



Biography

kuet

Md. Saddam Hossain

Assistant Professor

Research Area Wastewater Treatment by Electrochemical Oxygen Reduction Reaction
Wastewater Treatment by Electrochemical Oxygen Reduction Reaction
Electrochemical Treatment of Industrial Wastewater,
Wastewater Treatment by Adsorption

Education

Master of Science

University of Dhaka, Dhaka-1000, Bangladesh, Bangladesh (2016-2017)

Thesis Title: [Treatment of Textile Wastewater with In-Situ Electrogenerated Reactive Oxygen Species in Aqueous Solution](#)

Bachelor of Science

University of Dhaka, Dhaka-1000, Bangladesh, (2010-2015)

Service Records

- **Assistant Professor**
Department/Section: Chemistry
Khulna University of Engineering & Technology From 01-01-1970 to 01-01-1970
- **Lecturer**
Department/Section: Chemistry
Khulna University of Engineering & Technology From 01-01-1970 to 01-01-1970

Research Interest

Wastewater Treatment by Electrochemical Oxygen Reduction Reaction

MS Thesis: Treatment of Textile Wastewater with In-Situ Electrogenerated Reactive Oxygen Species in Aqueous Solution Department of Chemistry, University of Dhaka, Supervisor: Dr. Md. Mominul Islam, Professor, Department of Chemistry, University of Dhaka, Bangladesh.

Wastewater Treatment by Electrochemical Oxygen Reduction Reaction

Undergraduate Project: Electrochemical Oxygen Reduction Reaction Assisted Catalytic Degradation of Organic Dyes in Aqueous Solutions Department of Chemistry, University of Dhaka, Supervisor: Dr. Md. Mominul Islam, Professor, Department of Chemistry, University of Dhaka, Bangladesh.

Electrochemical Treatment of Industrial Wastewater, Wastewater Treatment by Adsorption

Electrochemistry, Surface Chemistry

Publication

Books

1. (2022) , ISBN:978-0-323-85155-8, Elsevier, volA in Metal Oxides

Journals

6. Hossain, M. S. , Maniruzzaman, M. , Chowdhury, M. , Ahmed, J. U. and Yousuf, M. M. R. B. a. M. A. (2020) , " Isolation of Cerebroside from Gynura procumbens Leaves and Biological Activities of the Leaves Extracts," **Journal of Chemical Health Risks**, Islamic Azad University, vol10, no.4, pp.353-363
4. Sultana, S. , Hossain, M. S. and Islam, M. A. B. H. S. a. M. M. (2020) , " Electrosorption of Heavy Metal from Aqueous Solution on Polyaniline Modified Graphite Electrode," **BAAS**, vol32 (1&2) & 33(1):, pp.1-6
3. Hossain, M. S. , Mollah, M. Y. A. and Islam, M. A. B. H. S. a. M. M. (2020) , " Role of in situ electrogenerated reactive oxygen species towards degradation of organic dye in aqueous solution," **Elsevier**, vol344 , no.1 June 2020, pp.136146
2. Hossain, M. S. , Ahamed, P. and Yousuf, M. M. a. M. A. (2019) , " Preparation of Novel Hydrogel Composites with Enhanced Properties for Environment, Medical and Engineering Applications," **Ministry of Science and Technology Govt. of The People's Republic of Bangladesh**, vol01, no.02, pp.39-48

