



IIPE MANUFACTURING NEWS

Editor-in-chief
Dr. K. Gopalakrishnan

Monthly Newsletter of the Indian Institution of Production Engineers

Editor: **Dr. M. S. Ganesh Prasad**, Principal, Sai Vidya Institute of Technology, Bangalore

Prof. R. M. Vasagam, National Chairman, IIPE

Dr. Wooday P Krishna, National President, IIPE

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July 2024

IIPE National Secretary has interacted on R&D Collaborations with VC - CUK, Director, NIT Srinagar & Registrar, University of Kashmir

Dr. K. Gopalakrishnan, National Secretary, IIPE and Secretary General, ITCA with **Dr. Naseer Iqbal**, Registrar, University of Kashmir (Estd in 1938) is Explored the Collaboration for building "**Kashmir Satellite**" as a part of 75 Students' Satellites Consortium Mission and with Cambridge Institute of Technology! **Ms. Inbisat Yousuf Nath**, Indian Students' Representative of UNISEC India from Central University of Kashmir (CUK) has coordinated visits of ITCA-CIT Team. **Dr. K. Gopalakrishnan** and **Dr. Antony Louis Piriyakumar**, Dean (R&D), Cambridge Institute of Technology (CIT), Bangalore have spent 4 days at Srinagar, Kashmir during 04-08 July 2024 and also had deliberations for future collaborations with **Prof. A Ravinder Nath**, Vice Chancellor of Central University of Kashmir and Director (i/c), NIT Srinagar and had power breakfast and dinner meetings with him also met few more leading Academicians/Startups interacted at Kashmir!



L to R: Dr. K. Gopalakrishnan, National Secretary, IIPE and Project Director, 75 Students' Satellites Consortium with Dr. Naseer Iqbal, Registrar, University of Kashmir, Dr. Antony Louis Piriyakumar, Dean (R&D), Cambridge Institute of Technology, Bangalore Ms. Inbisat Yousuf Nath, Indian Students' Representative of UNISEC India from CUK.



L to R: Dr. K. Gopalakrishnan, National Secretary, IIPE and Prof. A Ravinder Nath, VC, CUK and Director (i/c), NIT Srinagar, Dr. Antony Louis Piriyakumar, Dean (R&D), CIT

Interactions on R&D and IPR held at Dept of Physics with Prof. M. A. Shah, NIT Srinagar



L to R: Dr. G N Var, President of the Private Schools Association of Jammu and Kashmir (PSAJK), Dr. Antony Louis Piriya Kumar, Dean (R&D), Cambridge Institute of Technology (CIT), Bangalore, Dr. K. Gopalakrishnan, National Secretary, IIPE and Professor Emeritus, CIT and Prof. M. A. Shah, NIT Srinagar

Dr. K. Gopalakrishnan and **Dr. Antony Louis Piriya Kumar** have interacted with **Prof. M. A. Shah** and his research team is working Nanomaterials, Fabrication Techniques, Applications of Nanomaterials in Capacitors, Energy, Environment, Agriculture and Medical Sciences at Laboratory for Multifunctional Nanomaterials (LMN) P. G Department of Physics National Institute of Technology Srinagar Hazratbal-Srinagar-190006, J & K.



Prof. M. A. Shah has coordinated the visit to **High Altitude Research Laboratory (HARL)** of **University of Kashmir** located at Gulmarg, Kashmir. Gulmarg Observatory was formally opened on April 4th of 1954 during ceremonies attended by a visiting physicist from America, **Nobel Laureate Prof. Arthur H. Compton**. The then director of the laboratory, **Professor P. S. Gill** of Aligarh University, observed that it was only fitting that Professor Compton declare the observatory open since he had been the first to initiate the study of cosmic rays in India, having carried out a program of measurements at Tosh Maidan in Kashmir almost thirty years ago. The laboratory was established in 1954, jointly by Aligarh Muslim University and University of Jammu and Kashmir to conduct scientific research in the field of ionospheric studies, cosmic ray astrophysics, radio astronomy, geomagnetism, and atmospheric neutron monitoring. It was formally opened on 4 April 1954. In 1963, the laboratory became a constituent part of Bhabha Atomic Research Centre and it is managed by BARC's Astrophysical Sciences Division (ASD). In 1974, to assist HARL in executing different research projects in the field of nuclear physics and radiation physics, Nuclear Research Laboratory was set up in Srinagar. Since 1977, the Gulmarg Observatory is in operation. It was established to study the geomagnetic field near the center of the ionospheric Sq current system to fill a gap in the chain of magnetic observatories between India and the erstwhile Soviet Union (Russia).



Left: At Gulmarg Observatory- High Altitude Research Laboratory of University of Kashmir; Right: Proposed Institute for Higher Learning by Dr. G.N. Var

Proposed Venue for Jointly Organising an Event at Gulmarg, Kashmir by NIT Srinagar, ITCA, 75 Students' Satellites Consortium Mission and CIT



Interactions held with Prof. M. A. Shah on Jointly Organising an Event at Gulmarg, Kashmir during November, 2024 with NIT, Srinagar, Indian Technology Congress Association, 75 Students' Satellites Consortium Mission and Cambridge Institute of Technology, Bangalore.





Chinar Quantum AI

Explored Collaborative Research Projects and Training Programmes in AI & ML of CQAI, Srinagar with Cambridge Institute of Technology, Bangalore



Cambridge Institute of Technology (CIT) has established networking and collaboration for joint sponsored R&D projects with CQAI, Srinagar.



