Indian Association of Physics Teachers

Sub-Regional Council (Vidarbha)
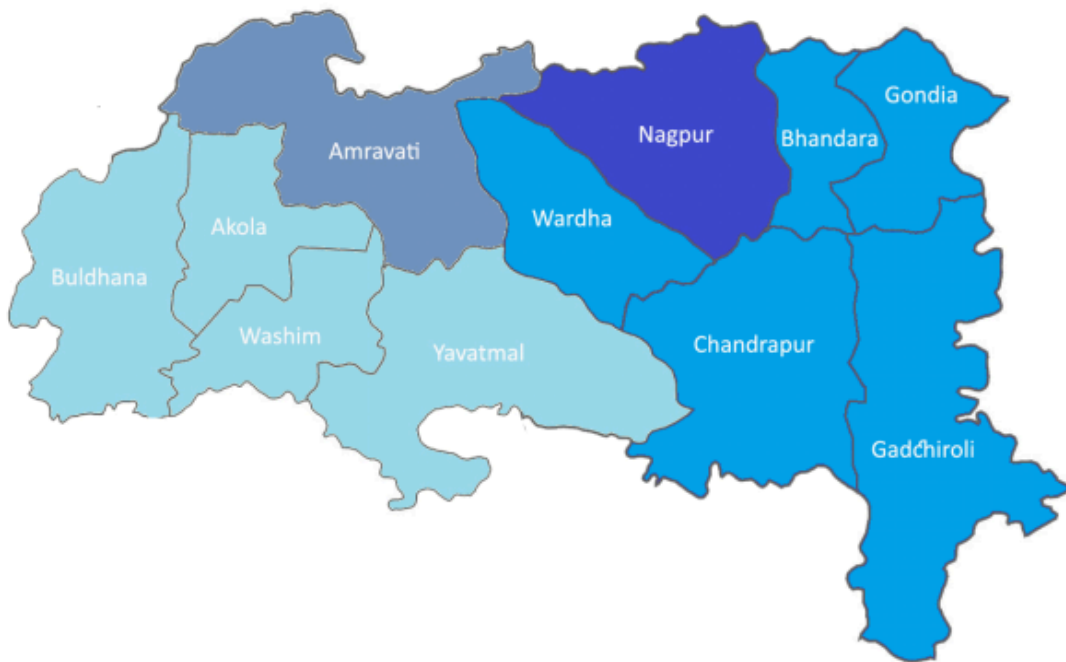
Sub-RC 08E

21 Days Workshop on

During 10th June to 5th July 2024
Developing AI applications in the Physics domain with Python

REPORT of Workshop on

Developing AI applications in the Physics domain with Python

During 10th June to 5th July 2024

Index

Flyer

Report of the Workshop

Course overview

Resource Persons

Zoom Credentials

List of Participants

Feedback of Participants

Instructions (Rules & Regulations) for Participants

From Organizer's Teams View

News Item in Marathi for Local daily

Some Clicks, Group Photo

Table Programme for Inaugural Function

Table Programme for Valedictory Function

Detailed Brochure

Highlighted Correspondence

Sample Certificates

Appreciation Letter to the Team

Introduction of Speakers Prepared by the Team

Indian Association of Physics Teachers (IAPT)
SRC08E (Vidarbha)
In Association With
Association of All Computer Science Teachers (AACST)

Online Workshop on Developing AI Applications in the Physics domain with Python

Join our Virtual Workshop for a dynamic course integrating Python programming and AI. Gain practical skills highly sought after in today's tech world. Delve into the captivating realm of physics alongside a national assembly of intellectual luminaries, adept not only in the intricate nuances of AI and Python programming but also in unraveling the mysteries of the cosmos with profound expertise and finesse. Don't miss this exclusive opportunity!

June 10th to July 5th, 2024 (4 weeks)

6:30 PM to 8:00 PM
Monday to Friday

Online via Zoom

Eligibility: 8th standard & Above
Anyone including a teacher/faculty can register

First come, first serve basis
(Hurry! Limited Slots Available)

Registration Fee
₹1000 per participant

Registration Link:
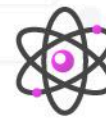https://forms.gle/dGeJaK9VRve5FzDz8

Scan Here for Registration

Scan here to pay

11371520@cbin

Course Highlights

- Master Python tailored for physics applications
- Integrate AI with Physics
- Explore Cutting Edge Concepts
- Guidance from experienced faculty experts in the field
- Certificate on Completion of course

Course Outcomes

Acquire proficiency in Python programming tailored for physics applications, including data handling, visualization, and integration with AI methodologies, spanning from traditional machine learning to cutting-edge deep learning techniques.

Convener:
Dr. Abha Khandelwal EC, IAPT SRC08E & FOUNDER AACST

Coordinators:
Dr. Halim Ahamad, Secretary, IAPT, SRC-08 E (+91 93722 33844)
Dr. G L Jadhav, Treasurer, IAPT, SRC-08 E (+91 9579194076)

Student Coordinators:
Yugansh Kanoje (+91 93092 71163)
Aishwarya Mendawade (+91 86682 47334)
Anushka Palandurkar (+91 76665 71986)

Resource Persons:
Dr. Abha Khandelwal, Retd. Head of the Department of Computer Science, Hislop College, Nagpur.
Prof. Manu Pratap Singh, Professor and Director, Institute of Engineering and Technology,
Dr. Bhimrao Ambedkar University, Agra.
Ms. Pratibha Rashmi, Assistant Prof, Dr. B R Ambedkar University, Agra.
Mr Aditya Singh, Visiting Lecturer, Dept of Physics, Dayalbagh Educational Institute, Dayalbagh, Agra.
Ms. Ritika Raghav, Research Scholar, Dayalbagh Educational Institute, Agra.

Mentors:
Prof. P.K. Ahluwalia, Central President, IAPT
Dr. S.B. Kishor, President AACST
Prof. S.W. Anwane, President, IAPT SRC 08E

Scan Here for More Information

https://bit.ly/3UF7Z78

REPORT of Workshop on
Developing AI applications in the Physics domain with Python
During 10th June to 5th July 2024

The Indian Association of Physics Teachers (IAPT) Sub-Regional Council for Vidarbha SRC-08 E and Association of All Computer Science Teachers (AACST) jointly organized 21 days Workshop from 10th June to 5th July 2024 on **Developing AI applications in the Physics domain with Python**. In this workshop 134 participants were enrolled for 21 lectures of 90 min followed by 18 assignments.

In this ambitious project of imparting knowledge of developing AI applications using Python among 134 participants were ranging from ex-vice-chancellor, professors, teachers, research scholars and students from STD X to PG including IAPT President Prof P K Ahluwalia. Against successful completion of the Workshop, a certificate was awarded. In this venture the resource persons included; (i) Prof Manu Pratap Singh (ii) Dr Abha Khandelwal Ex-Professor Computer Science, (iii) Ms Pratibha Rashmi – Assistant Professor, Dr. Bhimrao Ambedkar University, Agra (iv) Mr Aditya Singh, Dayalbagh Institute Agra (v) Ms Ritika Raghav, Dayalbagh Institute Agra.
The workshop was effectively coordinated by (i) Prof Abha Khandelwal-Convener of the Workshop and EC member SRC-08E, (ii) Dr Halim Ahmad-Coordinator (Workshop), Secretary- SRC-08E, (iii) Dr Gajanan Jadhav, Coordinator (Workshop), Treasurer- SRC-08E. Dr Givind Lakhotiya, Vice-President SRC-08E coordinated all the behind curtain activities for the successful front running of the event. The activity was supported by UG students of Shri Shivaji Science College, Nagpur include; Yugansh Kanoje, Aaishverya Mendawade, Anushka Palandurkar.

The **Inaugural Function** held on 10th June 2024 at 6:30pm in online mode, was Presided over by Prof P K Ahluwalia IAPT - President. Prof Abha Khandelwal delivered the opening remark as the convener of the workshop. SRC-08 E President Prof Shyamkant Anwane delivered a welcome address. In the presidential address Prof Ahluwalia appreciated efforts by SRC-08E in organizing earlier events this year and expressed pleasure over the initiation in organizing the present workshop. Prof Suryakant Thorat, Director of Institute of Technology & Management Nanded chaired the first session which was delivered by Prof. Manu Pratap Singh, Agra.

The Workshop on Developing AI Applications in the Physics Domain with Python, held from June 10, 2024, to July 5, 2024 (21 working days), concluded today with a **Valedictory Function** attended by all participants and resource persons. In the Valedictory Function held on 5th July 2024, opened with address by Convener Dr Abha Khandelwal. She narrated an overview of the successful organization of the workshop. She appreciated resource persons, teacher & student coordinators for playing a very disciplined role in the overall organization of the workshop.
Dr G L Jadhav, Master of Ceremony invited Dr Govinda Lakhotiya, Vice-President SRC-08E for a welcome address on behalf of the sub-regional council. In his address by Vice-President Dr Govinda Lakhotiya

The esteemed resource persons included Prof. Manu Pratap Singh, Ms. Pratibha Rashmi (Assistant Professor, Dr. Bhimrao Ambedkar University, Agra), Mr. Aditya Singh (Dayalbagh Institute Agra), and Ms. Ritika Raghav (Dayalbagh Institute Agra). The Chief Guest, Prof. Mahendra P. Dhore, PRO-VC of SGB Amravati University, Amravati, graced the occasion. The event was presided over by P.K. Ahluwalia, President of IAPT and a participant in the workshop. Dr. Govinda Lakhotiya, Vice-President of SRC-08E, delivered the introductory remarks, while Dr. Abha Khandelwal, Convener of the Workshop, EC-SRC-08E, and Founder of AACST, spoke in her capacity as the Workshop Convener.

Prof. Vandna Luthera shared her views as a participant, and Prof. Ritika Raghav expressed her feelings on behalf of the resource persons. Dr. G.L. Jadhav, Treasurer of SRC-08E, skillfully played the role of Master of Ceremony, and Dr. Halim Ahmad, Secretary of SRC-08E, proposed the Vote of Thanks.

The contributions of student coordinators Mr. Yugansh Kanoje, Ms. Aaishwarya Mendawade, and Ms. Anushka Palandurkar were appreciated by all stakeholders. Prof. Ahluwalia praised the young Sub Regional Council for Vidarbha SRC-08E for successfully coordinating the extensive 21-day activity, which he attended daily as a participant.

11-7-2024
Nagpur

Prof. S. W. Anwane
President
IAPT SRC-08 E

Prof S W Anwane
President, SRC-08E

Contents of the Workshop Developing AI applications in the physics domain with Python

It is an incredibly enriching and dynamic course! Integrating Python programming with AI concepts makes learning more engaging and offers you practical skills that are highly sought after in today's technology-driven world. The hands-on projects and interactive activities are fantastic for reinforcing learning and encouraging creativity, giving you a competitive edge in the job market.

Are you ready to embark on a unique journey, harnessing the combined forces of Python programming and Artificial Intelligence (AI) to delve into the fascinating realm of physics? This is an exclusive opportunity! This summer course is specifically designed to equip you with the skills and knowledge to develop AI applications tailored to the intricacies of the physics domain.

Why Python? Python's versatility and simplicity make it the ideal programming language for tackling complex scientific problems. With its rich ecosystem of libraries and tools, Python empowers physicists to streamline their workflows and unlock new insights through AI-driven analysis.

Course Highlights:

- Bridging Physics and AI: Explore the intersection of physics and AI, discovering how these disciplines complement each other to push the boundaries of scientific exploration.
- Python Libraries: Gain proficiency in utilizing popular Python libraries such as NumPy, and Panda to implement AI algorithms and analyze physics datasets effectively.
- Expert Guidance: Rest assured, you will benefit from the guidance of experienced instructors passionate about programming and Physics. They will provide personalized support, ensuring you feel confident in your learning journey.
- Collaboration and Networking: Engage with fellow participants who share your passion for Python AI and physics, fostering a collaborative learning environment where ideas are exchanged and connections are formed.

Whether you're a physics enthusiast looking to expand your programming skills or a Python aficionado interested in AI applications in the physical sciences, this course is tailored to meet your needs. By the end of the program, you will emerge with the confidence and expertise to develop AI applications that push the boundaries of physics research.

Course Outcomes:

- ☐ Enhanced Real Problem-Solving Skills: By applying AI techniques to physics problems, participants will develop advanced problem-solving skills. They'll learn to approach complex physics problems from a computational perspective, fostering a deeper understanding of fundamental principles.
- ☐ Experimental Design and Data Analysis: AI applications often involve working with large datasets generated from experiments. Participants will

learn how to design experiments effectively, collect data, and analyze it using statistical and machine-learning techniques. This hands-on experience strengthens their skills in experimental physics.

☐ Interdisciplinary Insights: The intersection of AI and physics provides opportunities for interdisciplinary learning. Participants will gain insights from both fields, learning how concepts from AI can be applied to solve physics problems and vice versa. This interdisciplinary approach fosters creativity and innovation in problem-solving.

☐ Career Opportunities: Proficiency in both AI and physics opens up diverse career opportunities in academia, research institutions, industry, and technology companies. Participants can pursue roles such as data scientist, research scientist, AI engineer, or physics researcher, where they can apply their interdisciplinary skills to tackle challenging problems.

Join us on this exciting adventure as we unlock the power of Python and AI to revolutionize the field of physics. Enroll today and embark on a journey of discovery and innovation!

