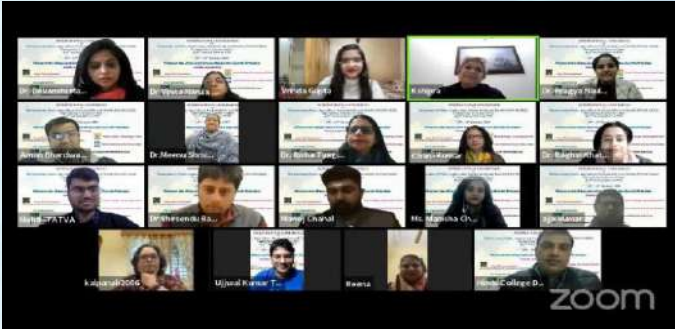




# PRAKRITI SANRAKSHAN

## Newsletter

Volume 4, Issue 1, Jan.-Mar., 2023



If you believe in our ideology and wish to step up for the environment, we welcome you to join our organisation and together we can save the environment. Visit- <https://stenvironment.org/>

Follow the link, choose the kind of membership that suits you and fill-up the form.



## ABOUT US

### Save the Environment (STE)

**SAVE THE ENVIRONMENT (STE)** is the organization that aims to spread awareness to the society about environment, health and water. It was founded and registered on 19th November 1990. STE has collaborated with various organizations in the past 33 years such as All India Institute of Hygiene & Public Health, AIIH&PH and India Canada Environment Facility, DRDO, Ministry of Defence, Department of Science and Technology (DST),

Indian Institute of Management (IIM), Ahmedabad to mitigate the effects of arsenic and provide arsenic-free drinking water.

The vision of the society is to protect present and future generations from various Environmental Hazards. The NGO has been actively organizing various interactive sessions such as conferences (National and International), workshops, seminars and awareness programs including poster competitions, quiz competitions, science exhibitions and webinars among the future generations.

### HUMBLE APPEAL FOR DONATING FUNDS FOR "THE PURULIA PROJECT FOR TOILETS AND DRINKING-CUM-WASH WATER UNITS"

Dear all,

Hope this message finds you in good health.

'Alone we can do so little; together we can do so much': these words of Helen Keller depict the resounding truth that we can make a big impact, by coming together for the larger good of the society. Save The Environment (STE), a registered society for research, awareness and social development headquartered in Kolkata, West Bengal abides by the said quote and we at STE are continually working towards building a better and healthier environment for all (Please visit for details: <https://www.stenvironment.org>)

As part of our humble social pursuit, we plan to undertake the 'Purulia Project for Toilets and Drinking-cum-Wash water units' that will benefit the needy households at Sabar Tola, Bonkanali village, Purulia, West Bengal- an economically weaker ethnic community of the state. Since long, the families residing in this area have been facing severe difficulties due to the lack of proper water supply and sanitation facilities. This is ironic and in contrast to the wake of urbanization, especially in the post-pandemic world, where green environment, clean water and proper hygiene are the absolute requirements for a healthy life. In this regard, STE requests all esteemed patrons to kindly come forward and support us in accomplishing our efforts for enabling access to basic amenities like water and sanitation for the residents of Sabar Tola. Your generous and benevolent donation will be a big help for us to accomplish our endeavour, and together we can succeed in bringing a smile to several underprivileged persons of the community.

We earnestly request your support and thank you for being with us in our efforts!

**P.S.:** Details of the proposed work are given in the pamphlet. All donations. will be covered under 80G.

Please feel free to reach us in case of any query or concern.

With humble regards,

#### Contact details:

Phone: 9871372350; 9830779260 • Email: [info@stenvironment.org](mailto:info@stenvironment.org)

Account details for donating funds:

#### ONLINE PAYMENT:

Name of the Account: **SAVE THE ENVIRONMENT**

Account Number: **38041963371**

Bank and Branch: **State Bank of India, Lake Town, Kolkata**

IFSC Code: **SBIN001506** OR GOOGLE PAY to: **Mrs. Chhanda Basu; Mobile 9830779260**

### विनम्र अपील

#### पुरुलिया परियोजना के लिए राशि दान करने की विनम्र अपील

प्रिय साथियों,

आशा है कि यह संदेश आपको अच्छे स्वास्थ्य में मिलेगा। जहाँ सोच स्वस्थ होगी, वहीं शौचालय का निर्माण होगा।

स्वास्थ्य संकट को रोकने व देश की गरिमा बनाए रखने के लिए शौचालय महत्वपूर्ण हैं। विशेषकर महिलाओं के लिए ये सुविधा अपरिहार्य है। एस.टी.ई. का यह प्रयत्न है कि सरकार की 'स्वच्छ भारत' की मुहिम में यथासंभव अपरोक्ष रूप से सहयोग कर सके। किन्तु सभी के सहयोग के बिना ये कार्य संभव नहीं। 'अकेले हम इतना कम कर सकते हैं; एक साथ हम बहुत कुछ कर सकते हैं': हेलेन केलेर के ये शब्द उस प्रबल सत्य को दर्शाते हैं कि हम समाज के बड़े अच्छे के लिए एक साथ आकर एक बड़ा प्रभाव डाल सकते हैं। पर्यावरण बचाओ (एसटीई), एक पंजीकृत सोसायटी, उक्त उद्घरण का पालन करती है और हम एसटीई के सदस्य सभी के लिए एक बेहतर और स्वस्थ वातावरण बनाने की दिशा में लगातार काम कर रहे हैं (विवरण के लिए कृपया देखें: <https://www.stenvironment.org>)

हम 'शौचालयों और पेयजल के पानी की इकाईयाँ' के लिए पुरुलिया परियोजना शुरू करने की योजना बना रहे हैं, जो सबर टोला, बोंकनाली गांव, पुरुलिया, पश्चिम बंगाल में जरूरतमंद परिवारों को लाभान्वित करेगी— जो आर्थिक रूप से कमजोर है। लंबे समय से, इस क्षेत्र में रहने वाले परिवारों को उचित जल आपूर्ति और स्वच्छता सुविधाओं की कमी के कारण गंभीर कठिनाइयों का सामना करना पड़ रहा है। इस संबंध में, एसटीई सभी सम्मानित संरक्षकों से अनुरोध करता है कि कृपया आगे आएँ और सबर टोला के निवासियों के लिए पानी और स्वच्छता जैसी बुनियादी सुविधाओं तक पहुंच को सक्षम करने के हमारे प्रयासों को पूरा करने में हमारा समर्थन करें। आपका उदार और परोपकारी दान हमारे प्रयास को पूरा करने के लिए एक बड़ी मदद होगी, और साथ में हम समुदाय के कई वंचित लोगों के लिए मुस्कान लाने में सफल हो सकते हैं। हम ईमानदारी से आपके समर्थन का अनुरोध करते हैं और हमारे प्रयासों में हमारे साथ रहने के लिए धन्यवाद! प्रस्तावित कार्य का विवरण पैम्फलेट में दिया गया है। सभी दान 80जी के तहत कवर किए जाएंगे।

कृपया किसी भी प्रश्न के मामले में हमसे बेझिझक संपर्क करें।

विनम्र अभिवादन के साथ,

टीम एसटीई

#### संपर्क विवरण:

फोन: 9871372350; 9830779260 ई-मेल: [info@stenvironment.org](mailto:info@stenvironment.org)

धनराशि दान करने के लिए खाता विवरण:

#### ऑनलाइन भुगतान:

खाते का नाम: **पर्यावरण बचाओ**

खाता संख्या: **38041963371**

बैंक और शाखा: **भारतीय स्टेट बैंक, लेक टाउन, कोलकाता**

IFSC कोड: **SBIN001506** या

GOOGLE को भुगतान करें: श्रीमती छंदा बसु; मोबाइल 9830779260

## REPORT ON THE INTERNATIONAL CONFERENCE ON ENVIRONMENT, WATER, AGRICULTURE, SUSTAINABILITY AND HEALTH (EWASH-2022): STRATEGIZING A GREENER FUTURE & 4TH ANNUAL MEET OF STE

12th - 13th January, 2023

A regular annual feature in the academic arena is the very appropriately titled International Conference EWASH-Environment, Water, Agriculture, Sustainability and

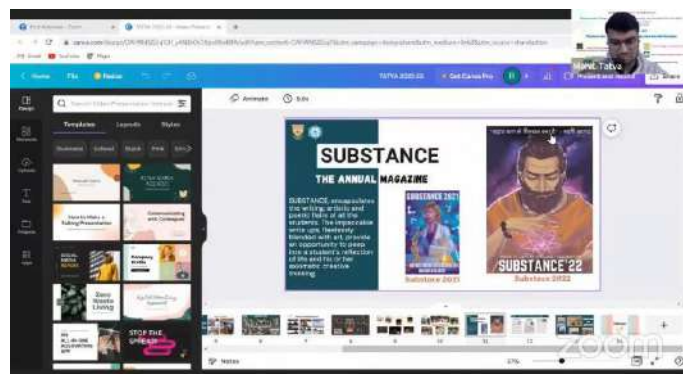
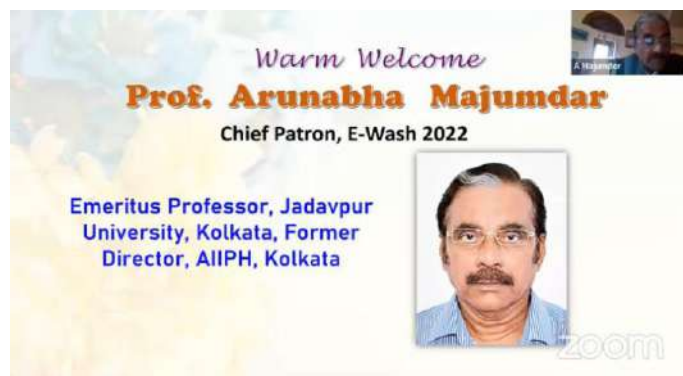
Health that was organized in the month of January 2023 by Chemistry Department of the College in collaboration with Save The Environment, Royal Society of Chemistry, North India Section and CSIR-National Environmental Engineering Research Institute. The conference this year was themed around strategizing a greener future through a productive brainstorming among environmental scientists, academicians and researchers of international repute on carefully chosen sub themes like formulation of environmental policies and implementation, geodiversity assessment and impact, environmental economics, green chemistry for sustainable future and more. The colloquium proved to be a collaborative platform for building upon research endeavors and interdisciplinary deliberations to address various challenges pertaining to climatic and environmental concerns. Few of the much-appreciated international speaker sessions were on Membrane based



