



It was greatly welcomed by the Physics community and a huge response was received. The course was started on 2<sup>nd</sup> April 2020 and a total of Forty three thousand five hundred and twenty one students were registered for the course. These registered students were from all over the world. In this 2-month course Dr. Verma explains Physics through simple experiments from all the fields which are useful up to class 12. The videos were pre shot and are uploaded on website one by one. A notification is sent to the registered participants on email that a new video is uploaded. Students discuss their problems on the website. Dr. Verma also replies selected questions and encourage the students to discuss a lot of Physics on the website.

<b>Stay Home And Revise Physics (SHARP)</b> <i>An online Course by Dr H C Verma at <a href="http://phy.hcverma.in">phy.hcverma.in</a></i>	
Millions of students of schools and colleges are stranded in lockdown and for many of them the academics has almost halted. But thanks to internet and technology, we can use this time effectively to resume our academics. Center of Continuing Education, IIT Kanpur has come up with a special course on Physics offered by Dr. H. C. Verma which can be taken by school students to Physics educators. And the course is Stay Home and Revise Physics on the theme <i>Learning Physics with Simple Experiments</i> . The course starts on 2 <sup>nd</sup> April 2020, Registrations for the course are open at <a href="http://phy.hcverma.in">phy.hcverma.in</a> .	
<b>Highlight of the course:</b>	<b>Methodology:</b>
<ul style="list-style-type: none"> <li>The course will start from 02<sup>nd</sup> April, 2020.</li> <li>It will be a 24 lecture course spread over about 2 months.</li> <li>Each lecture will have 2-4 physics experiments followed by detailed explanation.</li> <li>Most of the experiments can be assembled and performed by even a child of age group 13 years onwards.</li> <li>The explanation part may be at the level of plus 2 and in some cases above that.</li> </ul>	<ul style="list-style-type: none"> <li>To do online course one just need a mobile phone or laptop/desktop/tablet with internet data connections.</li> <li>On the average 3 lectures will be uploaded per week on the course website: <a href="https://phy.hcverma.in/">https://phy.hcverma.in/</a></li> <li>Participants can ask questions to Dr. H. C. Verma by texting on mobile phone. Replies can also be given by the fellow participants.</li> <li>Based on your attendance (viewing of full lectures), certificates will be given by Center of Continuing Education, IIT Kanpur.</li> </ul>
<b>Registrations are Open, Register now</b>	
<ul style="list-style-type: none"> <li>* Open the site <a href="http://phy.hcverma.in">phy.hcverma.in</a> on your system. You will see how to register.</li> <li>* Click on sign in/ sign up.</li> <li>* On the next screen click on "Create New Account"</li> <li>* A form will appear on your screen. Fill the information asked. Click on "submit".</li> <li>* You will receive an OTP (verification code) on your email. Put the otp at appropriate place.</li> <li>* Reset your password and click on "Verify and set password"</li> <li>* Your registration is done. Any time you can go the <a href="http://phy.hcverma.in">phy.hcverma.in</a>, sign in, write user- id and password and enjoy the lectures and Forum discussion.</li> </ul>	
For any query : Whats Apps : 9506611484, Email: <a href="mailto:hcverma@iitk.ac.in">hcverma@iitk.ac.in</a> , <a href="mailto:sponbajpai@gmail.com">sponbajpai@gmail.com</a>	

## POSTER FOR SHARP

This is really a great initiative by Shiksha Sopan during lockdown as so many students are making their Physics base strong at their home on their mobile/laptops.

## 11 - Day Residential Camp of selected BSc students

An Eleven-day residential camp was organized from **26th February to 6th March 2020** by Shiksha Sopan for BSc students. The participants were selected from the online course "Basics of Quantum Mechanics", conducted by Dr. H C Verma in August-November 2019. A total of 15 participants from different states across the Nation came to attend this camp. The camp was totally free of cost for the students. A brief report of the camp will be separately sent to you. The highlights are as follows.



- \* A galaxy of Resource persons. 3 Professors and a research scientist from IITK, 2 BSc students who performed extremely well in the previous year's similar Camp, Three senior educators from Chennai, Ahmedabad and Kolkata, a science entrepreneur and Sopan's own resource persons.
- \* 6 Warm up experiments to be done on the first day and 8 higher level experiments to be done one per day. Sessions for discussion of the experiments performed. All experiments designed and assembled by Shiksha Sopan Team.
- \* Light Entertaining Science Shows. Several sessions by Shri Debmalya Sen of Kolkata and Shri Amit K Bajpai of Shiksha Sopan.
- \* A research level programable furnace fabricated from scratch under guidance of Shri Somnath Danayak of IITK.
- \* 5 sessions on Arduino by Dr Shikhar Jha of IITK and Shri Vijay Kushwaha of Shiksha Sopan.

- \* 8 sessions on Laplace Equation by Shri Ravishankar C S of Chennai.
- \* 4 sessions on Quantum Entanglement by Dr Anand Jha of IITK. Each session was scheduled for 1.5 hours but was extended due to massive interactions by students to 2.5 to 3 hours.
- \* Session of Electrochemistry by Shri Anuj Awashti, Trends in Physics Research by Dr Anjan Gupta of IITK, Shiksha Sopan Introduction by Shri Atul Kumar and more.
- \* Session on Sky watching by Shri Dhananjay Rawal of Ahmedabad. This was a program for BSc camp participants, Shiksha Sopan students, People living in the vicinity of Sopan Ashram and Physics teachers of First Sunday Club of Anveshika. We describe this event in more detail below.