Convener - Dr Abha Khandelwal, Founder AACST and Executive Member IAPT SRC 08e

Course Coordinator - Dr. Halim Ahmad, Dr. GL Jadhao (IAPT SRC 08E)

Mentors:

- President IAPT **Prof P. K.Ahluwalia**
- President AACST **Dr S. B. Kishor**
- President IAPT SRC 08E **Prof. S.W. Anwane** (Vidarbha Region)

Duration : Starting from 10th June 2024 to 5th July 2024   (Four Weeks)

Monday to Friday

Saturday and Sunday Break

Timing : 6:30 pm to 8:00 pm

Criteria. Beginners in Python programming with interest in physics. Starting from 8th Std. from students to faculties.

Course Overview:

This one-month course was designed to introduce participants to the exciting world of Artificial Intelligence (AI) and Python programming. Through hands-on projects and interactive activities, participants learned the basics of the Python programming language, AI, and how to apply them to design simulation programs and develop simple physics-related AI projects.

Course Duration and Schedule:

The course was conducted from Monday to Friday, 6:30 pm to 8:00 pm, for a total of 21 sessions over one month.

Day 1: The course began with an inaugural speech by dignitaries and an expert talk by Prof. Manu Pratap Singh on Artificial Intelligence. This was followed by an introduction to Python, including working with Colab presented by Ms. Pratibha Rashmi.

Days 2-3: Dr. Abha Khandelwal covered the Python basics, including variables, data types, and operators, as well as string manipulation.

Days 4-5: Dr. Abha Khandelwal continued the session on control flow, covering conditional statements and loops.

Day 6: Ms. Ritika presented applications in physics using loops, including the simulation of a car's motion.

Days 7: Ms. Pratibha Rashmi introduced functions and modules in Python.

Day 8-9: Ms. Ritika covered applications in physics using functions, including making 3D objects, projectile motion, and projectile motion with air resistance.

Day 10: Dr. Abha Khandelwal introduced data files, CSV files, and data manipulation and analysis tools, such as NumPy and Pandas.

Days 11-12:

Ms. Ritika presented applications in physics using NumPy and Pandas, including visualizing the electric field and the electric field due to a dipole.

Day 13: Prof. Manu Pratap Singh introduced Artificial Intelligence (AI) and Machine Learning, including real-life examples, types of Machine Learning, and ethical considerations.

Day 14: Mr. Aditya Singh covered Neural Network Methods, including the introduction of Artificial Neural Networks, models, and learning rules, as well as visualizing the magnetic field.

Days 15-16: Prof. Manu Pratap Singh presented Pattern Recognition with Machine Learning, covering supervised and unsupervised learning, the Perceptron and Gradient Descent Method, Recurrent Networks, Hopfield Networks, and Boltzmann Machines.

Day 17: Mr. Aditya Singh introduced Deep Learning, including Convolutional Neural Networks and TensorFlow, with practical implementation in Python.

Day 18: Ms. Pratibha Rashmi demonstrated real-life examples of image recognition with Deep Learning, including the implementation of CNN with NumPy and pattern recognition with CNN using TensorFlow.

Day 19: Prof. Manu Pratap Singh covered new trends in Machine Learning, including feature aspects, new computing trends, and Quantum Machine Learning.

Day 20: The course concluded with a valedictory function where the chief guest, Prof. VC of SGB Amravati, Prof. Dhore, was invited. Prof. Ahluwalia, the President of IAPT, chaired the session.

The sessions were coordinated/hosted by Dr. GL Jadhao, Dr. Halim Ahamad, and a few lifetime members of AACST.

Materials Required:

Internet access

Assessment: Topic wise assignments to assess understanding of concepts.

75% attendance and submission of Assessment in class is mandatory to claim the participation certificates.

Resource Persons:

Dr Abha Khandelwal, Retd. Head of the Department of Computer Science, Hislop College, Nagpur. Founder of the National Level—Association of All Computer Science Teachers. She has 27 years of experience in the domain. She has published 30+ research papers in journals of international and national repute. She has guided 04 students for their doctorate in computer science. With a programming repertoire that gracefully arcs from the fundamentals of BASIC to the modern power of Python, she commands a vast landscape of coding languages. Renowned for her exceptional teaching methods and unwavering dedication, She is beloved by her students. Her ability to inspire and connect with each individual in her classroom has made her a standout educator, celebrated for her knowledge and approachable nature."

Prof Manu Pratap Singh, Professor and Director, Institute of Engineering and Technology, Dr. Bhimrao Ambedkar University, Agra. Has 23 years of experience in the domain. He obtained a doctoral degree in Computational Physics in 2001. He has guided 19 students for their doctorate in computer science. He has published more than 100 research papers in journals of international and national repute. His work has been recognized widely around the world. His research interests are Neural networks, pattern recognition and machine intelligence, soft computing and quantum computing. He has two patents on machine learning.

Ms. Pratibha Rashmi, Assistant, Prof Department of Computer Science, Dr B R Ambedkar University, Agra, has 9 years of experience in teaching and 5 years in the software industry. Submitted Thesis in deep learning and has been actively involved in data science. Proficient in Python and its associated tools and has worked extensively with frameworks like Keras and TensorFlow 3.11.

Mr Aditya Singh, Guest Lecturer, Dept of Physics, Department of Applied Sciences and Humanity, Dayalbagh Educational Institute, Dayalbagh, Agra. A Physics scholar has 3.5 years of experience in teaching and 6 years in Research. Total 9.5 years experience in the field of AI in Physics Domain.

Ms. Ritika Raghav, Research Scholar, Department of Physics and Computer Science, Dayalbagh Educational Institute, Agra, has been working on Applications of Soft Computing in the Microwave domain for the past four years. She also has two years of research experience in modern solar technology. She is proficient in Matlab, Colab and CST software. She contributed to the development of a MOOC course on Community Engagement as per SWAYAM Guidelines.

Online Zoom Link of Workshop

Time: Jun 10, 2024 06:30 PM India
   Every day, until Jul 5, 2024, 26 occurrence(s)

Join Zoom Meeting
https://us06web.zoom.us/j/84223921074?pwd=O6jWcF7YgJa6USef49EcBHMCaP32uv.1

Meeting ID: 842 2392 1074
Passcode: AIPhysics

List of Participants

Participant ID	Full name of the Participant	Gender	Date of Birth	Category
AIP001	Sayali Babarao Dakhole	Female	9/25/1997	Others
AIP002	Rucha S. Joshi	Female	1/11/1997	Others
AIP003	Satish Rangarajan	Male	8/5/1976	Others
AIP004	V. S. Vendamani	Female	7/10/1984	Others
AIP005	Andrews Joseph	Male	1/20/1991	Others
AIP006	Sonal Sharad Kasabe	Female	1/18/1989	Others
AIP007	RASIKA BHARAT GHADAGE	Female	12/26/1997	Others
AIP008	SHYAMALA PRAJAPATI BODHANE	Female	12/18/1961	Others
AIP009	Diksha Dilip Bhatt	Female	5/21/1998	Student
AIP010	Shovna Kaushik	Female	7/18/2004	Student
AIP011	Poonam Sandip Parkar	Female	10/14/1997	Student
AIP012	Roshan Sanjay Fukat	Male	9/28/2003	Student
AIP013	V. Sowmiya	Female	5/29/2003	Student
AIP014	Tuhina Garani	Female	6/15/1999	Student
AIP015	Tara devi	Female	11/15/1993	Student
AIP016	Lakshmi Sangameshwara M S	Female	10/1/2004	Student
AIP017	V.praveen	Male	4/12/2006	Student
AIP018	S.Manoj	Male	5/6/2006	Student
AIP019	V.prakash	Male	4/12/2006	Student
AIP020	Adhiraj Talwar	Male	10/9/2008	Student
AIP021	Bhagydarshan Patil	Male	7/16/2005	Student
AIP022	Rugved more	Male	5/17/2006	Student
AIP023	Aakanksha Pal	Female	11/15/2005	Student
AIP024	Atreya anil mahale	Male	3/23/2009	Student
AIP025	Purvanshu P Bokade	Male	4/22/2005	Student
AIP026	Ajinkya Rajabhau Kale	Male	12/24/2008	Student
AIP027	Nupoor Makarand Lalit	Female	12/13/2005	Student
AIP028	Mrunmayee Prashant Mane	Female	7/16/2010	Student
AIP029	Aayushee Patel	Female	3/27/2005	Student
AIP030	PRITI MANON	Female	3/22/1988	Student
AIP031	Vital Baruah	Female	1/29/2004	Student
AIP032	Unnati Pradip Jethawa	Female	11/5/1998	Student
AIP033	Jerin Elsi Ramya S	Female	12/2/2001	Student
AIP034	YASHAWANTHA Y P	Male	8/11/2000	Student
AIP035	Ananya Pandey	Female	3/14/2004	Student
AIP036	Aatmesh Govind	Male	9/18/2001	Student
AIP037	Shubhangi Anil Nimje	Female	7/13/2001	Student

AIP038	Simran.V.Sobhani	Female	4/13/2007	Student
AIP039	ADITHYA S	Female	7/27/2001	Student
AIP040	SIDDHESHWAR MOHAN NAGPURE	Male	3/12/2002	Student
AIP041	Anuj Kumar	Male	11/20/1999	Student
AIP042	Varalakshmy K	Female	9/29/1998	Student
AIP043	Sreyasi Samanta	Female	7/21/2001	Student
AIP044	Adhavan Arulmozhi S B	Male	3/1/2004	Student
AIP045	Dhruv Ranjit Dhoke	Male	1/9/2003	Student
AIP046	Kumari Akashika Deepak	Female	5/19/2004	Student
AIP047	ADITI ARUNSHANKAR NAIDU	Female	7/28/2006	Student
AIP048	Suvidhi	Female	5/31/2002	Student
AIP049	Tanisha Shukla	Female	9/30/2002	Student
AIP050	Pranav Rawal	Male	6/26/2004	Student
AIP051	Archit Gupta	Male	10/18/2001	Student
AIP052	BALAJEE R	Male	3/21/2002	Student
AIP053	Sunil Anandrao Pandey	Male	6/1/1993	Teacher
AIP054	Dr. Neha Katoch	Female	7/24/1992	Teacher
AIP055	Dr. Brij Mohan	Male	9/28/1984	Teacher
AIP056	Dr. Venkatesh. P.R.	Male	1/8/1975	Teacher
AIP057	KIRAN N	Male	12/31/1991	Teacher
AIP058	Dr.S.Karthikeyan Asst Prof Physics	Male	10/7/1976	Teacher
AIP059	Kamal Singh	Female	11/7/1946	Teacher
AIP060	Sumit Sudhakarrao Bobade	Male	8/2/1995	Teacher
AIP061	RAVINDRA LIMAYE	Male	11/17/1943	Teacher
AIP062	Dr. M Seshu Kumar	Male	6/13/1979	Teacher
AIP063	Mrs. Payaswinee Dhoke	Female	6/9/1986	Teacher
AIP064	Radhika G Deshmukh	Female	10/26/1976	Teacher
AIP065	Saritha K Nair	Female	1/25/1985	Teacher
AIP066	Suvarna Gulabrao Sable	Female	3/10/1986	Teacher
AIP067	Dr. Ananya Phukan	Female	2/26/1989	Teacher
AIP068	Pragati Ashdhir	Female	9/1/1970	Teacher
AIP069	Amandeep Kaur Kalsi	Female	3/30/1989	Teacher
AIP070	Resmi	Female	5/4/1982	Teacher
AIP071	Rajarathinam L	Male	6/26/1971	Teacher
AIP072	Kirtimala Parab	Female	12/29/1982	Teacher
AIP073	Dr Hangshadhar Rajbongshi	Male	5/24/1968	Teacher
AIP074	Rajeev Tyagi	Male	5/23/2024	Teacher
AIP075	Minali Tayal	Female	1/8/1988	Teacher
AIP076	Soumyajyoti Kabi	Male	3/30/1983	Teacher

AIP077	Vaishali Vijaykumar Deshmukh	Female	2/27/1976	Teacher
AIP078	Ankita Sengupta	Female	11/21/1985	Teacher
AIP079	Jayshree Ramesh Patil	Female	3/29/1981	Teacher
AIP080	Gore Renuka Babasaheb	Female	4/29/1989	Teacher
AIP081	Amishi Rindani	Female	11/23/1969	Teacher
AIP082	Dr. S. B. Patil	Male	2/27/1969	Teacher
AIP083	Dr. Dipsikha Kalita	Female	2/28/1976	Teacher
AIP084	Dr. Sarfraj Hisamuddin Mujawar	Male	7/22/1979	Teacher
AIP085	Dr. Mamta Chauhan	Female	7/7/1982	Teacher
AIP086	Dr Pooja Srivastava	Female	4/20/1977	Teacher
AIP087	Dr. Vikaskumar Bhavsar	Male	2/26/1986	Teacher
AIP088	Monisa Rajkhowa	Female	3/15/1969	Teacher
AIP089	Dr. SAPNA SHARMA	Female	8/22/1968	Teacher
AIP090	P. Srinivasa Rao	Male	10/6/1965	Teacher
AIP091	Komal Agnihotri	Female	1/28/1994	Teacher
AIP092	Geetha R S	Female	12/13/1961	Teacher
AIP093	HIMANSHU BEDI	Male	7/30/1981	Teacher
AIP094	Mohammed Khimani	Male	3/24/1986	Teacher
AIP095	Vandna Luthra	Female	4/10/2024	Teacher
AIP096	Shilpa Suraj Gaikwad	Female	10/7/1988	Teacher
AIP097	ASHOK MARUTI DATIR	Male	1/26/1966	Teacher
AIP098	N Manju	Female	4/28/1966	Teacher
AIP099	Naziya sultana mohammed Rafiuddin Shaikh	Female	5/12/1990	Teacher
AIP100	Agatheeshwaran.V	Male	4/2/1999	Teacher
AIP101	BIJAYA KUMAR BHARATI	Male	6/20/1968	Teacher
AIP102	Deepali Gangadhar Dhanwade	Female	11/4/1994	Teacher
AIP103	Prof. P.K. Ahluwalia	Male		Teacher
AIP104	Dr Rupali Jayant Thete	Female	Female	Teacher
AIP105	NITIN JANARDHAN BHAISARE	Male	Male	Teacher
AIP106	Dr. Shilpa Kulkarni	Female	Female	Teacher
AIP107	J. Veerababu	Male	Male	Others
AIP108	Mrunalini Jyotindra Deshmukh	Female	Female	Teacher
AIP109	Bhavana Ashok Phadtare	Female	Female	Student
AIP110	Pankaj A Nagpure	Male	Male	Teacher
AIP111	Shraddha Mahadeo Butte	Female	Female	Teacher
AIP112	Kavitha BS	Female	Female	Teacher
AIP113	Debasish Chabanya	Male	Male	Student
AIP114	Dr Krishnakumar Muthusamy	Male	Male	Teacher
AIP115	Mr. Sanket Shailendra Korde	Male	Male	Student