Welcome address by  
**Dr. Kshipra Misra**, Convener, EWASH 2022







hybrid technology for recycling of metal ions by Dr. Ramesh Kumar, Department of Earth Resources and Environmental Engineering, Hanyang University, Republic of Korea and space radiation induced ageing and cancer risk and potential mitigation strategies by Prof. Shubhankar Suman SOM-Oncology Department, Georgetown University, Washington D.C. The event that spanned over two days in the online mode was interspersed by plenary and invited talks, poster and oral presentations, STE award ceremonies and exciting student activities. It was a huge success as it provided exposure to the speakers as well as the listeners about various aspects of environment and sustainability and was well attended by more than 350 participants from India and abroad.

STE ANNUAL AWARDS, 2022 is also distributed online which list of the award is given below:

#### STE Dr. APJ Abdul Kalam Award

**Dr. A.B. Samui**, Visiting faculty, Dept. of Genetic Engg, Polymer & Surface Engg, ICT, Mumbai and Former Project Director, Additional Director & Scientist 'G', NMRL (DRDO, Ambarnath)

#### STE Dr. Praloy O Basu

#### Lifetime Achievement Award

**Prof. Sasmita Samanta**, Vice-Chancellor of KIIT Deemed to be University, Bhubaneswar

**Ms. Sumedha Kataria**, Retired IAS officer of Haryana cadre and motivational speaker

#### STE International Achiever Award

**Prof. Sanjay Joshi**, Professor, Dept. of Industrial and Manufacturing Engineering, Penn State University, USA

**Dr. Ramesh Kumar**, Postdoctoral Research Fellow, Dept. of Earth Resources & Environmental Engg., Hanyang University, Seoul, Republic of Korea

**Dr. Krishna Sharma**, Research Fellow, School of Chemistry, University of Leeds, UK.

**Dr. Saikat Kumar Basu**, PFS, Executive Research Director, University of Lethbridge, Alberta, Canada

**Dr. Saumya Dabral**, Product Development Scientist, BASF, Netherlands

#### STE Fellowship Award

**Dr. Narendra Singh**, Additional Director & Scientist 'F', DIHAR, DRDO, Govt. of India

**Prof. Rajinder Singh Chauhan**, Dean, Centre for Life Sciences, Mahindra University, Hyderabad

**Prof. Srinivas Patnaik**, Professor, School of Biotechnology, KIIT deemed to be University Bhubaneswar

#### STE Green Excellence Award

**Prof. Shachi Shah**, Director, SOITS & Prof. in Environmental Studies, IGNOU, New Delhi

**Dr. Maulin P. Shah**, Chief Scientist & Head, Enviro Technology Ltd., Ankleshwar, Gujarat

**Dr. Vivek Verma**, Associate Professor, Dept. of Materials Science and Engineering, IIT- Kanpur

**Prof. Manoj B. Gawande**, Associate Professor, Dept. of Industrial & Engg. Chemistry, ICT- Mumbai, Jalna

**Mr. Nathaniel Bhakupar Dkhar**, Consultant (Water

Resource Management), Mu Gamma Consultants, New Delhi

### STE Meritorious Award for Excellence in Academics and Research

**Prof. Sayeed Ahmad**, Head, Dept. of Food Technology Professor of Pharmacognosy and Phytochemistry, BNPL, Jamia Hamdard Univ., Delhi

### STE Water Award

**Prof. Papita Das**, Professor, Department of Chemical Engineering, Jadavpur University, Kolkata

**Dr. MVSS Giridhar**, Professor & Head, Centre for Water Resources, IST, JNTU, Hyderabad

**Mr. Ramveer Tanwar**, 'Pond Man', Environmentalist & TedX speaker, G.NOIDA

### STE Women Excellence Award

**Dr. Neeraj Tandon**, Principal Investigator, Medicinal Plants Division, ICMR

**Mrs. Aparna Pujari**, Eco-Entrepreneur, Eila Eco Products, Dharwad

**Dr (Mrs.) M. G. Sujana**, Chief Scientist, Dept. of Environment & Sustainability, CSIR-IMMT, Bhubaneswar

**Dr. Noor Afshan Khan**, Chief Scientist, Dept. of Environment & Sustainability, CSIR-IMMT, Bhubaneswar

### STE Best Ideas/Innovations/Technology for Environment Award

**Dr. Tapan Kumar Rout**, Principal Scientist/ Head, Technology Leadership Areas, Tata Steel Ltd., Jamshedpur, India

**Prof. Suraj K. Tripathy**, Associate Dean and

Associate Professor, School of Chemical Technology, KIIT Deemed to be University, Bhubaneswar

### STE Young Researcher (Faculty) Award

**Dr. Rabea Parveen**, Assistant Professor, Dept. of Pharmaceutics, SPER, Jamia Hamdard University, Delhi

**Dr. Shirsendu Banerjee**, Assistant Professor, School of Chemical Technology, KIIT School of Biotechnology, Bhubaneswar

**Dr. Gaurav Gautam**, Assistant Professor, Dept. of Pharmacy, IIMT University, Meerut

### STE Young Researcher Award

**Mr. Sayantan Sinha**, Research Scholar, Centre for Environment, IIT Guwahati

### STE Best School Principal Award

**Sister Rose Fatima AC**, Principal, Carmel Convent High School MAMC, Durgapur

### STE Best Teacher Award

**Ms. Sumita Chakraborti**, Asst. Teacher (Bengali), Hirendra Leela Patranavis School, Kolkata

**Dr. Vaishali Mishra**, HOD, Chemistry, ITL Public School, Dwarka, New Delhi

### STE Humanitarian Award for NGO

Letters to Strangers+India

C/o Ms. Aarushi Kataria, Chief Functionary, Kurla W, Mumbai

STE is pleased to announce that the STE State chapter of Uttarakhand has been opened and is ready to start activities there. It is requested that those who want to do any programme/ seminar / conference / symposia or any other related activity under the mandate of STE are welcome to come forward and take off for the new journey of STE in the mountains.



## SAVE THE ENVIRONMENT

### UTTARAKHAND CHAPTER

Shilyakote Malla, Dhari, Nainital, Uttarakhand

Contact details:

E-mail: [steuk2020@gmail.com](mailto:steuk2020@gmail.com), Mobile: 9971851949, 9359412783

Website: [www.stenvironment.org/chapter](http://www.stenvironment.org/chapter)

**Bank details for the Donation**

Bank Name: State Bank of India

Branch Name: Muketshwar, Nainital, Uttarakhand 263138

Branch Code: 02582

Account No.: 41762330673

Name: Save The Environment

IFSC Code: SBIN0002582

## ANTHELIA

Reported By: **Vrinda Gupta**

Department of Chemistry Hindu College, the University of Delhi Under the aegis of DBT Star College Scheme in collaboration with STE (Save the Environment) conducted Anthelia: A workshop on a range of Eco-Friendly startup products for sustainable development on 11 January 2023 from 10:30 AM till 1:00 PM.

The workshop was successfully conducted under the able guidance of Dr. Vaishali Mishra And Ms. Madhupreet from ITL Public School Dwarka, Delhi. The workshop was aimed at improving critical thinking and “hands-on” experimental work and encouraging students to opt for more eco-friendly and natural products.

The workshop was initiated by an energetic presentation by Dr. Vaishali in which she not only explained about eco-friendly and chemical free products but also motivated us for having our own startups. In the hands-on session, students prepared 3 eco-friendly products in the Laboratory by hand. Firstly, students prepared chemical-free soap bars. The soap bars were devoid of toxic chemicals such as parabene, sulfates, and triclosan and

were rather made up of naturally extracted materials which made them healthier for the skin. The soaps produced completely terminate the risks of cancer, skin irritation, and dryness. Secondly, analgesic bath bombs were prepared using Baking soda, common salt, Citric acid, Corn Starch and much more.

Analgesics are drugs that eliminate or alleviate the feeling of pain that accompanies many pathologic conditions. Epsom salt plays various pharmaceutical effects in the medical field, where it affects various body organs. It plays an important role in the release of pain due to its effect on nerves and its characteristics as an anti-inflammatory and treatment of muscle cramps. Last but not the least, Floor Cleaner was prepared using Potash Alum, Rock Salt, Camphor, etc. Made a mixture of them and transferred it to a bottle after filtration. The floor cleaner prepare is free from any Toxic Chemicals and is not harmful to human health in any way.

The workshop encouraged students not just to opt for more eco-friendly products but also to have start-ups and to take each and every step possible towards an sustainable future. The students had an overwhelming experience during the workshop.