DR. RUKHSAN UL HAQ
Founder - KIMS



JUNAID AKHTAR
CTO - Chinar Quantum AI



MOEEN UL ISLAM
Trainer/R and D Engineer



ZUHAIB KHAKI
AI Engineer



AAQIB BASHIR
Jr. Data Scientist



HUMAYUN ASHRAF
Business Manager



IFRAH SHEIKH
Jr. Data Scientist



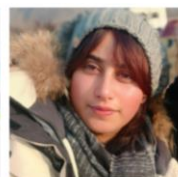
NEELAM FIRDOUS KHAN
Head Operations



MOHSIN MAJEED WANI
Data Science Intern



MURTAZA ALI
Social Media Lead



INBISAT YOUSUF NATH
Student Ambassador for University Outreach



MOHSIN ILAHI
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International Conference on

Recent Innovations in Production Engineering (RIPE - 2024)

Organised by Department of Production Technology, 30 & 31 MAY, 2024 @

MADRAS INSTITUTE OF TECHNOLOGY Campus, Anna University, Chennai, Tamilnadu, India



The inauguration of RIPE 2024 happened on 30th May 2024, forenoon, presided over by **Prof. R. Velraj**, Vice Chancellor, Anna University. The inaugural address was delivered by **Shri. J. Rajesh Kumar**, Outstanding Scientist & Director, CVRDE-DRDO and the special address was delivered by **Dr. Peter Madindwa Mashinini**, Professor, University of Johannesburg, South Africa and **Prof. K. Ravichandran**, Dean, MIT campus. After the inauguration, the plenary talk entitled "**Processing of Titanium alloys and its composites**" was given by **Dr. Peter Mashinini**, University of Johannesburg, South Africa. Followed by another plenary talk entitled "**Lifelong Machine Learning/AI in Robotic and Autonomous Systems**" by **Dr. S. Jagannathan**, Professor, Missouri University of Science and Technology, United States. Then, in the afternoon session, the keynote address was delivered in three parallel sessions by **Dr. Manoj Gupta**, Provost Chair Professor, NUS, Singapore; **Dr. K. P. Karunakaran**, Professor, IIT Bombay; **Dr. TPD Rajan**, Senior Principal Scientist, MSTD, CSIR- Thiruvananthapuram; **Dr. Balamurugan J**, Professor, Korea Advanced Institute of Science and Technology, South Korea; and **Dr. Sushanta Kumar Panigrahi**, Professor, IIT Madras, followed by the presentation of papers from the delegates in respective sessions.

International Conference on Recent Innovations in Production Engineering (RIPE - 2024)



Lighting of the Lamp by Prof. R. Velraj, Vice Chancellor, Anna University, Prof. Peter Madindwa Mashinini, University of Johannesburg, South Africa and Prof. Tatyana Konkova, University of Strathclyde, United Kingdom and other Dignitaries! Welcome address by Dr. A. Siddharthan, Professor & Head, Convener, RIPE 2024; Briefing about the conference by Prof. G. B. Bhaskar, Co-ordinator, RIPE 2024; Prof. R. Velraj, Vice Chancellor, Anna University was honoured by Prof. A. Siddharthan, Convener, RIPE 2024 and The foreign delegate Prof. Peter Madindwa Mashinini, Mechanical & Industrial Technology, University of Johannesburg, South Africa was honoured by Prof. K. Ravichandran, Dean, MIT Campus on 30 May 2024.

International Conference on Recent Innovations in Production Engineering (RIPE - 2024)



The Chief Guest **Shri. J. Rajesh Kumar**, Outstanding Scientist & Director, CVRDE - DRDO was honored by **Prof. G. B. Bhaskar**, Co-ordinator; The Chief Guest **Shri. T. Panneerselvam**, Additional Director, CVRDE - DRDO was honoured by **Prof. A. Siddharthan**; **Prof. K. Ravichandran**, Dean, MIT campus was honoured by **Dr. S. Vijayakumar**, Asso Prof and Co-coordinator; **Dr. Tatyana Konkova**, Professor, University of Strathclyde, UK was honored by **Prof. A. Siddharthan**, Head, Convener; **Prof. Manoj Gupta**, Provost Chair Professor, NUS, Singapore honored by **Prof. G. B. Bhaskar**, Co-ordinator, RIPE 2024; **Shri M. Boopathy**, Scientist – F, DRDO was honoured by **Prof. A. Siddharthan**, Convener, RIPE 2024 and **Dr. S. Sathish**, Assistant Professor & Co-coordinator, RIPE 2024.

International Conference RIPE – 2024 held @ MIT, Anna University



The second day started with the plenary talk entitled **"Processing of Aerospace Materials AD730"** given by **Dr Tatyana Konkova**, Professor, University of Strathclyde, United Kingdom. The keynote address was delivered in three parallel sessions **Dr. V. Dillibabu**, Scientist-F, Gas Turbine Research Establishment, DRDO, Ministry of Defence, Bangalore; **Dr. V. Krishnaraj**, Professor, PSG College of Technology, Coimbatore; **Dr. N. Arunachalam**, Professor, IIT Madras; and **Prof. V. Anandkrishnan**, Professor, NIT Trichy, followed by the presentation of papers from the delegates in respective sessions. The keynote lectures were given in diverse fields which include Lifelong Machine Learning/AI in Robotic and Autonomous Systems, An Insight into Synthesis and Applications of Sustainable and Eco-friendly Magnesium Based Materials for 21st Century and Way Beyond, Electron Beam Hybrid Manufacturing, Advances in Manufacturing Technologies of Metal Matrix Composites, Advancements and Challenges of 3D Nano-architectures in Real-World Energy Technology, Innovations in Metal Forming, opportunities for academic researchers, engineering students and start-ups, Challenges in Drilling of Multi-material Stacks, Day Dreaming Factories – The Future of Manufacturing and Challenges in Metal Additive Manufacturing. To the end, the valedictory function was chaired by chief guest **Thiru. Anbu Nedunchezian**, GM-Operations, Caterpillar & Program Chair **Shri C. Shanmuganathan**, MD, Kaliswari Metal Powders Pvt Ltd. The coordinator, **Dr. G. B. Bhaskar**, thanked all the delegates and participants for their fruitful contributions.