AIP116	Krishnaja Girish	Female	Female	Student
AIP117	Dr Laxmi Akhilesh Sharma	Female	Female	Teacher
AIP118	Abhijeet Das	Male	Male	Teacher
AIP119	Dr. RUJUTA KEDAR JOSHI	Female	Female	Teacher
AIP120	Aparna Hiraman Jaware	Female	Female	Student
AIP121	NAJIYA K M	Female	Female	Teacher
AIP122	Jayesh Devendra Sawant	Male	Male	Student
AIP123	Vrinda S Raote	Female	Female	Teacher
AIP124	Aman Kumar	Male	**Male**	Student
AIP125	Dr. Asha	Female	10/1/1978	Teacher
AIP126	Dr. Garima Chanana	Female	11/19/1993	Teacher
AIP127	Dr Neetu Verma	Female	10/20/1976	Teacher
AIP128	Dr. (Mrs.) Rohini S. Bhalerao-Panajkar	Female	9/20/1964	Teacher
AIP129	Dr.(Mrs.) Almas Zahir Shaikh	Female	1/7/1985	Teacher
AIP130	Neelam Chavan	Female	3/13/1979	Teacher
AIP131	Dr. Surbhi	Female	Female	Teacher
AIP132	Priyanka	Female	Female	Others
AIP133	Devi Shree E M	Male		Student
AIP134	Prof. PC Deshmukh	Male		Teacher

Feedback from Participants

Out of 134 participants 82 participants provided feedback as follows through the cited link.

https://docs.google.com/forms/d/e/1FAIpQLSeZd_wiU1cG-elLlhZjC1yKqz6lisf5 LLj2ZfCp1EAtGKTzYw/viewform?usp=sf_link

1. On a scale of 1 to 10, how would you rate your overall satisfaction with the content and delivery of today's session? (1 being the lowest, 10 being the highest)
82 responses
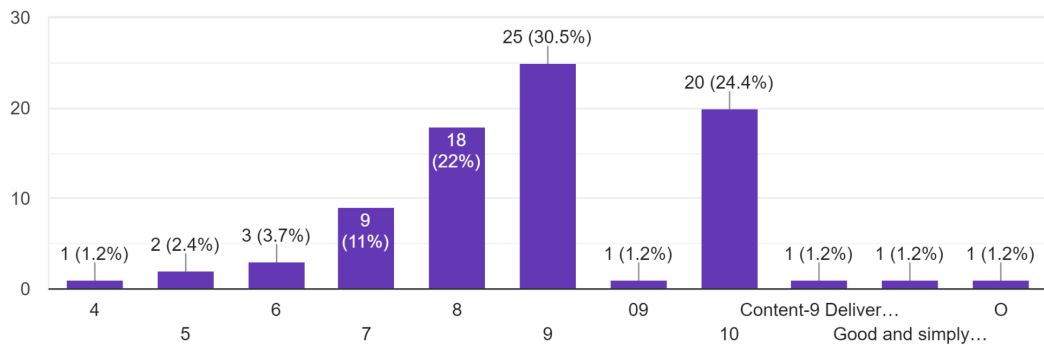
2. To what extent did today's session meet your expectations , on a scale of 1 to 10? (1 being not at all, 10 being fully met)
82 responses

14
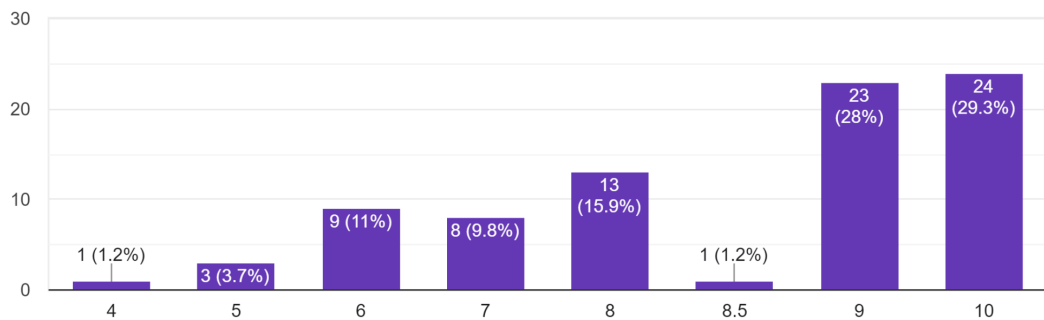
3. How beneficial did you find the practical demonstrations and hands-on coding exercises during today's session, on a scale of 1 to 10? (1 being not beneficial, 10 being highly beneficial)
82 responses
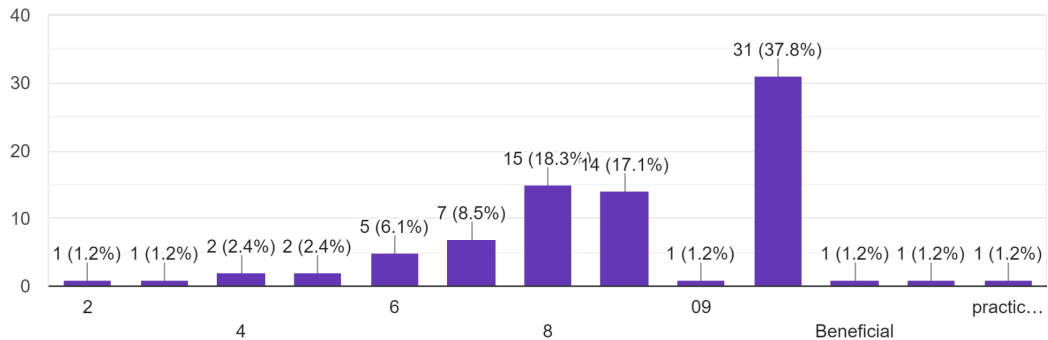
4. On a scale of 1 to 10, how confident do you feel in your ability to apply and practice the concepts covered today ? (1 being not confident at all, 10 being extremely confident)
82 responses
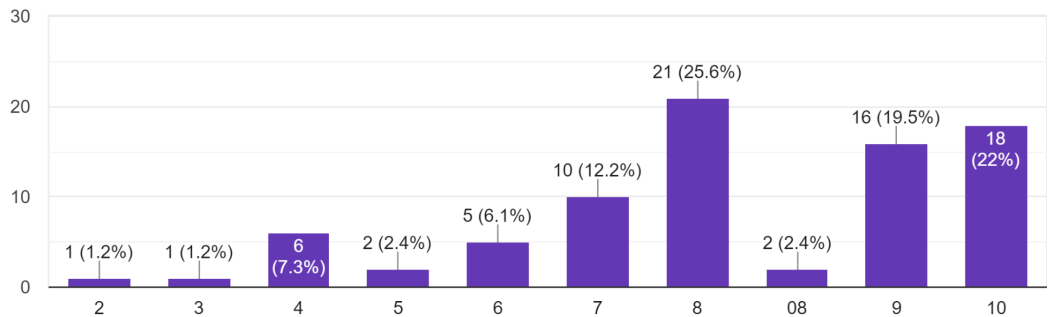
5. What specific areas of today's session do you think was the best learning experience?

82 responses together

Basics, Data types, Python, Detailed explanation, Good explanation, role of AI in day-to-day activities, The basics were helpful., Good initiative. Looking forward to it., python basics, Data Types, Coding Tuple, list, dictionary, One complier, Introduction to colab., Basic python programs, Introduction to Deep learning and Basics of python, Data types, All, All, Program learning or AI deep learning. Python Programming, basic concepts, Session looks effective and hands on practice will play effective role, Basics of Python, Solving and designing small Pgms, basic of variable and string explain with good example., coding part, Concepts that were being taught., Problem practice, Lecture with demonstration, Display of programme output parallel with discussion., basic syntax instructions on python, Identifiers, types of datas and demonstration with examples, Overview of the topics was given. Learn impartence commands while writing the program, The overall flow and the procedure taken for the explainatory purposes., Important points while designing program like variable, comment ,, identifiers. And interactive sessions.,python basic, Basic coding technique, data type, whole

talk Detailed explanation of different terms/commands, Explanation and very clear instructions, playfulness throughout the session., Data type, Showing the results with the program and explaining from the basics, programming, About Lists Tuples Dictionary, Learning basics of python from the expert as a laymen person, wonderful., The whole session was good for learning. With some programming background, it was easy to understand., Explanation very simple. Very useful for beginners like me, I am getting some of the definitions like identifier and so on but how to use them, where to use them what functions will be used where will we use and how and why we will use those to achieve specific goal apart from calculating area of circle, Practical demonstration on command prompt or compiler is required at least for one programme, Whole session was best the pace of learning and the lucid way the various data types were explained with apt examples, Python function, Writing independently the programme with basic concepts., AI FUNDAMENTALS, Practice Problems, Operators, Almost all, Practice problems, Python programming, Prof. Pratibha Rashmi has sincerely delivered the session with multiple programmes related to each topic. It will help to practice it., Lucidly explained. Easily understandable for a beginner like me, PYTHON PROGRAM, Programing using python, The coding was new and the concept was new so it is helpful, Helpful, libraries, Libraries in python, Global and local variables in python, Explanation is very simple and elaborate, Easily understandable

6. Any other remark/suggestion for improvements

63 responses together

No, Nil, no, Good, NA, Satisfied, Tunning time is like attaining endlessly difficult equilibrium., Couldn't see the coding done, the screen wasn't shared maybe. Please look into it the next time., No. Thank you., nil, RP Voice not clearly audible. Please do the needful to fix this. Thank you., Can we get a deeper explanation of runtime in colab and how they can be used?, -, No remarks, because good teaching session., Program was good, None, good learning experience, Tuple and two more topics need to be repeated to revise, please use code side by side while teaching instead of putting it in ppt, All good, Not yet, Should go bit slower specially towards the end., Great work! keep it UP!, NO, No suggestions, More of a hands-on approach will benifit the atendees, content was good. but for beginner speed of the lecture is high, Everything fine, Very nice session, Provided with the time, there is lot to learn from a single lecture itself.. they are so good, Assign work immediately after the workshop., Try to show direct results on the compiler, practica sessions must incresaed, A bit fast.,Request to reduce the pace a little in later concepts., I feel that Hands On session is missing! I could be make more interactive., At least run one or two programmes before going to deep so as to deal with all type of people from school level to apex stake holders, More practice and use of different libraries, More Explanation, Nothing anymore, We need booklet to revise it and session should be delivered slow to understand it., GOOD, No., Actually, the content covered by Prof. Pratibha Rashmi was equivalent to two sessions. It was too much to understand. At the same time, she had opened two windows unnecessarily till end which was uncomfortable to focus on ppt. The topics were covered too fast to note down important info in notebook. The concept and respective examples were not taken simultaneously.,None, Too much topics covered. Anyway it will be helpful as we practice more, Very useful session, Need Hands on training /Practical Session, Include more physics problems, Nice way of teaching, Nice deliberations, Ms. Rashmi needs to be a little clear in the diction. Though at times in her lectures the internet was giving her trouble, which is understandable., Highly satisfied

Instructions to be followed for a smooth and productive experience during the virtual workshop:

1. Join the session on the Zoom platform 5 minutes early to ensure connectivity and proper attendance registration. Zoom links will be shared in the Google Classroom, which will be the same for the week.

2. Enter the Zoom room with your name and participant ID in the format Participant ID_YourFirstName. E.g. AIP001_Mrunmayee

3. Make sure to mute the microphone before entering the room.

4. keep your camera on if possible, as this helps create a more engaging and personal atmosphere. Please note that only do so if you are totally comfortable with the camera on during the lecture.

5. After the lecture, use the Zoom chat feature to ask questions, but try to keep the chat focused on the topic.

6. Due to time constraints, unattended queries will be accepted in Google Classroom immediately after the session has been completed for half an hour, and the resource persons will answer them as soon as they have time.

7. If you have issues during the session, write directly to the coordinator/convener in the chat box.

8. Be respectful to others while posting messages in the chat box. Avoid interrupting or commenting on others.

9. To claim the audited performance certificate, you must attend at least 80% of live sessions and attempt at least 80% of assignments.