**BECOME A LIFE MEMBER OF STE BY CLICKING ON BELOW LINK**  
<https://www.stenvironment.org/national/life-time-member-ship-online>



### SAVE THE ENVIRONMENT (STE)

(A SOCIETY FOR RESEARCH, AWARENESS & SOCIAL DEVELOPMENT)

Head and Registered Office: 12, Diamond Harbour Road, Kolkata-700 063 • Mobile: 9830779260

NCR Office: Flat No. 1107, Block 17, Heritage City, MG Road, Gurugram • Mobile: 9871372350

E-mail: save1990env@yahoo.co.in; info@stenvironment.org • Website: www.stenvironment.org



## FROM HERBS TO HEALTH

Reported By: Vrinda Gupta



Department of Chemistry  
Hindu College, University  
of Delhi Under the aegis of  
DBT Star College Scheme  
in collaboration with STE  
(Save the Environment)  
Presents **From Herbs to  
Health: A workshop on  
solvent-based extraction  
protocols**. The workshop  
was successfully  
conducted under the able  
guidance of Dr. Jigni  
Mishra. The workshop

was aimed at improving critical thinking and “hands-on”  
experimental work and encouraging students to opt for  
more use of Herbs than artificial medicines. In the

workshop, Students extracted Nutraceuticals in capsule  
form.

Herbs possess a rich repository of metabolites that enable  
their adaptation under extremely harsh environmental  
conditions, such as heat stress, cold stress, low oxygen  
levels, etc. The most unique property of herb-derived  
therapeutics is that they do not exert any side effects since  
they are sourced from natural sources. The herbal source  
was crushed into fine powder form and then weighed and  
dissolved into 50% ethanol. The mixture was centrifuged  
for about 15 minutes and then concentrated with the use of  
a rotatory evaporator. After purification, the extracts can  
be formulated into NUTRACEUTICALS either in tablets  
or capsule form.

The workshop encouraged students not just to opt for more  
Herbal products than synthetic and chemically derived  
products but also a science of satisfaction on the faces of  
everyone which truly made the workshop a huge success.



## Burning Lungs of Our Planet

-Amazon Rainforest towards a die back scenario- an irreversible cycle of collapse

**Dr. Vaishali Mishra**

Editor STE

The Amazon rainforest is a vast tract of largely untamed jungle. Earth's most biodiverse region, filled with plants and trees and teeming with animals of all types and sizes-including many unknown to science.

It is also the world's largest main forest, spanning more than 2 million square miles in north South America, mainly in Brazil but also in parts of Peru, Columbia and 6 other nations.

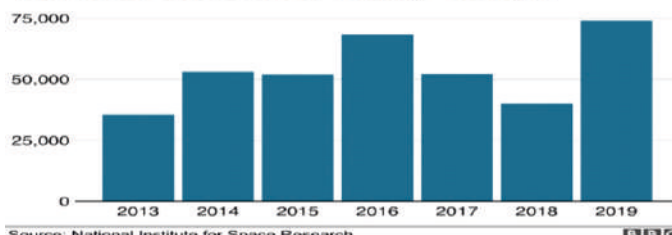
But though it has existed for 50 million years, the Amazon rain forest is now under threat from human activities, including divesting fires set to clear acreage for agriculture and ranching as well as mining of oil and gas, Cu,Fe and Au.

Every year forest fires occur in Amazon but this year 2019, the Amazon rainforest with over 9,500 distinct fires burning through its main basin since August 15, the vessel holding massive amount of world's oxygen is burning at a rate scientist have never seen before. The Brazil's National Institute for space research has recorded more than 76000 fires so far this year -an 84% increase than the previous year.

The Amazon's biggest share of the 670 million hectares of forest (60%) is home to more species than anywhere else. It is often referred to as the "Lungs of the Earth" as more than

**This year has seen more than double the number of fires in Brazil than in 2013**

Total number of fires between 1 January - 20 August



Source: National Institute for Space Research

20% of the world's oxygen is produced here. On the planet is regarded as vital -in the fight against global warming due to its ability to absorb carbon from the air. But unlike in other ecosystems, scientists say that burning in the Amazon is not natural, deforestation is the major factor. The world wildlife fund (WWF) estimates that more than a quarter of Amazon will be without trees by 2030 if the current rate of deforestation continues. The Amazon rainforest plays an important complicated role in the regional and global climate.

The trees take in rainwater through their roots move it up into the canopy and release it into the air, a process called evapotranspiration. The trees also release volatile organic compounds (VOC) that react to form large particles and these particles act as nucleation points to form clouds and lead to more rainfall. Multiply this pattern by hundreds of billions of trees in the rainforest and a powerful mechanism of recycling water and generating rainfall is created. This helps to sustain agriculture in Brazil.

But deforestation and forest fires are pushing the Amazon rainforest towards a dieback scenario. Without rainfall, vegetation will not get water and flora will weaken and these will become more vulnerable to pests and flies.





The mighty of Amazon will up and a wave will start at the periphery and propagate throughout as much of it degrades from a dense tropical forest into a savanna. This cycle will continue without our input. This is a scenario known as

forest dieback. This will eventually contribute to the Holocene extinction i.e. 6th mass extinction mainly caused by human activity.

## Landscape transformation by spectacular floral bloom

**S. K. Basu**

PFS, Lethbridge Alberta Canada

email: saikat.basu@alumni.uleth.ca

The spectacular flowering of 'Flame of the Forest (Butea monosperma, Fabaceae) commonly called 'Polash' in Bengali across the entire landscape of Purulia district (West Bengal, India). This legume tree flowers during March/April and transforms the landscape into an amazing dreamland. This monumental natural beauty of Purulia is a great tourist attraction. With hundreds and thousands of the trees in full bloom with conspicuous red colour of the flower creates a mesmerizing illusion impact of the forests and hill on fire from a distance. Three different colour

variations are seen. The most common colour is red followed by occasional yellow varieties and the white flowered are the rarest in nature. In addition to Polash, other Fabaceae family members bearing beautiful bright red flowers such as the coral tree (Erythrina variegata), gulmohor (Delonix regia), krishnachura (Caesalpinia pulcherrima), Asoka (Saraca indica), simul (Bombax ceiba) also flower at the same time. All these species of trees contribute significantly to naturally beautify the local landscape, dominated by Polash trees. The scenery is once in a lifetime opportunity to enjoy the abundant beauty of our majestic nature in its monumental colour palette. It is therefore important to conserve such unique ecosystems with unparalleled natural beauty for our next generations.

*Photo credit: Saikat Kumar Basu*



आओ हाथों से हाथ मिलाये,  
सभी मिलकर पानी बचाये

जब न होगा पीने का नीर,  
तब सब करेंगे विचार गंभीर

## National Science Day Celebration

**S. K. Basu**

PFS, Lethbridge Alberta Canada

email: saikat.basu@alumni.uleth.ca



The 2023 Science Day program has been organized by the Science Association of Bengal (SAB), the Society for Socio Economic and Ecological Development (SEED) and the Computer Society of India (CSI) at the prestigious Turiyananda Hall of the Ram Krishna Mission Institute of Culture, Golpark, Kolkata, West Bengal. A I express my sincere gratitude and thanks to the Science Association of Bengal (SAB) for honouring prominent science contributors on the Science Day Program on February 28th at the Turiyananda Hall, Ram Krishna Mission Institute of Culture, Golpark, Kolkata. The awardees include: Dr. Shankar Kumar Nath (Oncologist), Dr. Barun a kumar Dutta (Mathematician), Mr. Akul Biswas (Environmental activist from the Sunderbans), Mr. Prasanta Kumar Bose (Journalist and Science Communicator), Dr. Snehashikta Swarnakar (Cancer biologist), Dr. Raghunath Bhattacharya (Expert on plasma processing of thin films) and Mr. Saurav Chakraborty (Information Technology,

professional). A highly anticipated book on the life and work of legendary Indian scientist, Professor A K Barua was also released by the dignitaries attending the program.

Dr. Subhabrata Roy Chowdhury, Secretary, SAB delivered welcome address, the inaugural address was given by Honourable Swami Supernanda Ji Maharaj (Secretary, Ram Krishna Mission Institute of Culture) and the welcome song was sung by Dr. Shankar Kumar Nath. Several erudite lectures were delivered on the august platform. The presenters include Dr. Madhumita Dube (Former Director & Professor, All India Institute of Public Health and Hygiene), Dr. Somnath Bhattacharya (Executive Director, SEED), Mr. Devaprasanna Sinha (Former Chairman and Fellow, CSI), Mr. Anupam Boral (Managing Director, Geetanjali Solar Enterprise), Dr. Shankar Nath (Oncologist), Dr. Snehashikta Swarnakar (Cancer biologist), Dr. Parijat Chakraborty (IT professional), Dr. Aniruddha Nag (Academic and researcher Air India and CSI), Mr. Prasanta Kumar Bose and Mr. Gopi De Sarkar (Journalists), and Dr. Saikat Kumar Basu (Environmentalist).

An excellent student extempore speech contest was also included in the program, coordinated by Dr. Saikat Kumar Basu and Dr. Parijat Chakraborty). The awards and prizes were handed away by Dr. Subhabrata Roy Chowdhury (SAB), Mr. Devaprasanna Sinha (CSI), Dr. Aniruddha Nag (Air India), Dr. Parijat Chakraborty (SAB), Mr. Bimal Sengupta (SAB), Mr. Mrinal Bhattacharya (SEED), Dr. Sneha Ghosh, Dr. Saikat Kumar Basu (SAB), Ms. Sutapa Bardhan, Ms. Tilottoma Dey, Ms. Jayita Chaki and Ms. Ruma Ghosh Kathotia (ECHO).