National Level Technical Symposium “MECH ZEAL V 9.0” Organised by Velalar College of Engineering & Technology (Autonomous), Erode-12. Department of Mechanical Engineering & IPE Students Chapter



- A National-level Technical Symposium is conducted on 05.04.2024. **Mr. Vasanth Nagarajan**, Co-Founder & CTO, Pinesphere Solutions Pvt Ltd, Coimbatore is the Chief Guest. Students from diverse institutions engaged in activities such as Paper Presentation, Technical Quiz, Connexions, CAD Modelling, showcasing their talents and honing their skills in their respective domains.
- Valedictory function of Fabulous Association of Mechanical Engineers and IPE Students chapter for the academic year is held on 02.05.2024. VCET-MECHMERIZE, Vol 9. Newsletter for the academic year 2023-24 (Odd & Even) is released and the participants' certificate for various activities were issued.

Students Activities:

- Third year students **Prakash K, Kaviarasan K, Gowtham S, Manikandan V** participated and presented project on “**Design and Fabrication of River Surface Cleaning Robot**” and **Won Frist Prize in Engineering Innovation 2024** conducted at VCET, Erode on 13.04.2024.
- Third year students **Shri Harsan, M Jaya Shree, S Chidharth Redhar** participated and presented paper on “**Vibration Analysis of Polymer Matrix**” at Bannari Amman Institute of Technology, Sathyamangalam on 07.05.2024.
- Second year students **Vijayakumar V, Karmegam S** attended workshop on “**Electric Two Wheeler Design Competition**” at Knowledge Institute of Technology, Salem 26.05.2024.
- 5 students attended Quiz and workshops conducted by various institutions.

NPTEL Certificate:

- 50 students completed Principles of Industrial Engineering & 2 students completed Introduction to Industry 4.0 and Industrial Internet of Things course in Jan- Apr 2024.
- **Hariprakash G, Ravindhar V, Allwin V** of Third year & **Giriselvam S** of Second year secured Elite + Silver grade in Principles of Industrial Engineering.



RATHINAM
TECHNICAL CAMPUS
(AUTONOMOUS)



Organized by
**Department of Mechanical Engineering
in association with
Indian Institute of Production Engineers (IPE)**



DESIGN CHALLENGE

24th | 3.30 to
April, 2024 | 5.30 pm

Convenor :
Dr.S.Seenivasan
Dean, School of Mechanical Sciences

Event Coordinator:
Mr. G. Vijayasekaran
Mr. H. Mansoor Raja
Mr. P. Thangapandian

Name of the Event : Internal Event of “Design Challenge”
Date : 24/04/2024
Time : 03:30 - 05:30 pm
Event Coordinator : Mr. G. Vijayasekaran, AP/ Mech
Event Coordinator : Mr. H. Mansoor Raja, AP/ Mech
Event Coordinator : Mr. P. Thangapandian, AP/ Mech

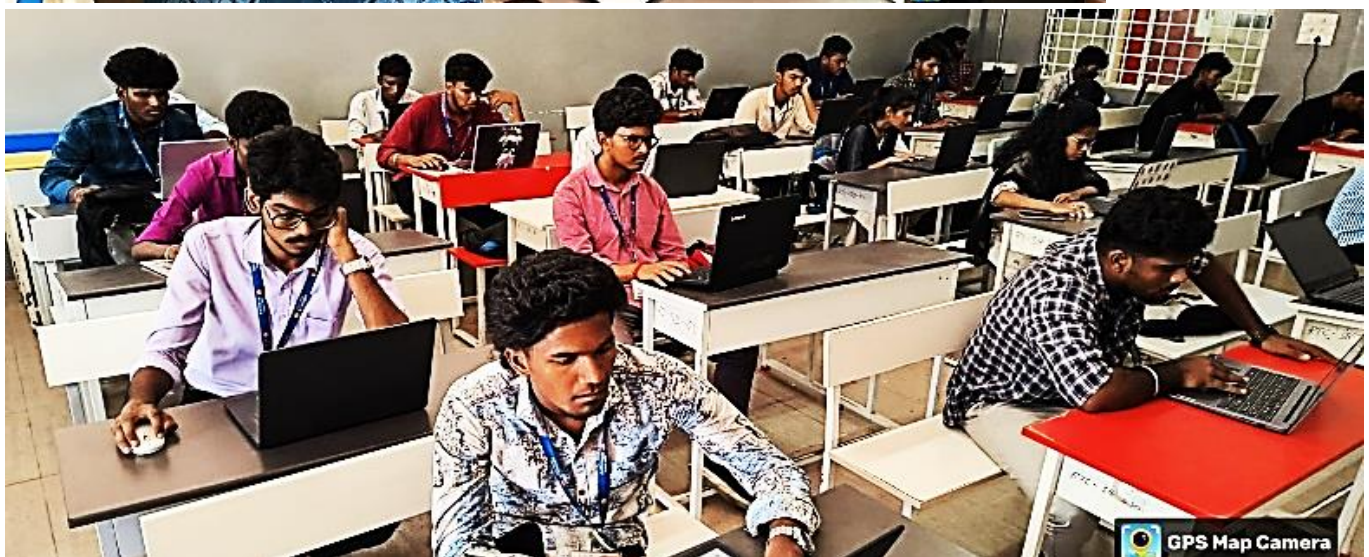
Preamble: One day Internal Event of “Design Challenge”, has been conducted on 24th April 2024, at Department of Mechanical Engineering, Rathinam Technical Campus, Coimbatore.