10. The assignment session will be on Google Classroom from 6 pm to 6:30 pm. Late submissions will not be accepted.

11. The sessions' recordings, Assignment submission records and Attendance records will be available on Google Classroom by 7 am the following day.

12. The organizers reserve all rights to remove participants for wrongdoing during the session.

13. Participants leaving the session earlier (in between) will be marked Absent.

14. The best participant will be awarded. The criteria for the best participant will be 100% Attendance, 100% Assignment submission.

Proceedings will be followed as below.

1. Keep Google Classroom Open at 6:00 pm sharp from 12 June 2024 onwards till 04 July 2024.(Anushka).

2. Upload Recording and attendance records daily from 11 June 2024 onwards before 7:00 am (Yugansh and AIshvarya)

3. Upload Assignment records and resource material if any daily from 13 June 2024 onwards before 7:00 am (Anushka)

4. Keep Google Classroom open for half an hour after completion of session for submission of queries from 11 June 2024 to 04 July 2024 (Aishvarya)

Proceedings from 11 June 2024 to 04 July 2024
- 6:15 pm Open Zoom for organizers and allow participants at 6:25 pm (MOC)
- MOC- Opening remarks, Declare Session Open
- MOC-Reading Rules to follow
- MOC-Inviting SCOD (Student Coordinator of the Day) to welcome and Introduce Chair Person and Resource Person
- SCOD- Introduce Chair Person and Resource Person. Back to MOC
- MOC- Handover dias to Resource Person
- Resource Person- After Completion Handover to MOC
- MOC-Open Question Answer Session. Invite Yugansh Student Volunteer to Assist
- Yugansh- Coordinate with Resource Person
- Yugansh- On completion (to be decided by you) Handover Dias to MOC
- MOC- Invite President IAPT for remark
- MOC-Invite Chair Person For remark
- MOC- Invite SCOD (Student Coordinator of the Day) for VOT
- SCOD- give VOT handover to MOC
- MOC-Declare Session Closed

Report as News Item for English Daily prepared by Dr Halim Ahmad

The online workshop on "*Developing AI Applications in the Physics Domain with Python,*" was held from June 10th to July 5th, 2024. This workshop was a joint initiative between Sub Regional Council 08E Vidarbha of the Indian Association of Physics Teachers (IAPT) and the Association of All Computer Science Teachers (AACST), under the convenor-ship of Dr. Mrs. Abha Khandelwal, founder of AACST. The workshop spanned four weeks, featuring a total of 20 sessions, each lasting 1.5 hours. The format included a mix of lectures, interactive activities, and hands-on projects, chaired by renowned experts including Dr. Sukhdeo Thorat, Dr. K.G. Rewatkar, and Dr. S.J. Sharma. Sessions were held from 6:30 pm to 8:00 pm, Monday to Friday. Recordings of the video lectures, along with assignments and further study materials, were shared via Google Classroom.

The workshop aimed to equip participants with the fundamentals of Python programming and its application in developing AI tools for physics. Renowned experts, including Dr. Abha Khandelwal, Prof. Manu Pratap Singh (Professor & Director, Department of Computer Science, Agra), Ms. Pratibha Rashmi (Assistant Professor, Dr. Bhimrao Ambedkar University, Agra), Mr. Aditya Singh (Dayalbagh Institute, Agra), and Ms. Ritika Raghav (Dayalbagh Institute, Agra), led the sessions. The interactive and project-based approach fostered a dynamic learning environment, allowing participants to gain practical skills alongside theoretical knowledge.

The workshop successfully attracted a diverse group of participants, including physics teachers and computer science enthusiasts from across the country. Renowned academicians, including Prof. P.K. Ahluwalia (National President of IAPT), Prof. Kamal Singh (former Vice-Chancellor of Sant Gadgebaba Amravati University), and Prof. P.C. Deshmukh (former Professor at IIT Madras), were among the participants. The valedictory function of the workshop was conducted on July 5th, 2024, with Dr. M.P. Dhore, recently appointed Pro-VC of Sant Gadge Baba Amravati University and former Principal of Shree Shivaji Science College, Nagpur, serving as the Chief Guest.

Positive feedback highlighted the effectiveness of the workshop in bridging the gap between AI and physics. Participants expressed their newfound confidence in utilizing Python for building AI-powered physics applications. The "Developing AI Applications in the Physics Domain with Python" workshop proved to be a valuable learning experience for all involved. We are grateful to the esteemed faculty members and the collaborative efforts of IAPT and AACST for making this initiative a success. We look forward to hosting similar workshops in the future to further explore the exciting intersection of AI and physics education.

The planning and technical support provided by Dr. Govinda Lakhotiya, Vice President of SRC-08E, was noteworthy. The dedication and hard work shown by student coordinators Mr. Yugansh, Ms. Aishwarya, and Ms. Anushka, despite their overlapping RTMNU examination schedule, is commendable.

Dr. Halim Ahmad, Secretary, SRC-08 IAPT, and Dr. G.L. Jadhav, Treasurer, SRC-08E IAPT, were the coordinators for the workshop. The workshop was conducted with grand success under the mentorship of P.K. Ahluwaliya, National President of IAPT, Dr. S.W. Anwane, President of SRC-08E IAPT, and Dr. S.B. Kishore, President of AACST.

11-7-2024
Nagpur

Dr. H.S. Ahmad
Secretary, SRC-08-IAPT

A Transformative Journey: Coordinating a 4-Week Workshop on Developing AI Applications in Physics with Python

The convergence of Artificial Intelligence (AI) and Physics holds immense potential for groundbreaking discoveries and innovations. I recently had the privilege of coordinating and acting as the master of ceremonies for a four-week intensive workshop on developing AI applications in the physics domain using Python. This role provided a unique blend of organizational, educational, and leadership experiences.

As the master of ceremonies, I set the tone for the workshop, introduced speakers, and facilitated sessions. This role required a blend of formality and approachability to keep the sessions engaging and on track. Starting each day with a brief overview and ending with a summary helped maintain focus and continuity.

The opening ceremony was particularly memorable, featuring a keynote address by a renowned physicist specializing in AI applications. This set an inspiring tone for the workshop, highlighting the vast potential of AI in transforming physics research.

Seeing participants grow in confidence and competence was immensely gratifying. By the end of the workshop, many had developed sophisticated AI models and could effectively articulate their methodologies and findings.

Coordinating and participating in this workshop was an enriching experience that underscored the transformative power of education and collaboration. The fusion of AI and physics opens new avenues for exploration and innovation, and it was inspiring to witness the participants embrace this challenge with enthusiasm and dedication.

As we move forward, it is essential to continue fostering such interdisciplinary initiatives, empowering the next generation to harness the full potential of AI in solving some of the most complex problems in physics. The journey may be demanding, but the rewards, as I have seen firsthand, are well worth the effort.

I extend my gratitude to the Hon'ble President of IAPT SUB-RC-08-E, Prof. S. W. Anwane, and Dr. Abha Khandelwal of the Association of All Computer Science Teachers (AACST) for providing me the opportunity to serve as a coordinator and master of ceremonies.

Thank you, it was a memorable and wonderful experience.

Dr. G. L. Jadhav
Treasurer
IAPT SRC-08 E

11-7-2024
Nagpur

Dr Gajanan L Jadhav, Coordinator
Treasurer, SRC-08E

Mr Yugansh Kanoje, Student Coordinator expressed his feelings as:

I am B.Sc. First year student at Shri Shivaji Education Society's Science College, Nagpur. I had the pleasure of serving as the student coordinator for the recent 3-week online workshop on *Artificial Intelligence* and *Physics*. This experience proved to be both enriching and challenging, allowing me to develop valuable skills in online content management and editing.

My primary responsibility was to ensure the smooth recording of each workshop session. This involved utilizing the designated platform for recording, troubleshooting any technical difficulties that arose, and verifying the completeness of each captured session. Following each session, I meticulously reviewed the recordings, focusing on clarity and conciseness. Minor edits were made to remove unnecessary pauses or background noises that might hinder the learning experience. Timely upload of the edited recordings was paramount, ensuring participants could access the valuable resource and revisit key concepts and discussions at their convenience.

Through this role, I played a crucial part in facilitating the accessibility of workshop content for all participants. The edited recordings served as a valuable resource, allowing participants to revisit key concepts and discussions presented during the live sessions.

I would like to express my deepest gratitude to Anwane Sir for providing me with this incredible opportunity. Being a part of the AI and Physics workshop not only broadened my understanding of the fascinating intersection between these fields, but also allowed me to develop valuable skills in online content management and editing. This experience has been instrumental in my professional growth, and I am incredibly grateful for the opportunity to contribute to such a successful workshop.

11-7-2024
Nagpur

Yugansh Kanoje
Student Coordinator

Ms Aishwarya P. Mendwade expressed about her journey through this workshop as following:

Myself Aishwarya P. Mendwade, student of B.Sc second year at Shri Shivaji Education Society's Science College, Nagpur.

I worked as student coordinator in an online workshop on developing AI applications in the physics domain with python.

Being a student coordinator for a workshop was a fulfilling experience. It involved organizing, communicating with participants and speakers and ensuring everything ran smoothly.

Because of this opportunity I got a chance to see the relentless efforts that goes behind the curtain to make the program successful.

My routine work is to manage attendance records of the participants, through this I understood the efforts of our teachers taking attendance daily.

Our periodic work in a workshop is to introduce a resource person, chairperson and propose a vote of thanks. This activity boosted my confidence and surely this will help me in my future endeavors.

Because of this workshop I learned valuable skills in event management, teamwork and communication.

Balancing responsibilities with my studies was challenging but rewarding , as I learnt many new things and saw the workshop succeed.

I am very thankful to Prof. Anwane sir for believing in me and giving me this opportunity , thank you so much sir for giving me chance to see the hard work of team

It was a great experience.

Thank you!

11-7-2024
Nagpur

Ms Aishwarya P. Mendwade
Student Coordinator

Ms Anushka Palandurkar expressed her journey through this workshop as following:

I am Anushka Palandurkar, a second-year B.Sc. student at Shri Shivaji Education Society's Science College, Nagpur.

It was my privilege to be part of the workshop. As a student coordinator, I learned valuable management and real-life skills to tackle problems. Dr. Abha Khandelwal was our pillar of strength, explaining every bit of work with calmness, which helped us work more efficiently.

Being a graduate student, it was an honor to meet such experienced personalities from all over India. Interacting with them gave us a different perspective on learning. I sincerely thank Prof. S. W. Anwane for giving me this opportunity. It was like an open gate of knowledge and experience.

Thank you so much to all the coordinators of the workshop for making this one month feel so smooth and exciting.

11-7-2024
Nagpur

Ms Anushka Palandurkar
Student Coordinator

Report in Marathi for local news papers

इंडियन एसोसिएशन ऑफ फिजिक्स टीचर्स (IAPT) उप-क्षेत्रीय परिषद विदर्भ SRC-08 E आणि ऑल कॉम्प्युटर सायन्स टीचर्स असोसिएशन (AACST) यांनी संयुक्तपणे 10 जून ते 5 जुलै 2024 दरम्यान "पायथनसह फिजिक्स डोमेनमध्ये AI अनुप्रयोग विकसित करण्याच्या" 21 दिवसांच्या कार्यशाळेचे आयोजन केले. या कार्यशाळेत 134 सहभागींनी 21 व्याख्यानांसाठी नोंदणी केली होती, प्रत्येक व्याख्यान 90 मिनिटांचे होते आणि 18 असाइनमेंट्स देखील दिल्या होत्या.

पायथन वापरून AI अनुप्रयोग विकसित करण्याचे ज्ञान देण्याच्या या महत्वाकांक्षी प्रकल्पामध्ये 134 सहभागींमध्ये माजी कुलगुरू, प्राध्यापक, शिक्षक, संशोधक, आणि STD X पासून PG पर्यंतचे विद्यार्थी यांचा समावेश होता, ज्यामध्ये IAPT अध्यक्ष प्रा. पी. के. आहलुवालिया यांचाही समावेश होता. कार्यशाळा यशस्वीपणे पूर्ण केल्यावर प्रमाणपत्र दिले गेले. या उपक्रमामध्ये खालील तज्ज्ञ व्यक्ती संसाधन म्हणून समाविष्ट होत्या; (i) प्रा. मनु प्रताप सिंग (ii) डॉ. आभा खंडेलवाल माजी प्राध्यापक, संगणक विज्ञान (iii) सुश्री प्रतिभा रश्मी – सहायक प्राध्यापक, डॉ. भीमराव आंबेडकर विद्यापीठ, आग्रा (iv) श्री. आदित्य सिंग, दयालबाग संस्था आग्रा (v) सुश्री कृतिका राघव, दयालबाग संस्था आग्रा.

कार्यशाळेचे प्रभावीपणे समन्वयन केले गेले (i) प्रा. आभा खंडेलवाल - कार्यशाळेच्या संयोजिका आणि SRC-08E चे EC सदस्य, (ii) डॉ. हलीम अहमद - समन्वयक (कार्यशाळा), सचिव SRC-08E, (iii) डॉ. गजानन जाधव, समन्वयक (कार्यशाळा), खजिनदार SRC-08E. डॉ. गोविंद लाखोटिया, उपाध्यक्ष SRC-08E यांनी यशस्वी आयोजनासाठी सर्व मागील पडद्यामागील क्रियाकलापांचे समन्वयन केले. या उपक्रमात श्री शिवाजी विज्ञान महाविद्यालय, नागपूरचे UG विद्यार्थी सहभागी होते; युगांश कानोजे, सुश्री. ऐश्वर्या मेंडावडे, सुश्री. अनुष्का पलंदुरकर.