The program was greatly successful with the central focus of the seminar being the importance of innovation and learning science with interest. The importance of science and technology in the national economic and social progress of India was discussed from various perspectives. The role of scientific and technological innovations, the history of science movements in West Bengal and India, contemporary science and Indian society, recent trends in cancer research, robotics and information technology was also discussed. The importance of ground level NGO workers and science communicators for eradication of superstitions, social prejudices and social discrimination

along with scientific education and awareness of the rural and urban communities were also discussed and debated with enthusiasm. The audience, participants and the awardees were overwhelmed by the recognition extended by Dr. Subhobroto RoyChowdhury and his team for their warm reception and recognition at this august platform. I sincerely congratulate them all to continue working with same zeal and enthusiasm and for standing by their efforts in promoting science and technology in our society.

Photo credit: Saikat Kumar Basu



## Urgent Need for Biodiversity conservation

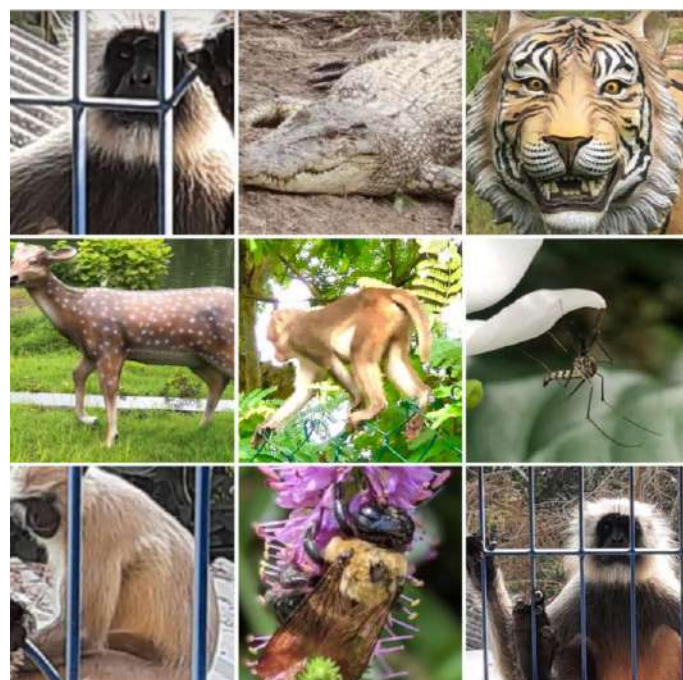
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We as humans have devastated our planet by bringing in innumerable irreversible anthropogenic changes to make our life easier. Unfortunately though our socio-economic and technological progress has only negatively impacted our nature and natural ecosystems. Pollution from our



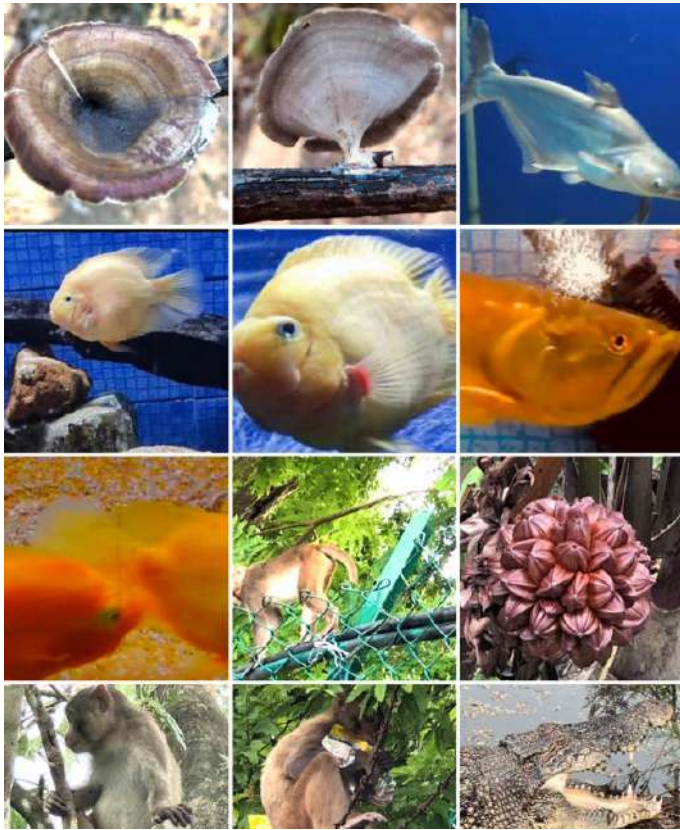
expanding agriculture and industry, forest fires, grazing in restricted wildlife areas and forests, over exploitation of major and minor forest products, illegal wildlife trade and trafficking, poaching, encroachments inside the forest belts, over exploitation of natural resources from coal, oil, gas, minerals, forests, both surface and ground water reservoirs, Climate Change, Global Warming, rise in sea levels, Green House Gases, Green House Effect, depletion of ozone layers, degradation of soil and over population of humans are some of the factors responsible for the rapid erosion of our global biodiversity.

The over exploitation of our rivers and oceans together with coastal forest belts and estuarine ecosystems are causing degradation of our aquatic biodiversity significantly without proper checks. Over exploitation of natural resources are causing destabilization of nature causing flash floods, famines, draughts, soil degradation due to loss of soil health resulting in poor soil health and low agricultural output. Soil is rich in both microflora and fauna. But the destruction of soil quality is deteriorating our soil biodiversity in the form of loss of several soil bacteria, fungi, mycoplasma, invertebrates and vertebrates and soil critters that are responsible in the maintenance of soil health and soil mega biodiversity. Thus through our own actions and ignorance we are destroying biodiversity without acknowledging or understanding the long term future impact on our over stretched planet.

Biodiversity Conservation refers to the practice of protecting our total number of species in a specific ecosystem or biogeographic area for maintaining healthy







species populations and for restoring, conserving and facilitating enrichment of the natural environment and ecosystem. Major threats to biodiversity erosion include habitat fragmentation and habitat destruction, degradation, fragmentation, overexploitation, poaching, pollution and climate change. According to IUCN approximately close to 25-27,000 global species of flora and fauna are now threatened with great risk of extinction. It has been acknowledged in both media and academic circles that we are missing species way faster than we are discovering, naming and describing new species in our planet. It is alarming to note that a significantly large numbers of our local, regional and global ecosystems containing endangered and endemic species are disappearing very fast.

We can explore few examples to better understand the conceptual aspect of global biodiversity erosion. Bees and other natural (biological) pollinators worldwide are showing a significant decline due to a number of anthropogenic factors. Bees are important natural cross pollinators and essential for the survival of global agriculture, forestry and apiculture industries. Over 85% of flowering species including several commercially important food and industrial crops as well as forest species are directly dependent on natural pollinators like bees for their pollen transfer for the purpose of reproduction and securing the future of next generation of

plants. However, excessive applications of agrochemicals such as toxic pesticides, loss of bee foraging vegetation, change in land use patterns, over consumption by humans, Climate Change, poor immunity and both biological diseases as well as Colony Collapse Disorder (CCD) are causing havoc in the death of bees worldwide. This industrial agriculture has been wiping out bee species pushing them towards extinction. Loss of bees and other pollinators means the complete annihilation of the human society.

One of the largest land mammal elephants are migratory animals; and they need to move between forests for the purpose of foraging, resting, breeding and locating other resources such as water and mud bath points for their healthy existence. Unfortunately, due to anthropogenic impacts, elephant corridors across Africa and Asia have been rapidly destroyed, disrupted, damaged and altered for making way to agriculture, industry and infrastructural developments. Unplanned growth and development in premier elephant habitats for selfish human need and greed has restricted the pachyderms in small isolated pocket habitats detrimental to both good health and genetics of this majestic mammalian species. Elephants crosses state and provincial boundaries and often international borders



for their annual migrations.

Not respecting the needs of the pachyderms has thereby increased unwanted human-elephant conflicts that are detrimental for both species resulting in death, destruction and damages. The helpless animals are being forced to enter human settlements as their traditional migratory routes are being blocked, transformed and destroyed and are then blamed for their destructive behaviours throughout their native range. To avoid such unwanted interactions, we need to respect the wildlife coordination and traditional migration routes of elephants ; and seriously need to accommodate their life style requirements within our development projects. Unmonitored and unplanned, legal and illegal economic growth will only destroy our common future. We need to act judiciously to cater to the needs of our wild coinhabitants of this planet.

In conclusion we have to say that it is important for all of us to learn to become responsible for our own action. For long we have been pretending as we do not know anything or we do not understand what we are doing towards our biodiversity erosion globally. It is necessary to generate education and awareness about our natural environment and ecosystems among the public to sensitize them about



our immediate global environmental challenges. We need to emphasize on the sustainable use of natural resources with strong political will to strictly frame and execute appropriate environmental legislations to protect our green planet. Over application of toxic pesticides and agrochemicals are destroying our nature. We need to be responsible enough to allow nature to thrive while securing our economic interests. It is important that we jointly manage our natural resources for better utilization and limiting environmental pollution. Unless we learn to work together with others on a common platform, minute changes are never going to be enough to protect our vulnerable global biodiversity. All of us need to join hands to make any difference to create a better world rich in biodiversity for our future generations.

*Photo credit: Saikat Kumar Basu*





## Environmental Philosophy from the perspective of Paradise Lost

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“Which way I fly is Hell, myself am Hell” Compare and contrast Satan’s idea of Hell in this remark to his notion of hell when he exclaimed “The mind is it’s own place and in itself/ Can make a Heaven out of Hell, a Hell of Heaven...” (Paradise Lost, Book I, lines 254-255).

In Paradise Lost, Book I, we come across the apparent heroic demeanor of Satan. In him one can trace the enticing indomitable spirit. The character of Satan was chiseled out by Milton with such an aura that seemed to be heroic and almost drew him in the stature of a tragic hero. Milton intentionally chisels the character of Satan with such a magnanimous vigour only to trace the fall of the curve from that of the brightest star to that of a beguiling serpent in Paradise Lost, Book IV.

