

# International Conference on Science, Technology, Engineering, Mathematics, and Education, December 17-20, 2024, online in ZOOM.

Page link: International STEME Conference 2024 « Huston-Tillotson

# Link for schedule:

https://drive.google.com/file/d/1de73FS3oert4A0YS84Up8jYF\_2SPedgZ/view?usp=drive\_link

Welcome to the International Conference on Science, Technology, Engineering, Mathematics, and Education 2024! Let us unite in our quest for knowledge and make a lasting impact on the world. Your participation is the key to unlocking new possibilities and shaping the future of STEM education. Welcome to a journey of inspiration, innovation, and transformation! Please, encourage your students to present their research/projects, attend the sessions and participate in all the activities of this conference.

Best of all, registration is free and open to all. Don't miss out on this opportunity to connect with professionals in your field and expand your knowledge.

# **Information for presenters:**

Presentations may include any research, projects, professional development, internship/fellowship experiences related to Science, Technology, Engineering, Mathematics, Education, Data Science-ML-AI. Each 25-minute presentation will be followed by 5 minutes QnA. PDF, PowerPoint, Microsoft word or any format of presenters' preference can be used.

### Our Goal:

- This will be a great opportunity for any STEME student, faculty, researcher, non-academic professional to present their research works, projects, panel discussions on current opportunities in different STEME educational pathways and networking.
- Share experiences and ideas, so that undergraduate students can get some guidelines about higher studies, research, or career in their STEME fields.
- Presenters can showcase more than one of their research projects/professional works.

#### Mission:

Create higher education, research opportunities, or career guidelines for undergraduate students in recently developed STEME pathways.

Create professional growth opportunities for academic or non-academic professionals.

# **Event Schedule:**

# Day 1: December 17



## Farzana Hussain, Ph.D.

Professor and Chair of Mathematics Huston-Tillotson University, Austin, Texas Organizer of iSTEME Conference.

# **Opening session**

Time: 9:00am US CDT, 9pm BDT, 3PM UK time

# Rebecca "Becky" Carter

Assistant Professor of Mathematics Austin Community College

Title: Group Oral Exams in Developmental Math

Proposal Link: <a href="https://drive.google.com/file/d/1Gke9T4-PcLZeITwK5L-02rMV-z0deieE/view?usp=sharing">https://drive.google.com/file/d/1Gke9T4-PcLZeITwK5L-02rMV-z0deieE/view?usp=sharing</a>

## Pinto Bhusan Datta

Risk Analyst, Germany

Title: Financial Risk Analysis

Proposal Link:

https://drive.google.com/file/d/14iB8EVwA3MQpRVslJWNJd4UmX\_

MM5ffj/view?usp=sharing



# Kazi Mahmudur Rahman, Muhammed Sakil Hussain

Department of Physics,

Shahjalal university of Science and Technology, Bangladesh

Title: A Computational Investigation of Reverse Intersystem Crossing in Gold Centered Carbene Metal Amides

Proposal link: <a href="https://drive.google.com/file/d/102rce94Ro3LJ-uu3Iebe-4cvzcEr6Kzj/view?usp=sharing">https://drive.google.com/file/d/102rce94Ro3LJ-uu3Iebe-4cvzcEr6Kzj/view?usp=sharing</a>

Day 2: December 18



Ali Turab, Ph.D.

Northwestern Polytechnical University, China

Title: Computational Insights into Animal Behavior: Integrating Mathematical Modeling and Machine Learning

Proposal link:

https://drive.google.com/open?id=16RNeWPO7K95XPW3TbPGgVdW6tMn9om9U



#### Tirtha Chandra Das

Department of Forestry and Environmental Science, Shahjalal University of Science and Technology, Bangladesh.

Title: Effects of Chromium and Lead Stress on Growth and Metals Accumulation of Two Medicinal Species Azadirachta Indica and Terminalia Arjuna in Hydroponic System

Proposal link:

https://drive.google.com/file/d/1WTPITezHg4m14zN1FWtqI-nbYwzmTruO/view?usp=sharing



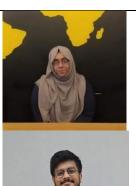
#### Mohammad Shakib-Al Rafi

Department of Physics, Shahjalal University of Science and Technology, Bangladesh

Title: Mineralogical and Elemental Studies of Rock Samples Collected from Bisnakandi of Sylhet

Proposal Link:

https://drive.google.com/file/d/1vy8rYtUzL37d3t6LeC5WWLgNrSE6Fnvm/view?usp=sharing



#### Naznin Akter Nisa

Shahjalal University of Science and Technology, Bangladesh

## Tahmid Israque Apurbo

Bangladesh Institution of Development Studies, Bangladesh

Title: Navigating the Impact of AI-Powered Automation on Youth Employment and Intellectual Property in Bangladesh: A Case Study at Shahjalal University of Science and Technology.