Participants Profile: There were 3 staff members and 32 students’ participants from II Year Mechanical Engineering participated.

Description: The program started by invoking the blessings of the almighty at 03.15 PM. Welcome address was delivered by Mr.Vijayaraja, II year mechanical engineering student. The session started at 3.30 pm , 32 students participated. The Design Challenge test focuses on the ability to understand modelling software tools and complete specific designs within the allotted time. Students got e-certificate based on the completion of the task. Dr. S. Seenivasan, Head of the Department, shares the importance of design knowledge in the mechanical field. Mr. G. Vijayasekaran, IPE Co-Ordinator, given the vote of thanks and collected the feedback of the event.

Future Perspectives: The department of Mechanical Engineering is looking forward to organizing future events in association with IPE to create a platform for gaining knowledge in and around the world.

DESIGN CHALLENGE @ RATHINAM TECHNICAL CAMPUS, COIMBATORE



Small Satellite Initiatives in India-BIG Benefits to Academia



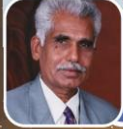
"Opening remark"

Dr. L.V. Muralikrishna Reddy,
President, UNISEC India, Indian Technology Congress Association and
75 Students' Satellites Consortium Mission



"Think big, stay SMALL", A vision for Space Internet of Things (Space IoT)

Prof. R. Venkatesha Prasad,
Associate Professor, IEEE Distinguished Lecturer,
TU Delft, The Netherlands and he was the Deputy
Project Director for Lunar Zebro- a Moon Rover
Project



"Small Satellite Initiatives in India and Opportunities for Academia"

Padma Shri Prof. R. M. Vasagam,
Eminent Scientist, ISRO. Project Director, India's First Geo-Stationary
Communication Satellite "APPLE". Former Vice Chancellor, Anna University,
Dr.MGR University, India



"NanoSat Learning Experiences and Risc V in Space Applications"

Er. Nikhil Riyaz,
Research Scientist, CIT/TU Delft,
Netherlands,
Former Student Representative



Moderator
Mr. Kiran S Hegde
Student Representative



"Spacecraft RF Characterization"

Prof. Puneet Kumar Mishra,
Board of Governors, IEEE Aerospace & Electronics Systems Society,
Region 10 (Asia and Pacific) India, Eminent Scientist, ISRO-Done RF
Characterization of 47 Satellites, 325 Antennas, and Radomes



"Orbital Simulations for Nano Satellites Using MATLAB"

Ms. Inbisat Yousuf Nath,
Central University of Kashmir,
Student Representative



"Insight into Risc V and AI & ML for Space Applications"

Dr. Antony Louis Piriyakumar,
Dean-R&D, Cambridge Institute of Technology (CIT), Bangalore, India



Dr. Cyril Prasanna Raj P,

Director, Cambrian Consultancy Center and Industrial Research, CIT

Host: UNISEC-India **Register now !**
Time: 22:00-24:00(JST)
February 17, 2024
<https://www.unisec-global.org/virtual-meeting.html>



Pictured: **Nikhil Riyaz** during his presentation on RISC-V Applications in Space

Mr. Nikhil Riyaz is a research scientist at CIT/TU Delft, Netherlands. He is the former Student Representative of UNISEC-India. He has a wide experience in the area of technologies. He was a research intern at Indian Institute of Technology, Kanpur, Research and Development Intern at IBM, Vice Chairman at NHCE IEEE Student Branch Chair of Marine technology society's student branch. He is a founder of Dechedroid; a small scale 3D printing service facility and also was the Founding Director and CEO at TSC Technologies Pvt. Ltd. He is an active Member of 75 Students' Satellites Consortium Mission from its inception!

Presentation on "Orbital Simulations for Nano Satellites Using MATLAB" has been done by **Ms. Inbisat Yousuf Nath**, Central University of Kashmir. Ms. Inbisat Yousuf Nath is a PG Scholar of Physics at The Central University of Kashmir. She is also a Student Representative of UNISEC-India. She currently also interns at Indian Technology Congress Association (ITCA) and has experience of serving as the coordinator at Astronomy Department of Science Overse, scholar at Womanium, intern at Abdus Salam International Centre for Theoretical Physics (ICTP). She has worked on projects named Python Implementation for Xray Spectral Analysis of Active Galaxies and QuantumSquareWellPy.

Pictured: **Ms. Inbisat Yousuf Nath** during her presentation on conducting simulations in MATLAB



Jeppiaar Institute of Technology's Governing Council Meeting Emphasized the Need for Professional Society Activities under Autonomous Curriculum for the Overall Development of Students!



Dr. K. Gopalakrishnan, National Secretary, IPE and Project Director, 75 Students' Satellites Consortium have attended the Governing Council Meeting of Jeppiaar Institute of Technology, Sriperumpudur on 13 July 2024 along with **Dr. Ravichandran**, Dean, MIT, Anna University and **Dr. Damodar Reddy Edla**, Professor, Department of Computer Science and Engineering, National Institute of Technology (NIT) Goa. The meeting was presided by **Dr. Marie Wilson**, Managing Director, of Jeppiaar Institute of Technology, Sriperumpudur. The Governing Council Meeting Emphasized the Need for Professional Society Activities under Autonomous Curriculum for the Overall Development of Students!