In Paradise Lost, Book I, 'Hell' was more of a physical entity. The magnanimous and indomitable spirit of Satan stated affirmatively to reign on the throne of hell and make a heaven out of hell. He ushered that it is better to reign in Hell than to serve in Heaven. It seemed like Satan was very much in control of all his faculties and specifically his rational faculty. However in Paradise Lost, Book IV, the physical concept of hell becomes more nuanced and it enlarges it's arena to encompass the psychological aspect of it. The indomitable vigour of Satan begins to collapse

and it becomes distinctively clear as a crystal that it is Hell which is ruling Satan. Like the snake chokes its prey, Hell chokes Satan. He himself affirms, "myself am Hell" The Hell resides in him and within him. It throws the limelight on the tormented and devoured spirit of Satan, that keeps recoiling himself within himself. He is in an solipsistic state where he feels entrapped and claustrophobic. The voice of conscience pleads him to repent and seek for mercy from his benevolent father but the depth of malice and hate within him stops him from repenting and seeking grace. The injured pride and the horror of shame recoils him within himself. We get an image of an entrapped soul which cries for redemption but is too proud to amend and mend the ways to be redeemed. The oscillating mind that swings amidst the question of 'to be or not to be', throws the limelight on the fact that Satan is falling apart. His mind and heart is tormented and bruised. He is in a state of desperation, he feels guilty and feels the keen beams of remorse within himself. The very spirit of, "the mind is its own place and in itself/ Can make a Heaven of Hell, a Hell of Heaven" seems to break into minute pieces in the very first speech of Satan in Paradise Lost, Book IV. He admits and acknowledges the benevolence of God, his power, mercy and love. He also admits his disobedience at the face of the unconditional love of the benevolent. The demeanor of the apparent vigour of Satan is a coarse, unrefined piece of glass that touches the ground and cracks. He accelerates and channelizes his free will and becomes an ultimate reprobate which essentially hammers the knell on the so called magnificent sketch of Satan in Book I. The psychological Hell entraps him into a sense of egotism. It steams from his hubris and leads him towards a lane which breeds unending sufferings. It breeds an dystopian state which captures his fall from being the brightest star to the beguiling serpent. He is now the serpent who had previously choked him.

## What does INDIA mean for us ?

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We live in a country called India. But is this just a piece of land that we inhabit, a biogeographical area in the south of the continent of Asia? Is this just a nation that we are all born and grow up, work, age and die over time? Is this just a vast diverse land that has been in existence from time immemorial, that we all take for granted ? What did India meant in the past ? How do we define India at our present time or how do we see the nation grow or develop in the not

so distant future ? Else, we may also ask this enigmatic question what is India or what does India mean for you ?

We may all possibly have different feelings, visions, mixed emotions and love for the country we live in or where we were born. But actually it is important to explore the true meaning of India for us. India historically is a vast nation that historically stretches from the borders of Afghanistan to the modern day Myanmar and spreads to Sri Lanka and other island nations in the south across the Indian Ocean. The current political international boundaries of India following independence from British colonial rule on 15th of August, 1947 is still unsettled in



various parts of the country following brutal fights and disputes. The hard socio-economic and geopolitical realities of the partition of British India into India and Pakistan that lead to unimaginable human misery, violent riots, communal violence, gang rapes, looting, arsenal and loss of innocent lives marks the birth of India and Pakistan as modern sovereign states.

India, the vast biogeographic region stretches from Kashmir (north) to Kanyakumari (south) lengthwise; and from the Runn of Kutchch (west) to Kohima (east) breadthwise, is rich with her unique ethnic diversity, rich heritage and a glorious history. A land with more than 22 languages and over 540 dialects, numerous tribal communities, forest residents, bustling cities and towns, dotted with villages and hamlets; and is unimaginably diverse in ethnic, social, religious and cultural parameters. This is the only country that has been the birthplace of four world religions, namely Hinduism, Buddhism, Jainism and Sikhism. All other major religious groups such as Islam, Christianity and Judaism are also represented in varied proportion in the present Indian population. A nation that is set to become the country with the largest reported human population by 2030 overtaking China, is the seventh largest nation on this planet.

India has passed through a spectacular and glorious past with an intermingling of various races and nations across the Indian subcontinent. They include numerous Indian aboriginals and their clans, the Sakas, Huns, Kushans, Gurjars, Maurya, Guptas, Palas, Senas, Ahoms, Nagas, Kukid, Tripuri, Lepcha, Gorkha, Mongols, Greeks, Central Asians, Iranians, Afghans, Turks, Tibetans, Chinese, Burmese, Syeds, Ibrahims, Lodhis, Mughals, Pathans, Lankans, IndoChinese, Nepalais, Bhutanese, Sikkimese to mention only a handful. India is a land of

great ethnic mixture with lofty Himalayas in the north, desert and salty marshlands in the west to the great Deccan peninsula in the south and the seven sister states comprising the Indian northeast which is biologically, geographically and ethnically continuous with South East Asia. Thus, emergent India is a vast market and corridor connecting Middle East and Central Asia to South East Asia, a region that has endemics economic and geopolitical opportunities.

In spite of the pressure of a massive population, stagnant economy, lack of ample infrastructural developments, slow growth of the economy, high level of corruption, nepotism, political bankruptcy and lack of credible statesman and visionaries with poor leadership, India has emerged successfully as a global powerhouse. India is a major global market for cheaper agricultural products, pharmaceuticals, iron and steel, coal, different minerals, timber products, garments and textiles, plastics, numerous chemical industries, and other industrial products and tools. The rich natural resources of the nation has sustained and fuelled the economic growth of the country post independence along with the support and hard work of both skilled and non-skilled labourers. India is also one of the biggest workforce supplier to the entire planet by virtue of its gigantic population, educational and technical skills, advanced training as well as cheaper price for their service.

India, currently has the fourth largest army on the planet and is a nuclear powered nation; ranking among the top 10 countries across the seven continents. India has reached the status of the sixth largest global economy through her economic development and liberalization policies over the past four to five decades; and by attracting both direct and indirect foreign investments. The nation has made significant progress in the vast areas of modern education,







science and technology and engineering with special emphasis to physics, chemistry, biology, statistics, agriculture, pharmacy, biotechnology, medical sciences, space technology, computer science, electrical, electronics, marine and power engineering, information technology, journalism and mass communication; as well in various disciplines related to humanities and sociology.

Indian arts and architecture has a glorious history since the days of the Indus Valley Civilization. The monumental art works depicted in the historic sites of Ajanta, Ellora, Khajuraho, Ekeoganta, Sanchi, Puri, Agra, Lucknow, Mysore, Chennai, Bengal, Rajputana and other parts of India from north to south is an awe inspiring experience for any art critic and art lover. The country provides one of the finest examples of art, artistic superiority in designs, craftsmanship as well as ingenuity. Great names such as Ganesh Paine, Bikash Bhattacharya, Nandalal Bose, Abanindranath Tagore, Ramkinkar Baij, M. F. Husain, Wasim Kapoor to mention only a handful names. Legendary cultural icons of India Raja Rammohan Roy, Ishwarchandra Vidyasagar, Chitanyadev, Sri Ramkrishna Paramhansa, Swami Vivekananda, Netaji Subhash Chandra Bose, Mahatma Gandhi, Chittaranjan Das, Rabindranath Tagore, Satyajit Ray, Mrinal Sen, Ritwik Ghatak, Munsii Premchand, P. C. Roy, C. V. Raman, J. C. Bose, Satyen Bose, Meghnad Saha, Homi Jahangir Bhaba, J. R. D. Tata, Abhijit Binayek Sen, Amartya Sen, Mother Teresa, Bhimsen Joshi, Birju Maharaj, Kelucharan Mahapatra, Lata Mungeshkar, Bhupen Hazarika and others have made us proud as Indian citizens. But at the same time other than cricket, hockey, badminton and

kabadi, India's phenomenal failure in proving herself in various disciplines of modern sports is a monumental pain that every Indian carries in his/her back.

But truly speaking and expressing, India represents a phenomenon for not just a country, but as our cultural consciousness. This ancient land and civilizations has provided us with the knowledge of Vedas, Puranas, Upanishads, Ayurveda, Artha Shastra, Gita, Tripitaka, Jatakas, Guru Granth Sahib and other enlightened texts and scriptures to enrich our life and knowledge. India, a megabiodiverse country is not just a mixture of unique ecosystems such as mountains, coastal and estuarine areas, islands, deserts, peninsula, hot and cold deserts, open grasslands, mangroves, deciduous and coniferous forests, rich diversity of wildlife, forests and biodiversity; but a nation that stands united in spite of all her diversities and differences.



Indian democracy has crossed long perilous journey with its subsequent ups and downs and in this new millennium she has made her global presence felt across the planet. Truly, India could have reached great heights if the managing mechanism and the prestige procedures has been better managed; but, none the less...the nation has made its mark on the global platform geopolitically, socio-culturally, economically, militarily and commercially. The ancient civilization has surfaced as a modern

sovereign nation with independent foreign and economic policies and an alert global presence. India is not just an ancient civilization with billion plus population; but it has moved up from her Third World status to an aggressively developing country band and an emergent global superpower.

Photo credit: Saikat Kumar Basu

## IMPORTANT DAYS AND EVENTS

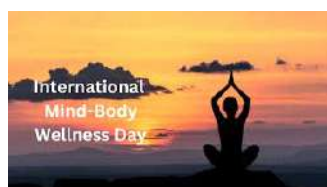
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### 3 January: International Mind Body Wellness Day



International Mind-Body Wellness Day is observed on January 3 and is a chance to recommit to appreciating both our bodies and minds by putting new development and wellness methods into

practise.

