-128 in Feature Detecots and Motion Detection in Video Processing: A volume in Multimedia and Interactive Technologies (AMIT) Book Series, published in USA by IGL Global Information Science Reference, Hershey, USA 17033.

## Photo Gallery



Orientation Programme 2016



A half-day seminar on Entrepreneurship Awareness of ED Cell



The Engineers' Day celebration by IE(I) HETC Students' Chapter



The Annual Lecture 2016







Teachers' Day Celebration 2016