Interactions held with **Dr. Mylswamy Annadurai** and **Prof. Wing-Huen Ip** on Our Mission Idea Contest for “MIC-Moon Mission”



Padma Shri Dr. Mylswamy Annadurai

*Distinguished Scientist, ISRO (Moon Man of India)
Former Director, ISRO Satellite Centre (UR Rao Satellite Centre-URSC)
Project Director, Chandrayaan 1 & 2 (Moon Mission 1 & 2)
Programme Director, Mangalyaan (Mars Orbiter Mission-MOM)*

Prior to become the Director, URSC, he was working as Programme Director for IRS&SSS (Indian Remote Sensing & Small, Science and Student Satellites) that include Chandrayaan-1, Chandrayaan-2, ASTROSAT, Aditya-L1, Mars Orbiter Mission and many Indian Remote Sensing Missions. He also contributed to India's National Communication Satellite (INSAT) Missions as the Mission Director. He was the Member Secretary of the Task Team that prepared Chandrayaan I Project Report.

https://en.wikipedia.org/wiki/Mylswamy_Annadurai



Interactions held with **Dr. Mylswamy Annadurai** on Our Mission Idea Contest for “MIC-Moon Mission” has been held during **17:30 to 18:30 hrs IST on 13 July 2024 (Saturday)**. Both the Teams from Indo-Taiwan have participated!

The meeting on Google Meet, held with this link:

<https://meet.google.com/kiy-haax-ugp>

National Taipei University of Technology and National Tsing Hua University, Taiwan



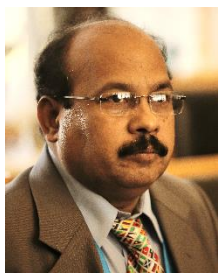
**Mentors
from
Indian
Side**



**Mentors
from
Taiwan
Side**



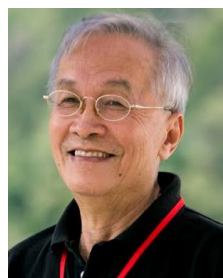
Dr. Mylswamy Annadurai
Outstanding Scientist,
ISRO-Moon Man of India



Dr. K. Gopalakrishnan
IIFE/Project Director,
75 Satellites Mission



Dr. Naseer Iqbal
Registrar,
University of Kashmir



Prof. Wing-Huen Ip
National Central
University, Taiwan



Prof. Ying Liao
National Taipei University
of Technology, Taiwan

Members from Indian Side

Members from Taiwan Side



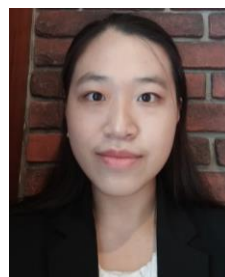
Nikhil Riyaz
Research Scientist, CIT
CEO, Hexeia



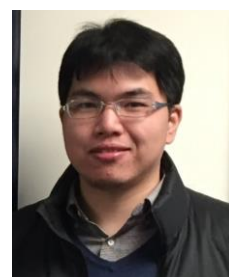
Inbisat Yousuf Nath
Central University of
Kashmir & UNISEC India



Thiru Venkat R
Cambridge Institute of
Technology, Bangalore



Yi-Hsuan (Rosetta) Li
National Tsing Hua
University, Taiwan



Dr. Ian-Lin Lai
National Central
University, Taiwan



Prof. Syed Hayath
Cambridge Institute of
Technology, Bangalore



Md Wael Umar
Cambridge Institute of
Technology, Bangalore



Ramya Shree S
Cambridge Institute of
Technology, Bangalore



Yu-Hin Henry Cheng
National Central
University, Taiwan



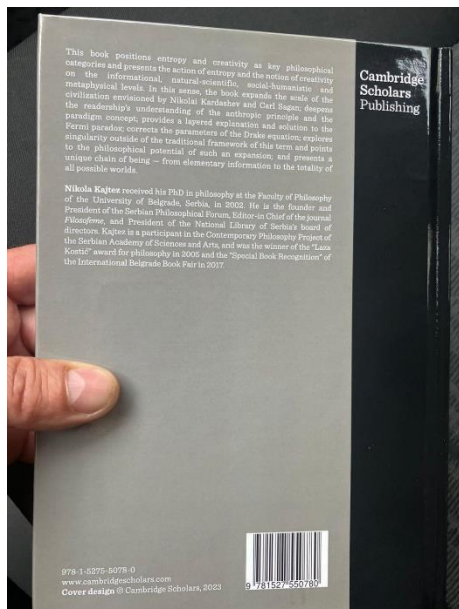
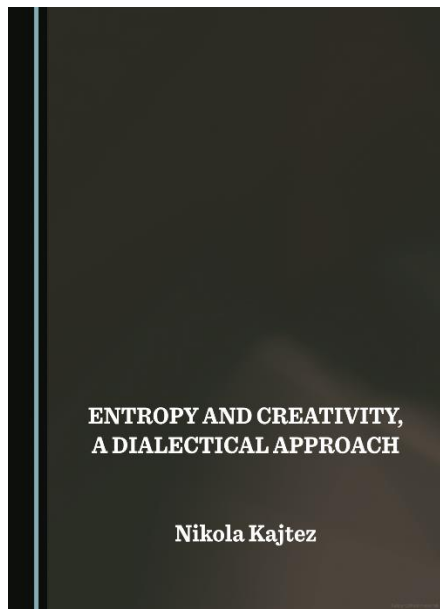
Hao-En (Julian) Chang
National Central
University, Taiwan



Roshani Bankar
Cambridge Institute of
Technology, Bangalore



Indo-Serbia Collaborations: Looking for Stronger Ties!



Entropy and Creativity, a Dialectical Approach
 By Nikola Kajtez
 This book first published 2023
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Synopsis:

“Entropy and Creativity: A Dialectical Approach”

“Entropy and Creativity: A Dialectical Approach” delves into the intricate relationship between two pivotal concepts often overlooked in Western philosophy: entropy and creativity. Historically, philosophical thought has been dominated by Aristotelian logic, Cartesian paradigms, and Enlightenment ideals, frequently neglecting the interplay between these forces. Recent advancements in thermodynamics, however, have illuminated entropy—the universal tendency towards disorder—and its profound impact on our understanding of existence.