### 4 January: World Braille Day

World Braille Day is observed on January 4 in honour of Louis Braille, who invented Braille. The day also acknowledges the need for everyone to have access to human rights, including those who are blind or visually impaired.



### 5 January: National Birds Day



National Bird Day is observed on January 5 in order to increase public understanding of the importance of tiny tweeting to the ecosystem. This programme is supported by the Avian Welfare Coalition, an organisation that works hard to raise public awareness of birds who are abducted or created in captivity for either monetary benefit or for human enjoyment.

### 6 January: World Day of War Orphans

Every year on January 6, World Day of War Orphans is observed to raise awareness of the suffering of war orphans and to deal with the trauma they endure.



### 8 January: Earth's Rotations Day



Earth Rotation Day is observed annually on January 8. The French physicist Leon Foucault's 1851 demonstration that the Earth circles on its axis is commemorated today.

### 9 January: NRI (Non-Resident Indian) Day or Pravasi Bharatiya Divas

Earth Rotation Day is observed annually on January 8. The French physicist Leon Foucault's 1851 demonstration that the Earth circles on its axis is commemorated today.



### 10 January: World Hindi Day



The annual Vishwa Hindi Diwas is celebrated on January 10. To commemorate the date when Hindi was first used at the UNGA in 1949, World Hindi Day was established. Hindi is the third most widely spoken language in the world, behind Mandarin Chinese and English, with over 600 million native speakers.

### 11 January: Death anniversary of Lal Bahadur Shastri

He served as India's second prime minister after independence. He made the phrase "Jai Jawan Jai Kisan" well-known. He actively took part in India's war for independence. On January 11, 1966, he passed away from a heart arrest. He was also referred to internationally as the "Man of Peace."



### 11 January: National Human Trafficking Awareness Day



It is marked on January 11 in order to raise awareness of the ongoing problem of human trafficking. The purpose of this day is to



promote and defend the rights of victims of human trafficking as well as to increase awareness of their condition.

### 12 January: National Youth Day

Every year on January 12, Swami Vivekananda Jayanti, commonly known as his birth anniversary, is observed. He was conceived on January 12, 1863.



### 14 January: Lohri Festival



The harvest season officially begins on Lohri, the first festival of 2023. In northern India, particularly in the states of Punjab and Haryana, it is celebrated with fervour. On January 13 or 14, 2023, a bonfire will be lit to commemorate the

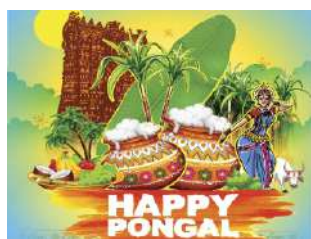
Lohri festival, and people will dance around it with friends and family. The attendees at the campfire offer corn, rice, rewri, jaggery, and wheat stem.

### 15 January: Makar Sankranti

It will be observed on January 14 this year and signifies the end of the winter season and the start of the new harvest season.



### 15 January: Pongal



Pongal, one of India's most well-known holidays, is widely observed by the Tamil population all over the world. The Tamil solar calendar places the celebration of Pongal in the Tai month.

### 23 January: Netaji Subhas Chandra Bose Jayanti

On January 23, 1897, Netaji Subhash Chandra Bose was born in Cuttack, Orissa. One of the most well-known Indian freedom warriors, he was. Azad Hind Fauj or the Indian National Army (INA) were the names of his soldiers. During World War II, he also served as the commander of an overseas Indian national force fighting the Western forces.



### 24 January: National Girl Child Day

Every year on January 24, National Girl Child Day is observed to draw attention to the disparities that the



majority of girls in India experience, the value of education, nutrition, legal rights, medical care, and girl children's safety, among other things.

### 24 January: International Day of Education

Every year on January 24, it is marked to encourage revolutionary initiatives for inclusive, equitable, and high-quality education for all.



### 25 January: National Voters Day

National Voter's Day, also known as Rashtriya Matdata Diwas, is observed annually on January 25 to inspire young people to participate in politics. This day was initially observed in 2011 to commemorate the founding of the Election Commission.

### 25 January: National Tourism Day



India observes National Tourism Day on January 25 each year to increase public awareness of the value of tourism and the contribution it makes to the country's economy.

### 26 January: Republic Day



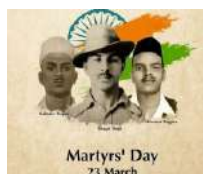
The Government of India Act of 1935 was repealed by the Indian Constituent Assembly on November 26, 1949, and the Constitution became the ultimate law of the land. On January 26, 1950, a democratic form of government was implemented. The grandest parade that was held on Rajpath in Delhi annually took place on this day.

### 28 January: Birth Anniversary of Lala Lajpat Rai

On January 28, 1865, Lala Lajpat Rai was born in Punjab. He was a well-known nationalist figure who was crucial to the independence movement in India. He also acquired the moniker "Punjab Kesari," which means "the Lion of the Punjab." He oversaw the establishment of the Punjab National Bank.



### 30 January: [Martyrs Day or Shaheed Diwas](#)



Every year on January 30th, Martyrs Day or Shaheed Diwas is observed in honour of Mahatma Gandhi and the lives lost by three Indian revolutionaries. As on January 30, 1948, the "Father of the Nation" was murdered.

### 30 January: [World Leprosy Day](#)

On the final Sunday in January, World Leprosy Day is marked to draw attention to the goal of having no children with leprosy-related disorders. As is common knowledge, disabilities develop over time as a result of a chronic illness that has gone misdiagnosed.



### 2 February: [World Wetlands Day](#)



Every year on 2nd February, World Wetlands Day is celebrated internationally. This day marks the date of the adoption of the Convention on Wetlands on 2 February 1971, in Ramsar, Iran. It was first celebrated in 1997. World Wetlands Day 2020 theme is 'Wetlands and biodiversity'.

### 2 February: [RA Awareness Day](#)

RA Awareness Day is Rheumatoid Arthritis Awareness Day and is observed on 2 February to spread awareness for patients suffering from rheumatoid arthritis.



### 4 February: [World Cancer Day](#)



Every year on 4 February World Cancer Day is observed globally and is celebrated by WHO to aware people of the disease Cancer and how to cure it. The 2020 theme is 'I Am and I Will'. According to WHO, the theme is an empowering call to action urging for personal

commitment and represents the power of individual action taken now to impact the future.

### 8 February: [Safer Internet Day](#)

It is observed on February 8th of this year. The goal of the day is to bring all interested parties together to make the internet a better and safer place for everyone, particularly for children and young people.



### 10 February: [National Deworming Day](#)



It is celebrated on February 10th. The Government of India's Ministry of Health and Family Welfare is working to ensure that no child in the nation has worms.

### 10 February: [World Pulses Day](#)

To raise awareness of the nutritional and environmental advantages of pulses as a component of sustainable food production, it is marked on February 10.



### 11 February: [International Day of Women and Girls in Science](#)



On February 11, it is recognized that women and girls have an important part in science, not only as consumers but also as innovators. The goal of the day is to enable

women and girls to participate fully and equally in science.

### 12 February: [Darwin Day](#)

Charles Darwin, the founder of evolutionary biology, was born on February 12, 1806, and every year, the date is recognised as Darwin Day. This day honours Darwin's contributions to the study of evolution and plants.



### 12 February: [National Productivity Day](#)



It is observed every year on February 12 in an effort to improve India's production culture. The National Productivity Council (NPC) observes it with a theme.

### 13 February: [World Radio Day](#)

It is observed every year on February 12 in an effort to improve India's production culture. The National Productivity Council (NPC) observes it with a theme.



### 13 February: [Sarojini Naidu Birth Anniversary](#)



Sarojini Naidu, the Indian Nightingale, was born on February 13th, and this day is recognised as her birthday. Her parents, scholar



and philosopher Aghornath Chattopadhyaya and Barada Sundari Devi, welcomed her into the world on February 13th, 1879 in Hyderabad.

#### 14 February: International Epilepsy Day

International Epilepsy Day is always commemorated on the second Monday in February; this year, it falls on February 14, the day before Valentine's Day.



#### 20 February: World Day of Social Justice



Every year on February 20, people around the world mark World Day of Social Justice to promote awareness of how social justice affects the fight against poverty.

#### 21 February: International Mother Language Day

Every year on February 21st, people all around the world commemorate International Mother Language Day to raise awareness of the diversity of languages.



#### 22 February: World Thinking Day



Every year on February 22nd, Girl Scouts and Girl Guides in 150 different nations celebrate World Thinking Day, sometimes referred to as Thinking Day.

#### 27 February: World NGO Day

The purpose of the day is to recognize, celebrate, and respect all non-profit and non-governmental organizations, as well as the individuals who work for them and make contributions to society.



#### 28 February: National Science Day



Every year on February 28th, India celebrates National Science Day to commemorate the day that Indian scientist Sir Chandrasekhara Venkata Raman discovered the Raman Effect. On February 28, 1928, he developed the Raman Effect, for which he was awarded the 1930 Nobel Prize in Physics.

#### 28 February: Rare Disease Day

The day promotes change for those who have a rare disease, their families, and the careers by increasing awareness of the condition.



#### 1st March – Zero Discrimination Day



Every year on March 1st, Zero Discrimination Day is observed around the world to ensure that everyone, regardless of age, gender, ethnicity, skin colour, height, or weight, is treated with dignity. The butterfly is the symbol of Zero Discrimination Day. To begin, the United Nations commemorated this day on March 1, 2014.