10 जून 2024 रोजी संध्याकाळी 6:30 वाजता ऑनलाइन पद्धतीने उद्घाटन सोहळा आयोजित केला गेला, ज्याचे अध्यक्ष IAPT अध्यक्ष प्रा. पी. के. आहलुवालिया होते. प्रा. आभा खंडेलवाल यांनी कार्यशाळेच्या संयोजिका म्हणून उद्घाटन भाषण दिले. SRC-08 E चे अध्यक्ष प्रा. श्यामकांत अनवाने यांनी स्वागत भाषण केले. अध्यक्षीय भाषणात प्रा. आहलुवालिया यांनी या वर्षातील आधीच्या कार्यक्रमांचे आयोजन केलेल्या SRC-08E च्या प्रयत्नांचे कौतुक केले आणि सध्याच्या कार्यशाळेचे आयोजन सुरू केल्याबद्दल आनंद व्यक्त केला. प्रोफेसर सुर्यकांत थोरात, संचालक, तंत्रज्ञान आणि व्यवस्थापन संस्था नांदेड यांनी पहिले सत्र अध्यक्ष केले, ज्याचे व्याख्यान प्रा. मनु प्रताप सिंग, आग्रा यांनी दिले.

"पायथनसह फिजिक्स डोमेनमध्ये AI अनुप्रयोग विकसित करण्याच्या" कार्यशाळेचे समारोप 5 जुलै 2024 रोजी सर्व सहभागी आणि संसाधन व्यक्तींच्या उपस्थितीत समारोप सोहळ्यासह झाला. 5 जुलै 2024 रोजी समारोप समारंभात संयोजिका डॉ. आभा खंडेलवाल यांनी भाषण दिले. त्यांनी कार्यशाळेच्या यशस्वी आयोजनाचा आढावा घेतला. त्यांनी संसाधन व्यक्ती, शिक्षक आणि विद्यार्थी समन्वयकांचे कौतुक केले.

डॉ. जी. एल. जाधव यांनी संयोजकाची भूमिका निभावली आणि डॉ. गोविंद लाखोटिया, उपाध्यक्ष SRC-08E यांना उप-क्षेत्रीय परिषदेच्या वतीने स्वागत भाषण देण्यासाठी आमंत्रित केले. आपल्या भाषणात उपाध्यक्ष डॉ. गोविंद लाखोटिया यांनी कार्यशाळेच्या आयोजनाचे कौतुक केले.

सन्माननीय संसाधन व्यक्तींमध्ये प्रा. मनु प्रताप सिंग, सुश्री प्रतिभा रश्मी (सहायक प्राध्यापक, डॉ. भीमराव आंबेडकर विद्यापीठ, आग्रा), श्री. आदित्य सिंग (दयालबाग संस्था आग्रा), आणि सुश्री कृतिका राघव (दयालबाग संस्था आग्रा) यांचा समावेश होता.

कार्यशाळेचे प्रमुख पाहुणे, प्रा. महेंद्र पी. धोरे, PRO-VC, SGB अमरावती विद्यापीठ, अमरावती होते. कार्यक्रमाचे अध्यक्ष प्रा. पी. के. आहलुवालिया, IAPT अध्यक्ष आणि कार्यशाळेतील सहभागी होते. डॉ. गोविंद लाखोटिया, उपाध्यक्ष SRC-08E यांनी प्रास्ताविक केले, तर डॉ. आभा खंडेलवाल, कार्यशाळेच्या संयोजिका, EC-SRC-08E आणि AACST चे संस्थापक यांनी आपल्या संयोजिका म्हणून भाषण केले.

प्रा. वंदना लुथरा यांनी सहभागी म्हणून आपले विचार शेअर केले, आणि प्रा. ऋतिका राघव यांनी संसाधन व्यक्तींच्या वतीने आपल्या भावना व्यक्त केल्या. डॉ. जी. एल. जाधव यांनी संयोजकाची भूमिका निभावली आणि डॉ. हलीम अहमद, सचिव SRC-08E यांनी आभार प्रदर्शन केले.

विद्यार्थी समन्वयक श्री. युगांश कानोजे, सुश्री ऐश्वर्या मेंडावडे, आणि सुश्री अनुष्का पलंदुरकर यांच्या योगदानाचे सर्व स्टेकहोल्डर्सनी कौतुक केले. प्रा. आहलुवालिया यांनी विदर्भ SRC-08E च्या तरुण उप-क्षेत्रीय परिषदेचे 21 दिवसांच्या दीर्घ उपक्रमाचे यशस्वी समन्वयन केल्याबद्दल प्रशंसा केली, ज्यात ते दररोज सहभागी म्हणून सहभागी झाले होते.

11-07-2024
नागपूर

Prof. S. W. Anwane
President
IAPT SRC-08 E

प्रा. श्यामकांत अनवाणे
अध्यक्ष, **SRC-08E**

Some Clicks

Dr M P Dhore, Pro Vice Chancellor, SGB Amravati University, Amravati

Prof P K Ahluwalia, President IAPT during his deliberation in Valedictory Function

Dr G L Jadhav and Dr Halim Ahamad office bearers of IAPT-SRC08 E

Thank you. Thank you so much.
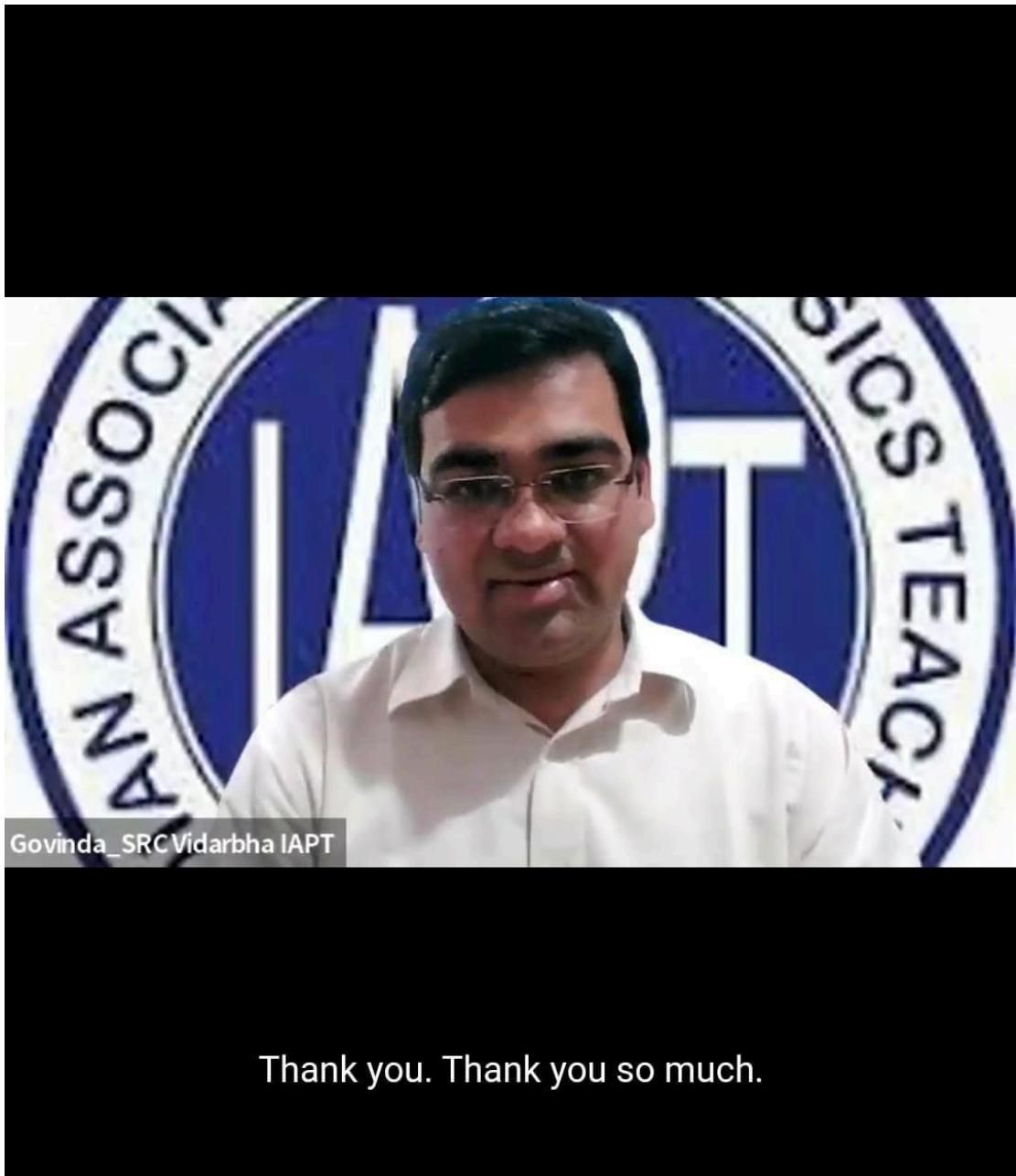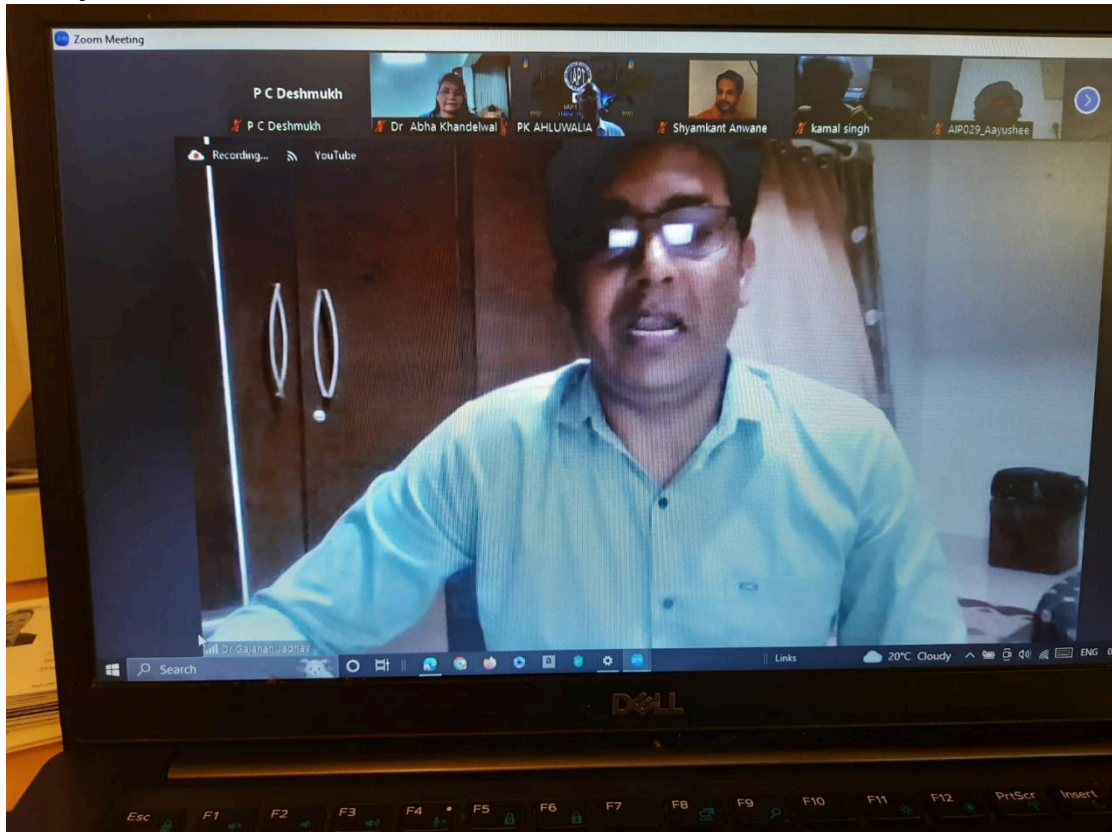
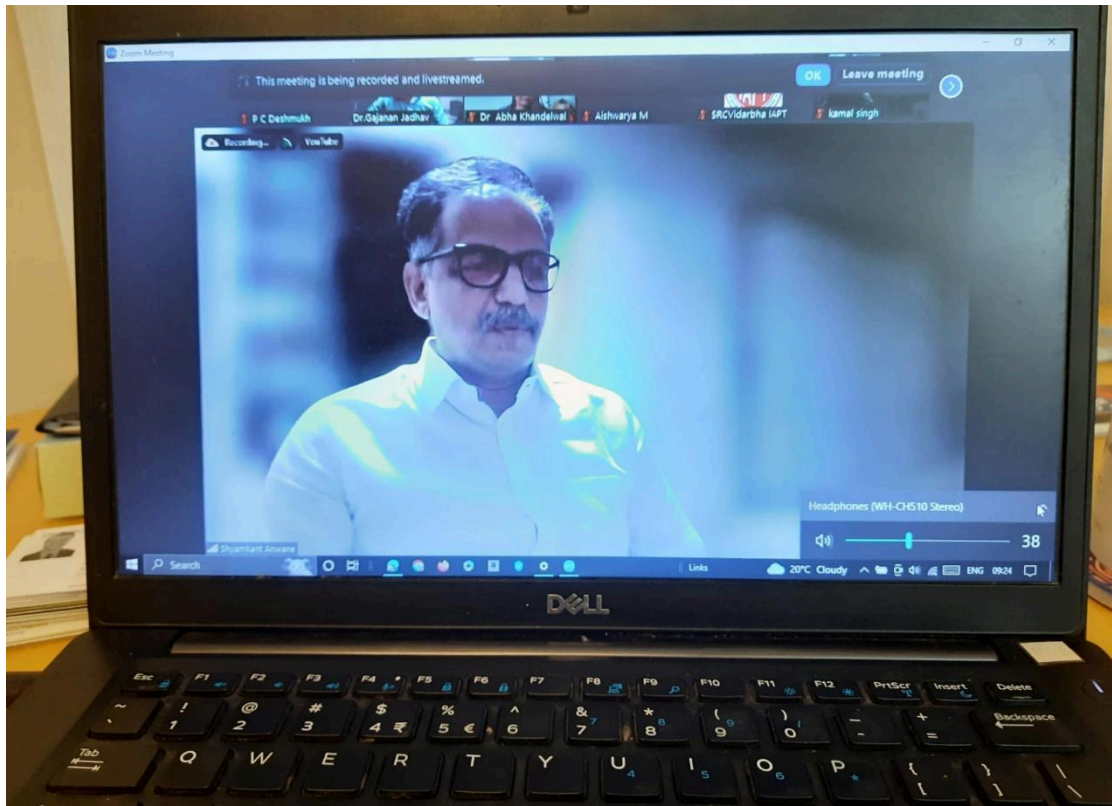*Dr Govind Lakhotiya Vice-President IAPT-SRC08 E*