The book contends that entropy and creativity are complementary opposites essential for a deeper grasp of the world. It challenges the traditional belief in continuous progress and examines how entropy disrupts the notion of an ever-evolving cosmos. By integrating entropy and creativity into philosophical frameworks, the book offers new insights into the nature of change and continuity.

Valuable for students and scholars in philosophy, science, and the humanities, this work provides a novel perspective on how entropy affects inorganic and organic processes, as well as information systems, art, and societal structures. It offers students a chance to engage with advanced concepts that connect scientific principles with philosophical inquiry, fostering critical thinking about how these forces influence our understanding of the universe.

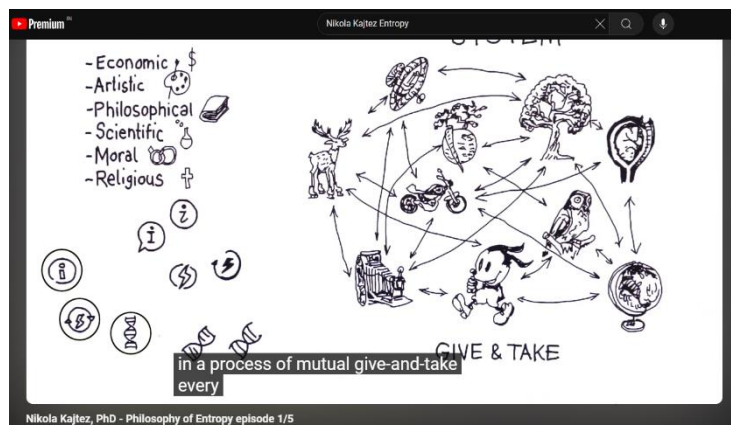
In a world facing significant challenges, “Entropy and Creativity” is an essential resource for comprehending the dynamics of existence and the role of creativity in mitigating entropic pressures. It enriches philosophical discourse and offers practical guidance for navigating a rapidly changing world.

Author: NIKOLA KAJTEZ

Nikola Kajtez holds a PhD in philosophy from the University of Belgrade, where he graduated in 2002. He is a prominent figure in Serbian philosophy, serving as the founder and President of the Serbian Philosophical Forum. Kajtez is also the Editor-in-Chief of *Filosofeme* and the President of the board of directors of the National Library of Serbia. His involvement extends to the Contemporary Philosophy Project of the Serbian Academy of Sciences and Arts.

Kajtez's academic and philosophical contributions have been recognized with several honors, including the "Laza Kostić" award for philosophy in 2005. He also received the "Special Book Recognition" at the International Belgrade Book Fair in 2017. His work focuses on expanding philosophical and scientific understanding, exploring concepts such as entropy and creativity, and addressing complex problems like the Fermi paradox and the Drake equation.

In "Entropy and Creativity," Kajtez presents a dialectical approach that integrates these concepts across informational, natural scientific, social-humanistic, and metaphysical dimensions. The book builds on ideas from Nikolai Kardashev and Carl Sagan, offering a fresh perspective on the anthropic principle, civilization, and singularity. Kajtez's scholarship aims to deepen our comprehension of fundamental philosophical and scientific questions, bridging gaps between diverse fields of study and contributing to a broader understanding of existence and progress.



Nikola Kajtez, PhD - Philosophy of Entropy Episode 1/5
<https://youtu.be/IVogsn1SfHM?si=zdKhE4parM9q79XN>



Editorial Reviews of "Entropy and Creativity: A Dialectical Approach"

Review

"Entropy and Creativity by Nikola Kajtez, a great genius on the rise, is a revolutionary masterpiece! The author demonstrates a wealth of knowledge and experience and a deep understanding of the nature of the universe, and his insights are enlightening. This work is of historical importance and cannot be overestimated. It will, I am sure, be the foundation for entropy and creativity researchers around the world! It will be used as a unique source of knowledge in advanced civilizations and will become part of the academic curricula." **Dr K. Gopalakrishnan**, Secretary General, Indian Technology Congress Association; Project Director, 75 Students' Satellites Mission; and Professor Emeritus, Cambridge Institute of Technology, India

"This is an interesting, stimulating and inspiring book, addressing a plethora of aspects and facets of the entities "entropy" and "creativity" and their interconnections in the frame of a large number of philosophical and scientific fields. Consequently, this philosophical work touches on a very great number of human endeavors, activities, mental structures, and discoveries. The book is well written and appropriately formulated, so that it should be accessible to a variety of scientific communities in the broad spectrum of human activities between physical and philosophical disciplines." **Aris Chatzidimitriou**-Dreismann Researcher at the Department of Chemistry, Technische Universität Berlin, Germany

"Entropy and Creativity is a unique book by a philosopher with a deep understanding of physics, but its content goes far beyond physics and the natural sciences... This work should be required reading for all intellectuals!" **Dr Branko Kolarić**, FRSC Full Research Professor at the Institute of Physics, University of Belgrade, Serbia, and Visiting Professor and Research Associate at the Department of Physics, University of Mons, Belgium

"Dr Nikola Kajtez has positioned entropy and creativity as new philosophical categories! He has expanded the scale of civilization as defined by Nikolai Kardashev and Carl Sagan along with deepening the understanding of the anthropic principle and paradigm concept. He has provided a layered explanation/solution of the Fermi Paradox, and an expansion and correction of the parameters of the Drake Equation. Through this, he provides an understanding of the singularity outside the traditional scope of this term and points out the philosophical potential of such an expansion! Also presented are the exact equations that explain the nature of creativity and the concept of universal evolutionism/synergetics. This book is an epistemological tool and it is a fantastic contribution to contemporary society/mankind!" **Professor R. M. Vasagam**, Outstanding Scientist of the Indian Space Research Organisation (ISRO), Former Vice Chancellor of Anna University and Dr. M.G.R. University, India, and Former Chairman of the National Design and Research Forum (NDRF), India

Ref: <https://www.amazon.com/Entropy-Creativity-Dialectical-Approach-Nikola/dp/1527550788>

Puneeth Satellite Progressing Well....