#### 1st March: World Civil Defence Day

Every year on March 1st, World Civil Defence Day is commemorated to raise public awareness about the significance of civil protection and to honour the efforts, sacrifices, and accomplishments of all services involved in disaster relief. In 1990, the International Civil Defense Organization (ICDO) decided to commemorate this day.



#### 1st March - Self Injury Awareness Day



It is observed on March 1st all across the world. Its goal is to eliminate the stigma associated with self-injury and urge parents, family members, educators, and healthcare professionals to recognize indicators of self-harm.

#### 3rd March - World Wildlife Day

On March 3rd, the world commemorates World Oceans Day, which is directly linked to Sustainable Development Goal 12: Life without Water, which focuses on marine species and highlights the concerns and important issues that marine biodiversity poses to our daily lives.



#### 3rd March - World Hearing Day



Every year on March 3rd, World Hearing Day is commemorated to raise awareness about methods to prevent deafness and promote hearing around the world.

#### 4th March - National Safety Day

The National Safety Council of India commemorates National Safety Day on March 4th. This day is observed to protect people from a variety of troubles such as financial loss, health problems, and other problems that they may encounter in their daily lives.



#### 4th March - Ramakrishna Jayanti



Ramakrishna was born on Dwitiya in the month of Phalguna during Shukla Paksha, according to the Hindu lunar calendar. Every year on his birthday, all Ramakrishna Maths

commemorate his birth. It will be observed on March 4th this year. "The entire purpose of human birth is to acknowledge God," he claims.

#### 8 March - International Women's Day

Every year on March 8th, the world celebrates the social, economic, cultural, and political achievements of women. It's also a step toward achieving gender parity. Purple is a colour that is associated with women all across the world. Theme of International Women's Day 2023 is "Digit ALL: Innovation and technology for gender equality"



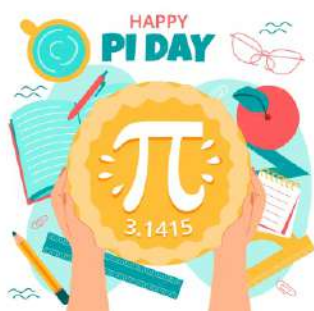
#### 9 March: No Smoking Day (Second Wednesday of March)



Every year on the second Wednesday in March, No Smoking Day is marked to raise awareness about the adverse health effects of tobacco use and to encourage people all over the world to quit smoking. It falls on March 9 this year.

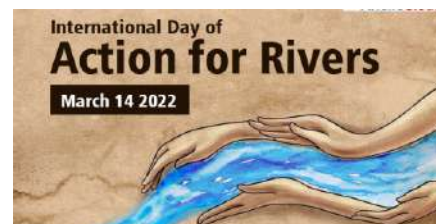
#### 14 March: Pi Day

Pi Day is celebrated all across the world on March 14th. Pi is a mathematical constant represented by a symbol.



#### 14 March: International Day of Action for Rivers

The International Day of Action for Rivers is observed every year on March 14th to raise awareness about river protection and demand better river policies. It's a day to raise awareness about the threats to our rivers and come up with solutions together.



#### 15 March: World Consumer Rights Day



It is commemorated every year on March 15th to increase global awareness about consumer rights and concerns. This day is a chance to demand that all consumer rights be acknowledged and protected, as well as to protest societal injustices.

#### 16 March: National Vaccination Day

Every year on March 16, India celebrates National Vaccination Day, also known as National Immunization Day (IMD). When the first dose of Oral Polio Vaccine was delivered on March 16,



1995, it was the first time it was noticed. It is an attempt to raise awareness about the need to eradicate polio from the Earth.

#### 20 March: World Sparrow Day



On March 20th, the world commemorates World Sparrow Day to raise awareness about sparrow conservation. This day also honours the human-sparrow bond, encouraging people to love sparrows and recognize their value in our lives.

#### 20 March: World Oral Health Day

World Oral Health Day is marked on March 20th to raise awareness about oral health. The topic of World Oral Health Day 2023 is "Be Proud Of Your Mouth." To put it another way, you should cherish it and take care of it.





### 21 March - World Forestry Day



Every year on March 21st, World Forestry Day or International Day of Forests is commemorated to raise public awareness about the importance, value, and contributions of

forests in balancing the earth's life cycle. World Forestry Day was created in 1971 during the European Confederation of Agriculture's 23rd General Assembly.

### 21 March: World Down Syndrome Day

Every year on March 21st, World Down Syndrome Day is commemorated. Down syndrome is a chromosomal arrangement that occurs spontaneously in humans and has varying implications on learning methods, physical traits, and health. In December 2011, the United Nations General Assembly proclaimed March 21st as World Down Syndrome Day.



### 21 March: World Poetry Day



Every year on March 21st, World Poetry Day is observed to honour poetry's unique capacity to capture the creative spirit of the human mind. The decision to commemorate this day on March 21st was made at UNESCO's 30th session in Paris in 1999.

### 22 March: World Water Day

Every year on March 22nd, World Water Day is commemorated to raise awareness about the importance of freshwater and to advocate for its sustainable management. It was suggested that the United Nations Conference on Environment and Development (UNCED) in Rio de Janeiro celebrate it in



1992. The inaugural World Water Day is commemorated in 1993. Theme of the 2023 World Water Day and the World Toilet Day campaign, of the same year will be "Accelerating Change."

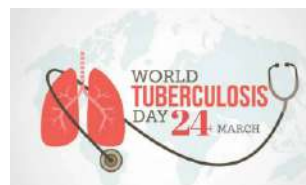
### 23rd March: World Meteorological Day



Every year on March 23rd, World Meteorological Day is commemorated to draw attention to the importance of weather and climate to society's safety and well-being.

### 24 March: World Tuberculosis (TB) Day

World TB Day is celebrated every year on 24 March annually to commemorate the date when Dr. Robert Koch announced his discovery of Mycobacterium tuberculosis, the bacillus that causes TB in 1882. This Day is observed to educate people about TB, its impact around the world.



### 26 March: Purple Day of Epilepsy



It's celebrated on March 26th to raise awareness about epilepsy and its effects on people's lives. The day also serves as a reminder to epilepsy sufferers that they are not alone.





# SAVE THE ENVIRONMENT

## A Society for Research Awareness and Social Development

### Report of International Women's Day 8th March, 2023 Winner of STE Prerana Samman

Date: 12th March, 2023

Time: 10:00 am – 1:00 pm

Platform: Google Meet

Convener: Dr. Kshipra Misra, President STE, Former Additional Director, DIPAS, DRDO

Co-Convener: Dr. Chhanda Basu, General Secretary, STE

Organizing Secretaries: Dr. Angelina Titus, Pharm D Intern, STE Life - Member

Dr. Jigni Mishra, Project Associate, IARI & E.C. Member, STE

#### STE PRERANA SAMMAN 2023 RECIPIENTS:

- **Dr Jyoti Sharma:** Scientist F & Director, Department of Science & Technology, Government of India
- **Ms. Deepasree Das Sarkar:** Associate Professor & HoD, Department of English, Margherita College, Assam
- **Dr Barnali Ghatak:** Founder & Managing Director, SBH Electrocloud Pvt Ltd, Kolkata

The event started at 10:00 am with a warm and cordial welcome note by Angelina Titus, Organizing Secretary, followed by a video montage of Save the Environment and its activities. This year's theme for International Women's

Day was "Embrace Equity" & DigitALL "Innovation and Technology for Gender Equality". Dr Kshipra Misra, President, STE gave the keynote address to all present for the event and shared her opinion on role of women in different fields.

First Prerana Samman awardee, Dr Jyoti Sharma was introduced and awarded for her contribution towards women in the field of science and technology. Dr Jyoti inspired the audience regarding her journey after graduation till date experience in science and technology. Mam keeps on motivating and mentoring young women in the field of science and technology.

Second Prerana Samman awardee, Mrs Deepasree Das Sarkar was introduced to the audience pertaining to her major role towards educating and empowering Girl Child in 18 different tribes of Assam. Mrs Sarkar shared her experience on how she played a significant role in lives of thousands of girls on educating them about menstrual hygiene, domestic violence and legal issues, making biodegradable cotton sanitary napkins and much more. Third Prerana Samman awardee, Dr Barnali Ghatak was introduced and awarded for her contribution towards society in fields of science and technology. Dr Ghatak spoke about her accomplishments which benefitted the farmers of India, electrical workers and much more.