Group Photograph
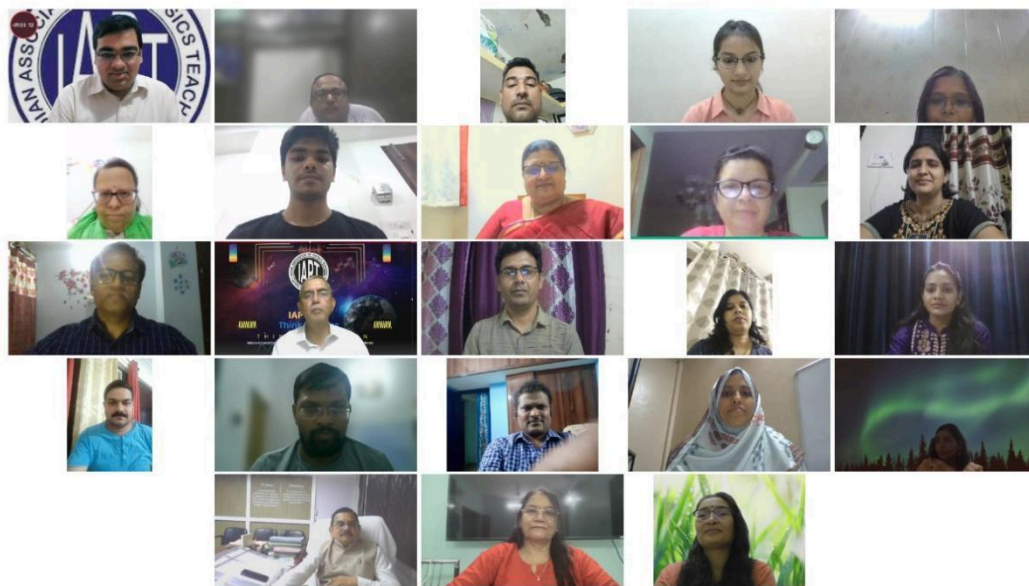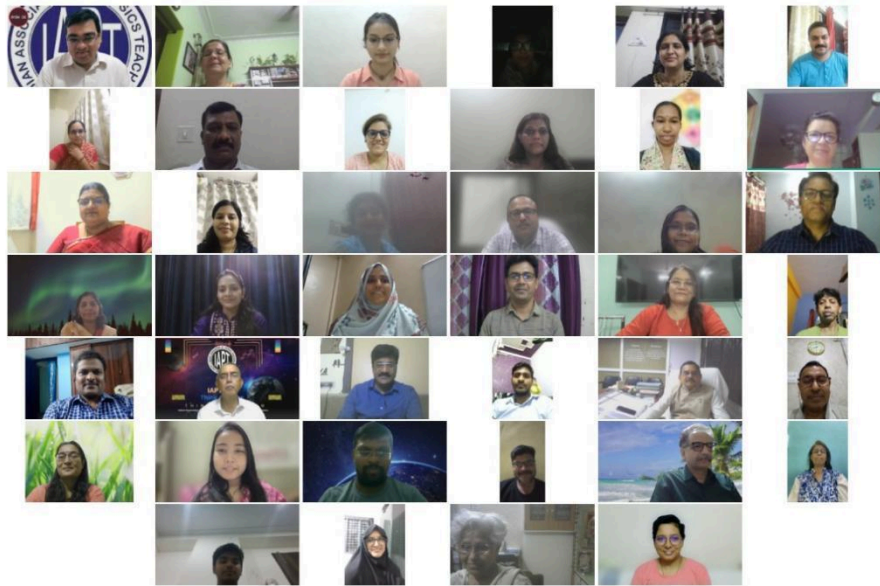
Dr Abha Khandelwal, Convener of Workshop and EC Member SRC-08E IAPT, Founder-AACST.

Dr Gajanan Jadhav, Treasurer, IAPT-SRC-08E

Prof S W Anwane, President, IAPT-SRC-08E

Dr S B Kishor, President-AACST

Table Programme

Sr No	Time	Item
-3: Workshop on **Developing AI applications in the Physics domain with Python**		
1	18:15	Joining on Zoom Link - Panelists, Coordinators team, Office bearers https://us06web.zoom.us/j/84223921074?pwd=O6jWcF7YgJa6USef49EcBHMCaP32uv.1 User Name: 842 2392 1074 Password: AIPhysics
2	18:25	Joining of Participants
-3: **INAUGURATION – MoC (Dr G L Jadhav) 10-06-2024 6:30 pm**		
3	18:30	● Welcome to all the participants and dignitaries by Master of Ceremony Dr G L Jadhav and request P K Ahluwalia sir to preside over the function ● Prof P K Ahluwalia, President IAPT ● Prof Suryakant Thorat, Session Chair ● Prof S W Anwane, President SRC-08E ● Prof Abha Khandelwal, Convener (Workshop), EC- SRC-08E & Founder AACST ● Prof Manu Kumar, Director of Institute of Engineering & Technology – Dr. Bhimrao Ambedkar University, Agra ● Prof S B Kishor – President AACST ● Dr Halim Ahmad, Coordinator (Workshop), Secretary- SRC-08E ● Dr Gajanan, Coordinator (Workshop), Treasurer- SRC-08E ● Yugansh Kanoje, Aaishverya Mendawade, Anushka Palandurkar – Student coordinators ● All resource persons – (i) Ms Pratibha Rashmi – Assistant Professor, Dr. Bhimrao Ambedkar University, Agra (ii) Mr Aditya Singh, Dayalbagh Institute Agra (iii) Ms Ritika Raghav , Dayalbagh Institute Agra ● All participants of the Workshop
	18:32	Dr G L Jadhav will call Aishwarya to Introduce Abha Khandelwal to the audience. Aishwarya after reading Introduction will invite Abha Khandelwal for her Remarks
	18:33-18:38	Introductory Remark by Abha Khandelwal
	18:38-18:40	GLJ will call S W Anwane for a welcome address on behalf of SRC-08E with his introduction in 4/5 sentences
	18:40-18:42	GLJ will request Anushka to introduce P K Ahluwalia sir and call him to deliver Presidential Address
	18:42-18:50	**Presidential Address by Prof P K Ahluwalia**
	18:50	GLJ will request Prof Suryakant Thorat to chair the session and call Dr **Halim Ahmad** to (i) Introduce the Session chair to Prof Suryakant Thorat, Director Institute of Technology & Management, Nanded. **Dr Halim Ahmad will call Aishwarya to** (ii) Introduce Resource Person **Prof Manu Pratap Singh**, Professor and Director, Institute of Engineering and Technology, Dr. Bhimrao Ambedkar University, Agra and request to Prof

		<u>Suryakant Thorat sir for opening remarks</u> and for the further proceedings
	18:52-18:55	Opening Remarks of Session Chair – Prof Suryakant Thorat Call to Prof Manu Pratap Singh
	18:55-19:40	**Deliberation by Prof Manu Pratap Singh**
	19:40-19:42	Dr GLJ will request Anushka to introduce Resource person Ms Pratibha Rashmi for Training Session
	19:42-19:55	Training Session on Working with One Compiler and colab
	19:55	Concluding Remarks by Session Chair and interaction of participants with Resource Person through Questions & Answers coordinated by Yugansh through chat box.
	20:05	Vote of Thanks by Prof Halim Ahmad

Instructions for participants will be read on the next day by Aishwarya.

Table Programme - Valedictory Function

		Workshop on **Developing AI applications in the Physics domain with Python**
Sr No	Time	Item
1	18:15	Joining on Zoom Link - Panelists, Coordinators team, Office bearers https://us06web.zoom.us/j/84223921074?pwd=O6jWcF7YgJa6USef49 EcBHMCaP32uv.1 User Name: 842 2392 1074 Password: AIPhysics
2	18:25	Joining of Participants
		VALEDICTORY FUNCTION – MoC (Dr G L Jadhav) 05-07-2024 6:30 pm - 8:35 pm
3	18:30	- Welcome to all the participants and dignitaries by Master of Ceremony **Dr G L Jadhav** and request **P K Ahluwalia** sir to preside over the function **Prof P K Ahluwalia,** President IAPT **Prof Mahendra P Dhore,** Chief Guest, PRO-VC, SGB Amravati University, Amravati **Dr Govinda Lakhotiya**, Vice-President SRC-08E **Dr Abha Khandelwal**, Convener (Workshop), EC- SRC-08E & Founder AACST **Dr S B Kishor** – President AACST **Dr Halim Ahmad**, Coordinator (Workshop), Secretary-SRC-08E **Dr Gajanan Jadhav**, Coordinator (Workshop), Treasurer-SRC-08E **Yugansh Kanoje, Aaishverya Mendawade, Anushka Palandurkar** – **Student coordinators** - All resource persons – (i) **Prof Manu Pratap Singh** (ii) **Ms Pratibha Rashm**i – Assistant Professor, Dr. Bhimrao Ambedkar University, Agra (iii) **Mr Aditya Singh,** Dayalbagh Institute Agra (iv) **Ms Ritika Raghav** , Dayalbagh Institute Agra - All participants of the Workshop
	18:32-18:33	**Dr G L Jadhav** will call convener **Dr Abha Khandelwal** for her report
	18:33-18:43	Address by Convener **Dr Abha Khandelwal**
	18:44-18:45	**Dr G L Jadhav** will call **Dr Govinda Lakhotiya**, Vice-President SRC-08E for a welcome address on behalf of SRC-08E. GLJ will express a couple of lines for Dr Lakhotiya.
	18:45-18:54	Address by Vice-President **Dr Govinda Lakhotiya**
	18:55-19:00	**Dr G L Jadhav** will call **Prof Vandna Luthera** Participant, to share her remarks on behalf of the Participant.
	19:01-19:06	**Dr G L Jadhav** will call **Ritka Raghav** from the Resource Person Team to share her views.
	19:07:19:10	**Dr G L Jadhav** will call **Ms Aishwarya Mendwde** to introduce **Pro VC Prof M P Dhore** to the audience, and after the introduction, Ms Aishwarya Mendwde will request **Prof M P Dhore** to deliver his address.

	19:10-19:20	Address by chief Guest **Prof M P Dhore**
	19:21:19:21	**Dr G L Jadhav** will request **Prof P K Ahluwalia** sir and call him to deliver Presidential Address
	19:21-19:31	**Presidential Address by Prof P K Ahluwalia on Valedictory Function**
	19:32-19:37	Vote of Thanks by **Prof Halim Ahmad Part I**
END of Part I Valedictory Function. Chief Guest and Resource Persons will be free to leave		
	19:38-20:30	**Dr G L Jadhav** will request **Yugansh** to run video on AI in Physics
	20:31-20:31	**Dr G L Jadhav** will request **Prof Halim Ahmad** for Vote of Thanks.
	20:32-20:35	Vote of Thanks by **Prof Halim Ahmad Part II**

Indian Association of Physics Teachers (IAPT)
SRC08E (Vidarbha)
In Association With
Association of All Computer Science Teachers (AACST)

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Online Workshop on Developing AI Applications in the Physics domain with Python

Join our Virtual Workshop for a dynamic course integrating Python programming and AI. Gain practical skills highly sought after in today's tech world. Delve into the captivating realm of physics alongside a national assembly of intellectual luminaries, adept not only in the intricate nuances of AI and Python programming but also in unraveling the mysteries of the cosmos with profound expertise and finesse. Don't miss this exclusive opportunity!

June 10th to July 5th, 2024 (4 weeks)

6:30 PM to 8:00 PM
Monday to Friday

Online via Zoom

Eligibility: 8th standard & Above
Anyone including a teacher/faculty can register

First come, first serve basis
(Hurry! Limited Slots Available)

Registration Fee
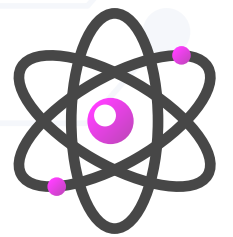₹1000 per participant

Registration Link:
https://forms.gle/dGeJaK9VRve5FzDz8

Scan Here for Registration

Course Highlights

- Master Python tailored for physics applications
- Integrate AI with Physics
- Explore Cutting Edge Concepts
- Guidance from experienced faculty experts in the field
- Certificate on Completion of course

Course Outcomes

Acquire proficiency in Python programming tailored for physics applications, including data handling, visualization, and integration with AI methodologies, spanning from traditional machine learning to cutting-edge deep learning techniques.