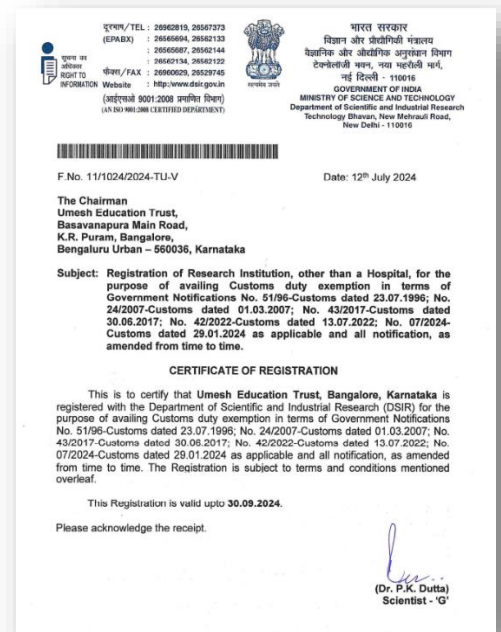
Government of Karnataka, KSTePS has announced **Karnataka Government School Students Satellite (KGS3Sat)**! It was then named as "**Puneeth Satellite**" during the National Science Day held on 28 February 2022 at 18th Cross, Malleshwaram, Bangalore Government School premises! ITCA-KSTePS-KSCST has initiated State Level Space Tech Competitions under various categories across Karnataka covering all High Schools and PU Colleges in such a way to create awareness among 2.5 Lakhs of Students about space science and technology and also to sensitize the students about "New Space Era" or "Space 2.0" which offers future career opportunities and prospects on near future. **Dr. Venkatesh**, Scientist, KSTePS has visited 75 Students' Satellites Secretariat on 10 July 2024 and held interactions with Dr. K. Gopalakrishnan, Project Director then seen the Clean Room, 1U Puneeth Satellite Engineering Model, solar Panels etc.



Collaborative R&D Project Opportunities among Institutions under Consortium Mode



Dr. Cyril Prasanna Raj, Director of Cambrian Consultancy Center and Industrial Research, **Dr. K. Gopalakrishnan**, National Secretary, IIPe and Professor Emeritus, Cambridge Institute of Technology (CIT), Bangalore have interacted with **Dr. S. Thangavelu**, Chairman, Sri Shathi Institute of Engineering and Technology, Coimbatore and **Dr. S. Nalin Vimal Kumar**, Director-Technical, SNS Group of Institutions, **Dr. N J R. Muniraj**, Dean-ECE, SNS College of Technology (SNS CoT), Coimbatore and **Dr. Girish**, CIT with reference to Jointly Promoting R&D Projects and Startups! Already, Rs. 4.75 Crores worth of R&D Project from The Ministry of Electronics and Information Technology (MeitY) is being Implemented with CIT, Bangalore and its Consortium Partners including, SNS CoT! SIET has Launched its Satellite! On 12th July 2024, Cambridge Institute of Technology and Cambridge Group of Institutions under Umesh Educational Trust have received recognition of “Scientific and Industrial Research Organisation (SIRO)” Status from Department of Scientific and Industrial Research (DSIR), Government of India!



Congratulations to Cambridge Institute of Technology and Cambridge Group of Institutions under Umesh Educational Trust have received recognition of “Scientific and Industrial Research Organisation (SIRO)” Status from DSIR, Govt of India!



IPE Chapters interested in Launching Their Own Satellites or to establish the UNISEC India Chapter at Their Institutions can contact: Dr. K. Gopalakrishnan, National Secretary, IPE at profgoki@yahoo.com or M: 98451 73730

India- Israel Partnership

- Innovation, Robust Technology Base, Disruptive Technologies
- Academic Research to Products and Solutions
- Approach to Outreach Educational Programmes – Industry & Institute
- Mastered in Space Technology
- Strong in Communication, Observation Science and Education International Co-operation, Bilateral Agreements with India including Student
- Exchange Programmes and Joint Projects
- Funds - Grants, Soft Loans etc

How Institutions Can Engage

- Build Strong "Space Technology" Competencies
- Hands on Development Experience- Students and Faculty Members
- More Industry Interaction (Real Time)
- State-of-the-art Technology Interventions
- Create New Job, Start-ups and Incubation facilities
- Nurture Future Space Engineers/Scientists
- Technology Demonstration - S&T Research
- Support Education Outreach
- Make Students Future Career Ready