Conference

15. Sahed, M. A. , Hossain, M. S. , Mollah, M. Y. A. and Islam, M. A. B. H. S. a. M. M. (21-22 December, 2017.) , "Functionalization of Cellulose by Electrochemical Reduction Reaction of Molecular Oxygen," **International Seminar Camp on Tuning Thermal Properties of Materials for Smart Applications** , Material Chemistry Research Laboratory, Department of Chemistry, University of Dhaka, pp.09
14. Hossain, M. S. and Islam, M. A. B. H. S. a. M. M. (21-22 December, 2017.) , "Electrochemical Oxygen Reduction Reaction at Modified Glassy Carbon Electrode for Degradation of Organic Dye in Aqueous Solution," **International Seminar Camp on Tuning Thermal Properties of Materials for Smart Applications** , Material Chemistry Research Laboratory, Department of Chemistry, University of Dhaka, pp.04
13. Hossain, M. S. , Chowdhury, M. M. R. and Maniruzzaman, M. (7-8 February, 2020.) , "Identification of Chemical Constituents and Anti-Microbial Studies on Ethyl Acetate and Methanol Extract of Gynura Procumbens Leaves," **International Conference on Recent Advances in Chemistry (ICRAC)** , Department of Chemistry, Jagannath University, pp.138
12. Shome, S. K. , Morshed, M. H. , Hossain, M. S. and Yousuf, P. A. a. M. A. (17-19 October, 2018.) , "Volumetric and Sound Velocity Study on Ceftriaxone Sodium in Aqueous Solution of L-Alanine and Glycine at Different Temperatures," **Bangladesh Chemical Congress** , Department of Chemistry, University of Dhaka, pp.177
11. Hossain, M. S. , Mollah, M. Y. A. and Islam, M. A. B. H. S. a. M. M. (17-19 October, 2018.) , "Catalytic Degradation of Organic Dye in Aqueous Solution by Reactive Species Electrogenerated during the Electrochemical Oxygen Reduction Reaction at Manganese Dioxide Modified Glassy Carbon Electrode," **Bangladesh Chemical Congress** , Department of Chemistry, University of Dhaka, pp.92
10. Ahamed, P. , Hasan, M. M. , Hossain, M. S. and Yousuf, S. A. a. M. A. (11-12 May, 2018.) , "Effect of Zn and Cu Co-doping on Li₄Ti₅O₁₂ Anode Materials for High Power Li-ion Battery," **Conference on Weather Forecasting and Advances in Physics** , Department of Physics, Khulna University of Engineering & Technology, pp.122
9. Sahed, M. A. , Hossain, M. S. , Mollah, M. Y. A. and Islam, M. A. B. H. S. a. M. M. (24-25 February, 2018.) , "Functionalization of cellulose by electrogenerated reactive oxygen species in aqueous solution," **International Conference on Chemical Science & Technology** , Department of Chemistry, Khulna University of Engineering & Technology, pp.101
8. Hossain, M. S. , Mollah, M. Y. A. and Islam, M. A. B. H. S. a. M. M. (24-25 February, 2018.) , "Degradation of organic dye by in situ electrogenerated reactive oxygen species at manganese dioxide modified glassy carbon electrode in aqueous solution," **International Conference on Chemical Science & Technology** , Department of Chemistry, Khulna University of Engineering & Technology, pp.92
7. Hossain, M. S. , Mollah, M. Y. A. and Islam, M. A. B. H. S. a. M. M. (08-09 April, 2017.) , "Textile Wastewater Treatment with In-Situ Electrogenerated Reactive Oxygen Species in Aqueous Solution," **Conference on Material Science and Nano-Electrochemistry** , Department of Chemistry, Rajshahi University, pp.65
6. Hossain, M. S. , Mollah, M. Y. A. and Islam, M. A. B. H. S. a. M. M. (14 October, 2016.) , "Electrogeneration of Reactive Oxygen Species in Aqueous Media for Treatment of Textile Wastewater," **1st Symposium on Chemistry for Global Solidarity** , Department of Chemistry, Jagannath University, pp.17
5. Sahed, M. A. , Hossain, M. S. , Mollah, M. Y. A. and Islam, M. A. B. H. S. a. M. M. (16-19 March, 2016) , "Electrochemical Reduction of Oxygen in Aqueous Micellar Solution," **16th Asian Chemical Congress** , Bangladesh Chemical Society
4. Hossain, M. S. , Mollah, M. Y. A. and Islam, M. A. B. H. S. a. M. M. (16-19 March, 2016) , "Electrochemical Oxygen Reduction Reaction Assisted Catalytic Degradation of Organic Dyes in Aqueous Solutions," **16th Asian Chemical Congress** , Bangladesh Chemical Society, pp.150
3. Hossain, M. S. , Mollah, M. Y. A. and Islam, M. A. B. H. S. a. M. M. (26 December, 2015.) , "Electrochemical Approach for Treatment of Textile Effluents," **Textile Research Conference** , ClothingInstitute.org
2. Hossain, M. S. , Susan, M. A. B. H. , Mollah, M. Y. A. and Islam, a. M. M. (03-04 December, 2015.) , "Electrochemical Approach for Catalytic Degradation of Organic Dyes in Aqueous Solution," **2nd International Bose Conference** , Bose Centre for Advanced Study and Research in Natural Sciences, University of Dhaka, pp.61
1. Hossain, M. S. , Susan, M. A. B. H. , Mollah, M. Y. A. and Islam, a. M. M. (11 April, 2015.) , "Electrochemical Oxygen Reduction Reaction Assisted Catalytic Degradation of Organic Dyes in Aqueous Solutions," **37th Annual Conference of Bangladesh Chemical Society** , Department of Chemistry, Comilla University & Bangladesh Chemical Society, pp.57