Scan here to pay

11571520@cbin

Convener:
Dr. Abha Khandelwal EC, IAPT SRC08E & FOUNDER AACST

Coordinators:
Dr. Halim Ahamad, Secretary, IAPT, SRC-08 E (+91 93722 33844)
Dr. G L Jadhav, Treasurer, IAPT, SRC-08 E (+91 9579194076)

Student Coordinators:
Yugansh Kanoje (+91 93092 71163)
Aishwarya Mendawade (+91 86682 47334)
Anushka Palandurkar (+91 76665 71986)

Resource Persons:
Dr. Abha Khandelwal, Retd. Head of the Department of Computer Science, Hislop College, Nagpur.
Prof. Manu Pratap Singh, Professor and Director, Institute of Engineering and Technology, Dr. Bhimrao Ambedkar University, Agra.
Ms. Pratibha Rashmi, Assistant Prof, Dr. B R Ambedkar University, Agra.
Mr Aditya Singh, Visiting Lecturer, Dept of Physics, Dayalbagh Educational Institute, Dayalbagh, Agra.
Ms. Ritika Raghav, Research Scholar, Dayalbagh Educational Institute, Agra.

Mentors:
Prof. P. K. Ahluwalia, Central President, IAPT
Dr. S. B. Kishor, President AACST
Prof. S. W. Anwane, President, IAPT SRC 08E

Scan Here for More Information

https://bit.ly/3UF7Z78

Indian Association of Physics Teachers

Registered under section XXI of Societies Act 1860, Reg. No. K-1448

Sub-Regional Council of Maharashtra SRC-08 E (Vidarbha)

Prof S. W. Anwane
President
9422122711

Dr G. Lakhotiya
Vice-President
9579194076

Dr Halim Ahamad
Secretary
9372233844

Dr G. L. Jadhav
Treasurer
9765583480

Executive Council Members SRC-08 E (Vidarbha)

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Nagpur
9665045780

Dr. Ajay Lad
Yavatmal
9822460072

Dr. Pankaj Nagpure
Amravati
9404376940

Dr. A. Bajpeyee
Amravati
9422157797

Dr. Amol Nande
Ballarpur
7219436824

Shashank Deshpande
Nagpur
9881001204

Lt. Dr. Prashant Ambekar
Nagpur
7776899668

Executive Council Members RC-08 (Maharashtra)

Dr. R. M. Shewale
President RC-08
94239 16066

Dr. Lata D. Jadhav
Secretary RC-08
98906 94409

Mr. S. J. Patil
Treasurer RC-08
98507 85615

09-06-2024

To
Prof P K Ahluwalia
President, IAPT

Sub : request to preside over the inaugural function of the Workshop on Developing AI applications in the physics domain with Python on 10th June 2024 at 6:00 pm

Respected sir,

On behalf of Sub Regional Council for Vidarbha (Maharashtra) SRC-08 E, we are happy to request you to preside over the inaugural function of the Workshop on Developing AI applications in the physics domain with Python on 10th June 2024 at 6:00 pm

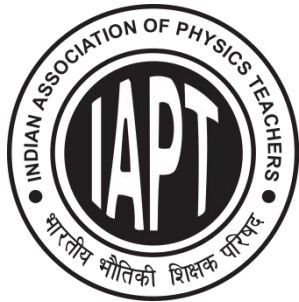We feel blessed to have you as President of IAPT as well as the enrolled participant in the said workshop.

We all experience your support in all baby steps of SRC-08E.

Looking forward to seeing you in the online programme.

REGARDS!

Yours Faithfully,

Prof. S. W. Anwane
President
IAPT SRC-08 E

Indian Association of Physics Teachers

Registered under section XXI of Societies Act 1860, Reg. No. K-1448

Sub-Regional Council of Maharashtra SRC-08 E (Vidarbha)

Prof S. W. Anwane	**Dr G. Lakhotiya**	**Dr Halim Ahamad**	**Dr G. L. Jadhav**
President	*Vice-President*	*Secretary*	*Treasurer*
9422122711	9579194076	9372233844	9765583480

Executive Council Members SRC-08 E (Vidarbha)

Dr. Abha Khandelwal
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94239 16066

Dr. Lata D. Jadhav
Secretary RC-08
98906 94409

Mr. S. J. Patil
Treasurer RC-08
98507 85615

09-06-2024

To
Prof Manu Pratap Singh
Professor and Director
Institute of Engineering and Technology
Dr. Bhimrao Ambedkar University
Agra

Sub : request to join the inaugural function of the Workshop on **Developing AI applications in the physics domain with Python** on 10th **June 2024 at 6:00 pm**

Respected sir,

On behalf of Sub Regional Council for Vidarbha (Maharashtra) SRC-08 E,

we are pleased to invite you join the inaugural function of the Workshop

on Developing AI applications in the physics domain with Python **on 10th**

June 2024 at 6:00 pm.

We all experience your support in all walks.

Looking forward to seeing you in the online programme.

 REGARDS!

Yours Faithfully,

Prof. S. W. Anwane
President
IAPT SRC-08 E

Online Workshop on Developing AI Applications in the Physics domain with Python

To,   **Date: 10 June 2024**
Dr Suryakant Thorat
Director, Shri Sharda Bhavan Education Society's Institute of Technology & Management,
Nanded.

Subject: Appreciation for Chairing the Session Online Workshop on "Developing AI Applications in Physics Domain using Python"

Dear Sir,

We are honoured to thank you for chairing the "Developing AI Applications in Physics Domain using Python" workshop on Session **01- 10 June 2024.** This workshop was jointly organised by the Indian Association of Physics Teachers (IAPT) Vidarbha Region (SRC08e) and the Association of All Computer Science Teachers (AACST).

Your invaluable expertise, insightful contributions, and dedication were instrumental in the success of this event. Your efforts have made a lasting impact on the attendees and have furthered the cause of fostering interdisciplinary learning and collaboration among educators and practitioners in physics and computer science.

We look forward to your continued support and collaboration in future endeavours.

Thank you very much.   With Regards

Dr. Abha Khandelwal   **Prof S W Anwane**
Convener & Founder AACST   **President IAPT SRC08e**
EC IAPT SRC08e

Indian Association of Physics Teachers (IAPT)
SRC08E (Vidarbha)
In Association With
Association of All Computer Science Teachers (AACST)

Online Workshop on Developing AI Applications in the Physics domain with Python

To,   **Date: 11 June 2024**
Prof Dr Sumeet Gill,
Department of Mathematics, Maharshi Dayanand University,
 Rohtak Haryana.

Subject: Appreciation for Chairing the Session Online Workshop on "Developing AI Applications in Physics Domain using Python"

Dear Sir,

We are honoured to extend our heartfelt appreciation to you for chairing the session workshop on "Developing AI Applications in Physics Domain using Python" held on **Session 02- 11 June 2024.** This workshop was jointly organised by the Indian Association of Physics Teachers (IAPT) Vidarbha Region (SRC08e) and the Association of All Computer Science Teachers (AACST).

Your invaluable expertise, insightful contributions, and dedication were instrumental in the success of this event. Your efforts have made a lasting impact on the attendees and have furthered the cause of fostering interdisciplinary learning and collaboration among educators and practitioners in physics and computer science.

We look forward to your continued support and collaboration in future endeavours.

Thank you very much.   With Regards

Dr. Abha Khandelwal   **Prof S W Anwane**
Convener & Founder AACST   **President IAPT SRC08e**
EC IAPT SRC08e

Online Workshop on Developing AI Applications in the Physics domain with Python

To,   **Date: 12 June 2024**
Prof Vandna Luthra
Gargi College Siri Fort Road New Delhi

Subject: Appreciation for Chairing the Session Online Workshop on "Developing AI Applications in Physics Domain using Python"

Dear Madam,

We are honoured to thank you for chairing the workshop on "Developing AI Applications in Physics Domain using Python" on Session **03- 12 June 2024.** This workshop was jointly organised by the Indian Association of Physics Teachers (IAPT) Vidarbha Region (SRC08e) and the Association of All Computer Science Teachers (AACST).

Your invaluable expertise, insightful contributions, and dedication were instrumental in the success of this event. Your efforts have made a lasting impact on the attendees and have furthered the cause of fostering interdisciplinary learning and collaboration among educators and practitioners in the fields of physics and computer science.

We look forward to your continued support and collaboration in future endeavours.

Thank you very much.   With Regards

Dr. Abha Khandelwal   **Prof S W Anwane**
Convener & Founder AACST   **President IAPT SRC08e**
EC IAPT SRC08e

Indian Association of Physics Teachers (IAPT)
SRC08E (Vidarbha)
In Association With
Association of All Computer Science Teachers (AACST)

@40

Online Workshop on Developing AI Applications in the Physics domain with Python

To,   **Date: 13 June 2024**
Prof Ramesh Manza
Department of Computer Science and Information Technology,
Dr. Babasaheb Ambedkar Marathwada University,
Aurangabad

Subject: Appreciation for Chairing the Session Online Workshop on "Developing AI Applications in Physics Domain using Python"

Dear Sir,

We are honoured to extend our heartfelt appreciation to you for chairing the workshop on "Developing AI Applications in Physics Domain using Python" on **Session 04- 13 June 2024.** This workshop was jointly organised by the Indian Association of Physics Teachers (IAPT) Vidarbha Region (SRC08e) and the Association of All Computer Science Teachers (AACST).

Your invaluable expertise, insightful contributions, and dedication were instrumental in the success of this event. Your efforts have made a lasting impact on the attendees and have furthered the cause of fostering interdisciplinary learning and collaboration among educators and practitioners in physics and computer science.

We look forward to your continued support and collaboration in future endeavours.

Thank you very much.   With Regards

Dr. Abha Khandelwal   **Prof S W Anwane**
Convener & Founder AACST   **President IAPT SRC08e**
EC IAPT SRC08e

Online Workshop on Developing AI Applications in the Physics domain with Python

To,   **Date: 14 June 2024**
Prof Satish Sharma
Head, Department of Electronics and Computer Science,
Director of Inter Institutional Computer Centre
Director, IT Cell of the RTM Nagpur University, Nagpur

Subject: Appreciation for Chairing the Session Online Workshop on "Developing AI Applications in Physics Domain using Python"

Dear Sir,

We are honoured to extend our heartfelt appreciation to you for chairing the session workshop on "Developing AI Applications in Physics Domain using Python" held on Session **05- 14 June 2024**. This workshop was jointly organised by the Indian Association of Physics Teachers (IAPT) Vidarbha Region (SRC08e) and the Association of All Computer Science Teachers (AACST).

Your invaluable expertise, insightful contributions, and dedication were instrumental in the success of this event. Your efforts have made a lasting impact on the attendees and have furthered the cause of fostering interdisciplinary learning and collaboration among educators and practitioners in physics and computer science.

We look forward to your continued support and collaboration in future endeavours.

Thank you very much.   With Regards

Dr. Abha Khandelwal   **Prof S W Anwane**
Convener & Founder AACST   **President IAPT SRC08e**
EC IAPT SRC08e

Online Workshop on Developing AI Applications in the Physics domain with Python

17 June 2024

Dr Sarmistha Sahu,
Retd. Prof of Physics, Maharani lakshmi ammanni college for women,Coordinator ,Ammanni IAPT Anveshika (Wing of NANI, Indian Association of Physics Teachers) Bangalore 560097

 Subject: Appreciation for Chairing the Session Online Workshop on "Developing AI Applications in Physics Domain using Python"

Dear Madam,

We are honoured to thank you for chairing the "Developing AI Applications in Physics Domain using Python" workshop on Session **06- 17 June 2024.** This workshop was jointly organised by the Indian Association of Physics Teachers (IAPT) Vidarbha Region (SRC08e) and the Association of All Computer Science Teachers (AACST).

Your invaluable expertise, insightful contributions, and dedication were instrumental in the success of this event. Your efforts have made a lasting impact on the attendees and have furthered the cause of fostering interdisciplinary learning and collaboration among educators and practitioners in physics and computer science.

We look forward to your continued support and collaboration in future endeavours.

Thank you very much.   With Regards

Dr. Abha Khandelwal   **Prof S W Anwane**
Convener & Founder AACST   **President IAPT SRC08e**
EC IAPT SRC08e

Online Workshop on Developing AI Applications in the Physics domain with Python

18 June 2024

Dr. L.D. Jadhav
Head, Department of Physics, Rajaram College,
Kolhapur

Subject: Appreciation for Chairing the Session Online Workshop on "Developing AI Applications in Physics Domain using Python"

Dear Madam,

We are honoured to thank you for chairing the "Developing AI Applications in Physics Domain using Python" workshop on Session **07- 18 June 2024.** This workshop was jointly organised by the Indian Association of Physics Teachers (IAPT) Vidarbha Region (SRC08e) and the Association of All Computer Science Teachers (AACST).

Your invaluable expertise, insightful contributions, and dedication were instrumental in the success of this event. Your efforts have made a lasting impact on the attendees and have furthered the cause of fostering interdisciplinary learning and collaboration among educators and practitioners in physics and computer science.

We look forward to your continued support and collaboration in future endeavours.