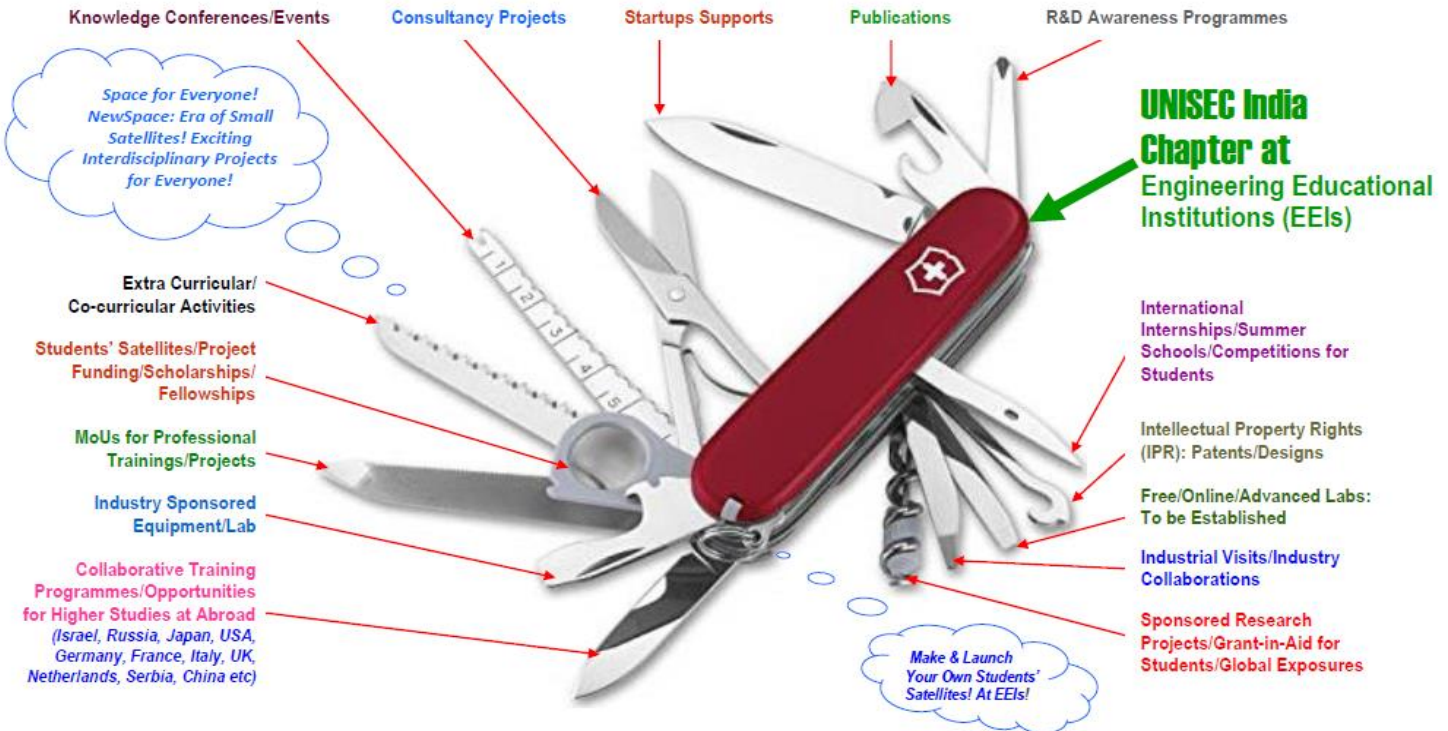
UNISEC India: Secretariat @4th Floor,#3, First Main, BDA Layout, Kodihalli, HAL 2nd Stage, Bengaluru – 560008, Karnataka, India;
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Benefits of Professional Bodies Chapter at EEs: Including the Students' Chapters at CIT Which Provide Network to Achieve the Following:

Publications

- Research Papers: Published in Journals (With ISSN/Impact Factors etc)
- Research Papers: Published in Conference (Proceedings with ISBN)
- Books
- Monographs/White Papers
- “h” Index of Each Faculty
- “I 10” Index

Intellectual Property Rights (IPR)

- Patents
- Trade Marks
- Geographical Indications
- Layout-Designs of Integrated Circuits
- Industrial Designs
- Trade Secrets
- Copy Rights (rights of authors of literary and artistic works including Computer Programmes)

Sponsored Research Projects/Grant-in-Aid

Consultancy Projects

Industry Sponsored Equipment/Lab

Free/Online/Advanced Labs: Established

- Students/Faculty Activities

R&D Awareness Programmes

Extra Curricular/Co-curricular Activities

- Establishing Chapters of Professional Societies/Trade Bodies
- Enhancing Team Activities/Interpersonal Skills etc

Emerging Trends Watch: Alternative Teaching & Learning

- Innovations/Patents/Video Watch etc

Industrial Visits/Industry Collaborations

Arranging Industrial Visits/Field Training of Faculty/Students at Industries

B.Tech and M.Tech Mini-Major Project/Dissertation Work at Industries

- Collaborative Training Programmes/Credit Courses
- Companies to Take Students for Learn & Earn Programs
- Practical Training/Pre Internship of students in Industries (Unpaid/Paid)
- Professional Chairs Sponsored by Industries at EEI
- R&D Laboratories sponsored by industries at EEI
- MoU between Industries/R&D Labs/Professional/Trade Bodies
- Scholarships/Fellowships Instituted by Industries for Students of EEI
- Short-Term Assignment/Exchange of Faculty Members in Industries
- Expert/Professionals from Industry as Visiting Professors or Guest Lectures and Delivering Lectures on Industrial Best Practices & Trends

Knowledge Conferences/Events: Organized/Attended

- Workshops, Conferences and Symposia *In House Events:* Faculty Participation in External Events:
- Having Tie-ups with Foreign Universities
- Promote International Internship /Summer Schools

Startups: Established

- Startups by Students/Faculty Members

CanSat India Students Competition held at Ahmedabad: 17 & 18 April 2024



Dr. K. Gopalakrishnan, National Secretary, IPE and Project Director, 75 Students' Satellites Consortium with Former Chairman, ISRO Dr. A. S. Kiran Kumar and NAL Drone Team who have provide the Launch Opportunities for all the CanSat India Competition Teams at Ahmedabad!