#### Proposal link:

https://drive.google.com/file/d/1K\_9xbwbPV6tWXPYmnou2cjjRnHT FqdqU/view?usp=sharing



**Tasin Abrar Nahin** 

Bangladesh University of Engineering and Technology

Title: ICT as a Driver of Sustainable Urban Planning in Rural Bangladesh: Current Practices and Future Pathways

Proposal Link:

https://docs.google.com/document/d/14Hsil4a\_7iSVgl5mZvVAUjiHhx IpKi9p/edit?usp=sharing&ouid=116251110979579642115&rtpof=true &sd=true





## Shajedur Rahman, Jahidur Rahman

Dhaka University of Engineering and Technology, Shahjalal University of Science and Technology, Bangladesh

Topic: Reducing Transportation and Packaging Costs with Optimized Carton Dimensions in Supply Chain Management.

Proposal link:

https://drive.google.com/file/d/114CTCSTIcD61kyZOURFQ8cAslczuBsUh/view?usp=sharing



# Shubendu Das Abir, Aishwaduty Rema

Shahjalal University of Science and Technology, Bangladesh

Title: A research paper on understanding the Caustic Section Flaking Process: Principles and Applications.

Proposal link:

https://docs.google.com/document/d/1k3AR39Gg3vUObPai49rn3sILq MBcQMyj/edit?usp=sharing&ouid=113652123254912041354&rtpof=t rue&sd=true



## Md. Rasedudjaman

Shahjalal University of Science & Technology, Bangladesh

Topic Title: Deadly AIDS: Computational Analysis of HIV Protein Sequence for Targeted Vaccine Development

Proposal link:

https://drive.google.com/file/d/1Lwnos9FpWf9ArqPG4QMJukHDUoogiyRo/view?usp=sharing



Susmita Jahan Supty et. El.

Department of Mathematics

Shahjalal University of Science and Technology, Bangladesh

Topic: "Bridging the Communication Gap Between Mute Individuals

and the Bengali-Speaking Population"

Proposal link:

https://drive.google.com/file/d/14Z126XF37hraIdSGFvQ8 LwRdb3dt

F8q/view?usp=sharing



**Debojit Basak** 

Department of Mathematics

Shahjalal University of Science and Technology, Bangladesh

Topic: Breast Cancer Diagnostics with Deep Learning: A CNN-Based Approach Using the CBIS-DDSM Dataset.

Proposal Link:

https://drive.google.com/file/d/1Eso7bbJCwJvlGsHqxX8msXpbIQQY

kVAX/view?usp=sharing





Walker Department of Mechanical Engineering University of Texas at Austin, USA

Topic: Graduate Admission



Nayef Khan

**Austin Peace Academy** 

Title: Novel way of controlling 3D Bioprinter using Raspberry pi

Proposal Link:

https://drive.google.com/file/d/1xc-

YekQ3Ix0FNa1xQJF7nCGqJt19pdeP/view?usp=sharing



## Md Saiful Islam, Md. Amirul Islam, Mst. Shapla Akter

Mawlana Bhashani Science and Technology University, Bangladesh

Title: Soliton Solutions of Nonlinear Partial Differential Equations through a novel Analytical Approach

Proposal Link:

https://drive.google.com/file/d/1 cwLlw-gGrU17Sy-

eKNDf9jSXrYuPttA/view?usp=sharing



## Md Irfan Uddin Ahmed Mehedi

Shahjalal University of Science and Technology, Bangladesh **Roki Talukdar** 

London South Bank University, UK

Title: Effect of Environmental Factors on The PV System Efficiency: A MATLAB Model for Comparative Analysis Between Geographically

Separated Places Proposal Link:

https://drive.google.com/file/d/1YdHCs9-

BVYimRC65dQsksm6AXRj7o 68/view?usp=sharing



# Shanto Babu Das and Dr. Syed Badiuzzaman Faruque

Shahjalal University of Science and Technology, Bangladesh

Title: Simple Harmonic Oscillator: Solution Using Modified Ladder

Operator

Proposal Link:

 $\underline{https://drive.google.com/file/d/1demJjIjhBBqEzJH0zKORnwuG6ppfB}$ 

8oB/view?usp=sharing

## **Ending Session**

Special Thanks to:

Nancy L. Glenn Griesinger, Ph.D. Huston-Tillotson University

And

**Professor Michael Butros** 

Director of Education - AI4OPT