Thank you very much.   With Regards

Dr. Abha Khandelwal   **Prof S W Anwane**
Convener & Founder AACST   **President IAPT SRC08e**
EC IAPT SRC08e

Online Workshop on Developing AI Applications in the Physics domain with Python

19 June 2024

Dr. Kishor Govindrao Rewatkar
09/06/1964
Principal,
Vidya Vikas Arts, commerce and Science College, Samudrapur, Dist. Wardha

Subject: Appreciation for Chairing the Session Online Workshop on
"Developing AI Applications in Physics Domain using Python"

Dear Sir,

We are honoured to thank you for chairing the "Developing AI Applications in Physics Domain using Python" workshop on Session **08- 19 June 2024.** This workshop was jointly organised by the Indian Association of Physics Teachers (IAPT) Vidarbha Region (SRC08e) and the Association of All Computer Science Teachers (AACST).

Your invaluable expertise, insightful contributions, and dedication were instrumental in the success of this event. Your efforts have made a lasting impact on the attendees and have furthered the cause of fostering interdisciplinary learning and collaboration among educators and practitioners in physics and computer science.

We look forward to your continued support and collaboration in future endeavours.

Thank you very much.   With Regards

Dr. Abha Khandelwal   **Prof S W Anwane**
Convener & Founder AACST   **President IAPT SRC08e**
EC IAPT SRC08e

Online Workshop on Developing AI Applications in the Physics domain with Python

20 June 2024

Prof. Y K Vijay
Director CIST, IIS deemed to be University,
President of IAPT –RC-6, Rajasthan
Jaipur 302020

**Subject: Appreciation for Chairing the Session Online Workshop on
"Developing AI Applications in Physics Domain using Python"**

Dear Sir,

We are honoured to thank you for chairing the "Developing AI Applications in Physics Domain using Python" workshop on Session **09- 20 June 2024.** This workshop was jointly organised by the Indian Association of Physics Teachers (IAPT) Vidarbha Region (SRC08e) and the Association of All Computer Science Teachers (AACST).

Your invaluable expertise, insightful contributions, and dedication were instrumental in the success of this event. Your efforts have made a lasting impact on the attendees and have furthered the cause of fostering interdisciplinary learning and collaboration among educators and practitioners in physics and computer science.

We look forward to your continued support and collaboration in future endeavours.

Thank you very much.   With Regards

Dr. Abha Khandelwal   **Prof S W Anwane**
Convener & Founder AACST   **President IAPT SRC08e**
EC IAPT SRC08e

Online Workshop on Developing AI Applications in the Physics domain with Python

21 June 2024

Dr Chitra Ravi
Retd. HOD, Department of Computer Science,
Maharani LakshmiAmmanni College for Women, Autonomous, Malleswaram, Bangalore

Subject: Appreciation for Chairing the Session Online Workshop on "Developing AI Applications in Physics Domain using Python"

Dear Madam

We are honoured to thank you for chairing the "Developing AI Applications in Physics Domain using Python" workshop on Session **19 -21 June 2024.** This workshop was jointly organised by the Indian Association of Physics Teachers (IAPT) Vidarbha Region (SRC08e) and the Association of All Computer Science Teachers (AACST).

Your invaluable expertise, insightful contributions, and dedication were instrumental in the success of this event. Your efforts have made a lasting impact on the attendees and have furthered the cause of fostering interdisciplinary learning and collaboration among educators and practitioners in physics and computer science.

We look forward to your continued support and collaboration in future endeavours.

Thank you very much.   With Regards

Dr. Abha Khandelwal   **Prof S W Anwane**
Convener & Founder AACST   **President IAPT SRC08e**
EC IAPT SRC08e

Indian Association of Physics Teachers (IAPT)
SRC08E (Vidarbha)
In Association With
Association of All Computer Science Teachers (AACST)

@40

Online Workshop on Developing AI Applications in the Physics domain with Python

CERTIFICATE OF PARTICIPATION

This certificate is presented to Mr./Mrs./Dr. Kamal Singh from

for his/her participation

in the workshop during 10th June - 5th July 2024.

Prof. P.K. Ahluwalia
Central President, IAPT

Prof. S.B. Kishore
President, AACST

Prof. S.W. Anwane
President, IAPT (SRC08E)

Dr. A.K. Khandelwal
Workshop Convener

Indian Association of Physics Teachers (IAPT)
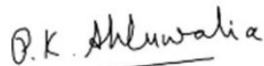**SRC08E (Vidarbha)**
In Association With
Association of All Computer Science Teachers (AACST)

@40

Online Workshop on Developing AI Applications in the Physics domain with Python

CERTIFICATE OF PARTICIPATION

This certificate is presented to Mr./Mrs./Dr. Tanisha Shukla from Indian Institute of Technology for his/her participation in the workshop during 10th June - 5th July 2024.

Prof. P.K. Ahluwalia
President, Central IAPT

Prof. S.B. Kishor
President, AACST

Prof. S.W. Anwane
President, IAPT (SRC08E)

Dr. A.K. Khandelwal
Workshop Convener

Indian Association of Physics Teachers (IAPT)
SRC08E (Vidarbha)
In Association With
Association of All Computer Science Teachers (AACST)

@40

Online Workshop on Developing AI Applications in the Physics domain with Python

CERTIFICATE OF PARTICIPATION

This certificate is presented to Mr./Mrs./Dr. Dr Neetu Verma from

Kanya Maha Vidyalaya for his/her participation

in the workshop during 10th June - 5th July 2024.

Prof. P.K. Ahluwalia	**Prof. S.B. Kishore**	**Prof. S.W. Anwane**	**Dr. A.K. Khandelwal**
Central President, IAPT	President, AACST	President, IAPT (SRC08E)	Workshop Convener

Indian Association of Physics Teachers

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Letter of Appreciation
06-07-2024

To
Core Team

The Workshop on Developing AI Applications in the Physics Domain with Python (10 June to 5 July 2024 for 21 sessions jointly with AACST)

Dear Team,

I am writing to extend my heartfelt appreciation for the tremendous effort and dedication you demonstrated during the 21-day workshop, under the esteemed convenership of **Dr. Abha Khandelwal**. **Dr. Halim Ahmed** and **Dr. Gajanan Jadhav** who played pivotal roles as coordinators, working tirelessly to ensure the workshop's success. **Dr Govind Lakhotiya** supported from behind the curtain and tirelessly handled background work for the success of the event.

Additionally, our student coordinators, **Mr. Yugansh Kanoje, Ms. Aaishwarya Mendawade,** and **Ms. Anushka Palandurkar** provided invaluable support and contributed significantly to the smooth execution of this event.

Your collective hard work and commitment have been recognized at the national level by educators, including the esteemed **Professor P.K. Ahluwalia**, who acknowledged the efforts of our sub-regional council. This recognition is especially meaningful as we are still in the early stages of our development. **Dr. Ahluwalia**, President of IAPT (Central), is a source of inspiration and unity for us. Despite his numerous commitments, he was so dedicated that he registered as a participant and attended all the sessions.

Bravo to all of you!

Once again, I extend my sincere appreciation for your outstanding teamwork and dedication.

Thank you once again for your invaluable support.

Yours Faithfully,

Prof. S. W. Anwane
President
IAPT SRC-08 E

The Introduction script prepared from biodata used in the programme

Dr. Manu Pratap Singh

It is my pleasure to introduce Dr. Manu Pratap Singh, who currently serves as Professor and Director of the Department of Computer Science at Khandari Campus, Dr. Bhimrao Ambedkar University, Agra.

Dr. Singh holds a postgraduate degree in Computer Science and earned his Ph.D. with a thesis entitled "Study of Super Symmetric Dyon and Computation of Its Mass Spectra," which falls under the broad domain of Computational Physics. His current specialization is in Artificial Neural Networks. With 27 years of teaching experience at both undergraduate and postgraduate levels, Dr. Singh has significantly contributed to academia and research.

He has successfully completed two major research projects, published 98 research papers, authored two books, and co-authored two additional books. Furthermore, he holds a patent and has actively participated in 132 conferences, delivering 54 invited talks. Dr. Singh has also guided 18 students through their doctoral research.

Dr. Singh's academic endeavors have taken him to various countries, including Malaysia, Indonesia, China, Thailand (Bangkok), and South Africa. His extensive administrative experience includes roles such as NAAC assessor, TEQIP Coordinator, and Proctor, showcasing his versatility and commitment to academic excellence.

Dr. Singh's broad expertise and dedication to both teaching and research make him a distinguished figure in the field of Computer Science.

P K Ahluwalia:

It is my great pleasure to introduce Professor P.K. Ahluwalia to this esteemed gathering today. Professor Ahluwalia is a distinguished figure in the realm of Physics, having served as a revered educator at Himachal Pradesh University, Shimla, before retiring. Throughout his illustrious career, he has held numerous pivotal roles, including serving as the coordinator of the UGC SAP program, a member of the Himachal Pradesh State Higher Education Council, and a member of various advisory committees such as the HP Private University Education Regulatory Commission.

Professor Ahluwalia's contributions extend beyond academia; he has chaired the Library Advisory Committee of Himachal Pradesh University and acted as the UGC Nodal Centre Coordinator for Computer Applications in Physics, Mathematics, and Commerce. He has been deeply involved in faculty and administrative matters, serving as the Dean of the Faculty of Physical Sciences and as the Dean of Planning and Teachers' Affairs at Himachal Pradesh University.

Beginning his teaching journey at St Bede's College, Professor Ahluwalia later joined the Department of Physics at Himachal Pradesh University in 1987. He has shared his expertise at various institutions, including the UGC Inter University Accelerator Centre in New Delhi and IIIT Vadodara. He was adjunct faculty in teaching advanced courses on statistical mechanics and quantum mechanics.

In the realm of research, Professor Ahluwalia's focus lies in condensed matter physics, with significant contributions to the understanding of magnetic alloys, liquid metals, low-dimensional electron gases, quantum dots, and composite materials. His scholarly pursuits have resulted in over 120 research papers published in high-impact, peer-reviewed journals, alongside the authorship of three books. He has also guided and mentored numerous PG students and supervised dissertations.

Recognized for his academic excellence and leadership, Professor Ahluwalia has received prestigious accolades, including the Commonwealth Academic Fellowship at the University of Edinburgh, UK, and the Best Teacher and Academic Administrator Award from Himachal Pradesh University in 2012. Additionally, he has been honored with the Environment Leadership Award by the Government of Himachal Pradesh, Shimla, for his individual contributions.

Beyond his professional endeavors, Professor Ahluwalia is an avid traveler with a passion for science popularization, radio features, writing, and community service. He has made significant contributions to the field through the organization of numerous academic conferences and his involvement in various scientific societies, including his current roles as the President of IAPT and executive member of the Indian Physics Association. Furthermore, he serves as a member of the Indian Science Congress Association and holds leadership positions in the Himachal Physical Society and Vigyan Bharti.

In essence, Professor P.K. Ahluwalia epitomizes the essence of a dedicated scholar, educator, and visionary leader, whose multifaceted contributions have enriched the academic and scientific community both nationally and internationally.

Dr. Shyamkant Wasudeorao Anwane

Serves as Professor and The Head of the Department of Physics at Shri Shivaji Education Society Amravati's SCIENCE COLLEGE, Nagpur. He has been on the board of Ambassador for 'MAPLE Software for the SAARC region' for the last 5 years. He is a renowned instructor on UDEMY, an esteemed international online learning platform. Recently he has been nominated as President of Indian Association of Physics Teachers Sub Regional Council of Vidarbha SRC 08 E.

Nominated to the Board of Studies of Rashtrasant Tukdoji Maharaj Nagpur University (RTMNU) for Applied Science & Humanities for a period of 5 years, Dr. Anwane has previously contributed to the BoS for autonomous Bajaj Science College, Wardha.

He has been involved in teaching for the past 25 years. His scholarly achievements include the publishing of 5 books and around 20 Research Papers. His research interest is in areas that include; Materials Science, Super Ionic Conductors, Electrochemical Gas Sensors, Relativity etc. Dr. Anwane has completed UGC – MRP, UGC CoC, and a UGC Innovative Project. He is a recipient of SRF by CSIR New Delhi twice during his doctoral research.

Prof M P Dhore

I am very pleased to introduce Dr Mahendra Dhore to the audience. He has completed his Master of Science in Computer Science and has been awarded with Master of Philosophy and Doctor of Philosophy in Computer Science. Presently he is a Professor and Principal at Shri Shivaji Education Society Amravati's SCIENCE COLLEGE Nagpur.

He has a vast experience of 27 years in UG and PG level. His areas of interests include; Theory of Computation, Compiler Construction, Natural Language Processing, Computer Graphics, Mobile Computing, Digital Image Processing, Domain Image analysis, Cloud Computing, Big Data Analysis.

He guided 06 Ph.D. students and the same number of students are presently working under his supervision.

He is the recipient of the Gold Medal for the Best Principal for 2023 by RTM Nagpur University. During his doctoral research, he was awarded Teacher Fellowship by UGC New Delhi during 2008-2010.

He has completed 1 major, 1 minor research project, published one book, 2 book chapters and has been bestowed with one copyright award. He published 46 research papers and participated in 5 dozen conferences in various capacities that included invited talks and chairing sessions.

He has been on various administrative positions that include; NAAC accessor, Co-opted Executive Member on Shri Shivaji Education Society AMRAVATI, BoS, RRC, Academic Council at RTM Nagpur University and SGB Amravati University.

He is member of IEEE, IAENG, IACSIT, IETE, ISCA etc.