Dr. Jyoti Sharma



Dr. Deepasree Das Sarkar



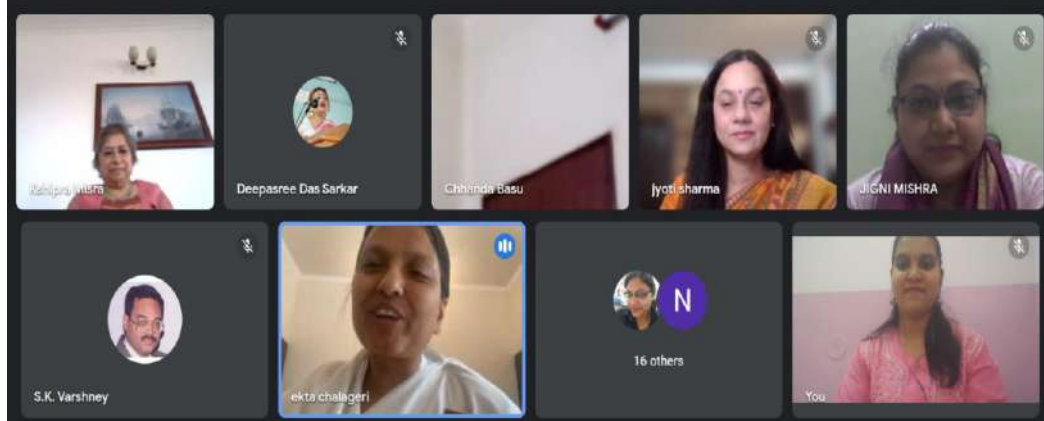
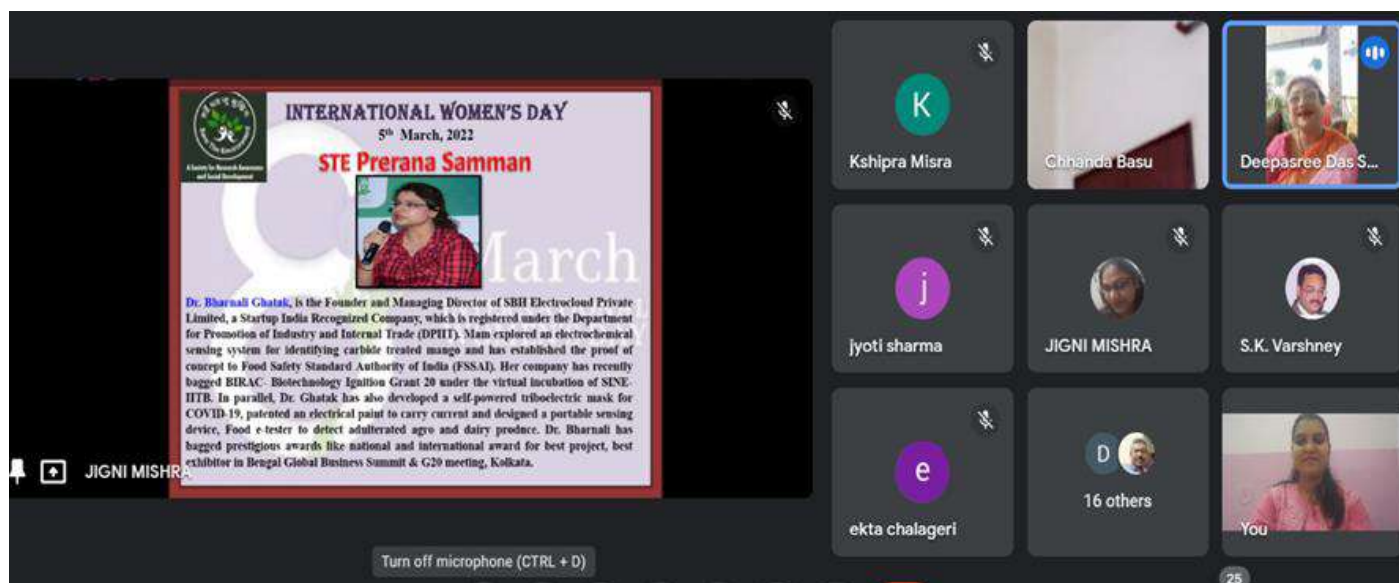
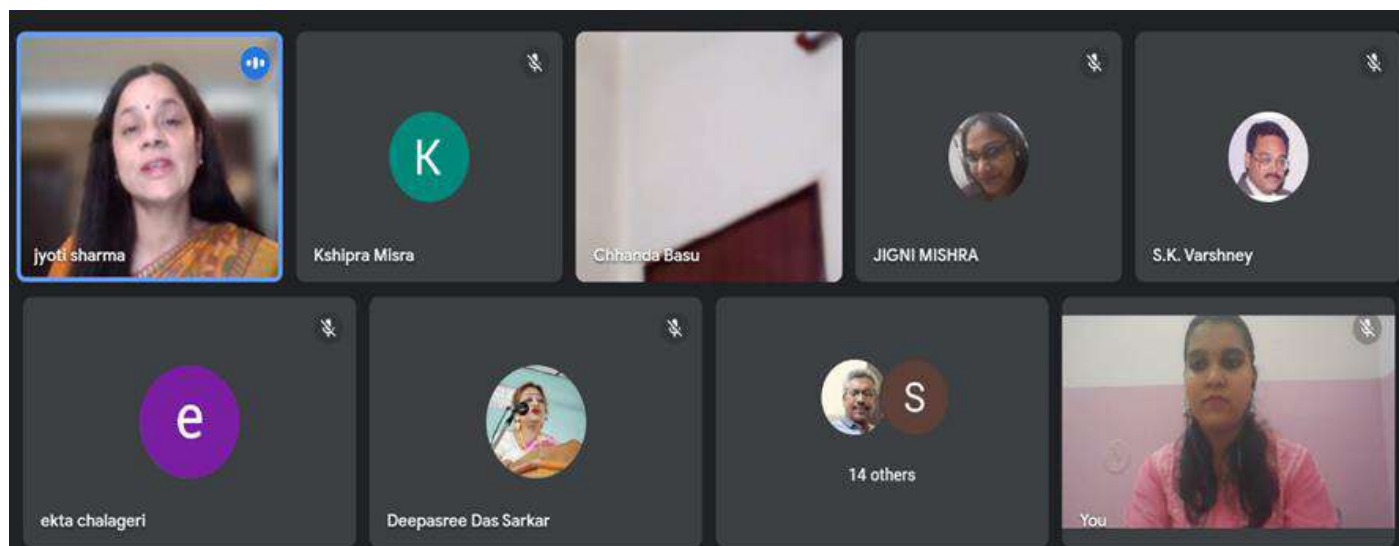
Dr. Barnali Ghatak



A motivational talk by Brahmakumari Ekta Chalgeri was also arranged. Ekta mam motivated us on how to appreciate the small things and bring in positivity in everything. She even encouraged us to participate in an activity and meditate.

The Session ended with inspiring words and vote of thanks by Dr Jigni Mishra, Organizing Secretary.

#### GLIMPSES FROM THE EVENT:





## From the Editor's Desk

Dear Readers

I would like to welcome you to **Volume 4, Issue 1** of the PRAKRITI SANRAKSHAN quarterly newsletter of STE. **January – March 2023** issue highlights International Conference on Environment, Water, Agriculture, Sustainability And Health (EWASH-2022): Strategizing A Greener Future & 4th Annual Meet of STE () 12th - 13th January 2023); National Science Day Celebration (28th February) and International Women's Day (8th March 2023).

The important days observed from January to March 2023 have been also included in this issue. This issue also contains articles based on environmental issues.

I express my sincere thanks to all the people who have contributed informative and inspirational articles to make this newsletter successful.

I would like to express my profound gratitude to the President of STE Dr. Kshipra Misra, the editorial team and Mr. Gian Kashyap for designing this issue of **PRAKRITI SANRAKSHAN** and giving it the desired shape.

**Dr. Vaishali Mishra**

Editor STE

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We are pleased to announce that the DOI prefix for International Journal of Environment and Health Sciences is now available from Crossref, the official Digital Object Identifier (DOI). **The journal is now indexed in International Scientific Indexing (ISI).**



For further details, please contact  
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or

visit our website:

**www.stenvironment.org**

# ONLINE CERTIFICATE COURSE ON ENVIRONMENT AWARENESS



## COURSE DETAILS

**Course name:** Certificate in Environment Education & Awareness (CEEA)

**Course no:** EEA-01-2023

**Organization:** Hindu College & Save the Environment (STE)

**Course fee:** Rs. 2,500/-

**Class format:** Online

**Course duration:** 6 weeks

**Number of lectures:** 12

**Days of classes:** Weekends (Saturdays & Sundays)

**Class timing:** 5-7 pm

**Class duration:** Approximately 1.5-2 hours (online).

A one-hour lecture by the teacher(s) followed by 15-20 mins of question/answer sessions and discussion with students/participants.

**Language:** English

### Instructions to join the Course:

After reading the information carefully, please fill out the registration form. The link is given below.

<https://forms.gle/zWtsvat8Zq8jVwDz7>

The last date to receive the registration form is the **15<sup>th</sup> of June 2023, at 11:59 PM.**

The course will begin on the **1<sup>st</sup> of July 2023, at 5:00 PM.**

CELEBRATING  
**125**  
YEARS  
*Steered by the Past,  
Moulding the Future*

**HCU**  
**HINDU**  
COLLEGE, DELHI







## STE Annual Awards 2023

**(NOMINATION AND APPLICATIONS ARE INVITED)**

**LAST DATE 31st July, 2023**

Annual Awards of STE are the tangible symbol to signify eminence of contributions made by a person or institution. This boosts the enthusiasm of the contributors who have contributed in different fields of science and social service with their excellence, expertise and approach towards achieving certain goals for the society. Recognition of such extraordinary activities is eventually very important to boost their confidence and to honour them for what they have done for the science and society. STE confers following categories of awards and honours to such eminent personalities.:

**STE Dr. APJ Abdul Kalam Award**

**STE Dr. Praloy O Basu Life Time Achievement Award**

**STE International Achiever Award**

**STE Fellowship Award**

**STE Green Excellence Award**

**STE Meritorious Award For Excellence in Academics and Research**

**STE Water Award**

**STE Women Excellence Award**

**STE Best Ideas/Innovations/Technology for Environment Award**

**STE Young Researcher (Faculty) Award**

**STE Young Researcher Award**

**STE Best School Principal Award**

**STE Best Teacher Award**

**STE Humanitarian Award for NGOs**

**For more information, please log on to our website  
[www.stenvironment.org/ste-awards/](http://www.stenvironment.org/ste-awards/)**



If you believe in our ideology and wish to step up for the environment, we welcome you to join our organisation and together we can save the environment.

**Visit- <https://stenvironment.org/>**

Follow the link, choose the kind of membership that suits you and fill-up the form.



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