### **Sky Watching Program**

A Sky Watching program was organized at Sopan Ashram on 1<sup>st</sup> March 2020. This program was conducted in two sessions. The children of SASK, BEC and Library were invited in the 1<sup>st</sup> session where day time sky watch was arrange. Physics Teachers of First Sunday Club (Anveshika) were also called to join this session. Mr. Dhanjay Rawal from Ahmedabad together with an associate was the main resource person of the sky watching program. Mr. Rawal first showed a video related to the Origin of the Universe, Planets, Satellites etc. The video was very informative and audience learnt so many things related to astronomy. Along with this, Mr. Rawal also gave a lot of information related to the universe. After the video, the children asked a lot of questions and cleared their doubts. After this the main program of sky watching through telescope started with an attempt to see sunspots.

The second session was conducted in late evening starting at 7 PM and ending at 10 PM. Children studying at Sopan Ashram Evening Centre who reside around Ashram and Participants of BSc camp attended the second session of sky watching in the night. Dhanjay Sir gave lots of information about the stars. He also told the children about the patterns of stars making constellations and trained them on how to recognize the stars. The telescope was fitted on the terrace and focused on the planet Mercury. The participants watched this planet through the telescope. The night sky watching session was very enjoyable as well as informative.



## Sopan Anaupcharik Shikshan Kendra (SASK)

In the month of March only two activities could be done because of Pandemic of COVID 19. One was Holi celebration and another was sky watching at Sopan Ashram (already described above). After Holi holidays, lockdown was announced so that our center was closed.

### **Holi Celebration**

SASK celebrated Holi on 6th March in a very special manner. Children celebrated this festival with IITK students Vivek ji, Shashank ji and others. All played Holi with flowers to give the message about the harmful effects of Chemical colors. Vivek ji and Shashank ji played Holi of flowers with Radha ji and Krishna ji and gave the knowledge that why should we avoid chemical colors. Seema Verma ji told all the children about the festival of Holi and its historical impact. She also wished a happy Holi to everyone present on behalf of SASK.



## Barasirohi Evening Center (BEC)

Barasirohi Evening Center celebrated Holi celebration and also did the career counselling of students. Due to Pandemic of COVID 19 BEC was also closed after Holi.

### **Holi Celebration**

On 6<sup>th</sup> March, the festival of Holi was celebrated at the evening learning center. On this day, all the volunteers of the center, IITK students Abhishek ji, Rahul ji and Anuj ji, together with all the children, played Holi with natural colours (Gulal). Everyone wished each other a happy Holi. Seniors advised the children to stay away from chemical dyes. Children enjoyed a lot with the students and listen their childhood stories of Holi.



### **Career counseling**

As we know choosing a career is very important for everyone because it helps the person for growing up. Five IITK students conducted a career counseling session on 7<sup>th</sup> March. Rahul ji, Rohit ji, Kavita ji, Prakash Saini ji, Aakib Shameen ji, belonging from different fields were present to counsel the children about their aim and career. They gave information about various courses to the children from class 6 to class 12. They also told the children to fix their goals and do hard work for achieving these. The whole session went on for around 2 hours.



## Sopan Ashram Evening Center

SAEC brings out its own news Magazine named "SAMVAD" written by children of the center. But this time "SAMVAD" is written by our volunteers because the center is closed due to pandemic of COVID 19. SAMVAD of April 2020 is also attached. The main highlights are given below.

- Sahil, Piyush and Sagar studying in class 10 filled polytechnic forms. Mr. Aman Prasad Ji, student volunteer of Shiksha Sopan and M Tech from IITK helped them during filling the form. He is also giving guidance to them to prepare for entrance examination.
- Avni Sharma, a student studying in class 12, has been selected in the first phase of NIFT (National Institute of Fashion Technology).
- Deeksha ji, volunteer of SAEC, arranged Sopan library so that children can use their time in summer vacation after the exams more effectively.
- Om ji, volunteer, SAEC helped the children in making clay models to utilize their time in effective manner and also enhance their creative skills.

**अंधकार को क्यों धिक्कारे, अच्छा हैं एक दीप जलायें**

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### Other Informations

**Web site** : For more details please visit [www.shiksha-sopan.org](http://www.shiksha-sopan.org)

**How to donate:** *Shiksha Sopan*

(b) You can write cheques/draft for donations in the name of "Shiksha Sopan" payable at Kanpur and send to the address given below.

(c) Online transfer can be made in State Bank of India, IITKanpur branch. Account No. **10426002488**, Account name "Shiksha Sopan", IFSC code **SBIN0001161**

(d). People in US can use the link <http://www.iitk.ac.in/dora/donation/PayPal/> and Choose Shiksha Sopan Charitable Contribution to donate through IIT Kanpur foundation using credit cards. All donations are 100% tax deductible in the United States. IIT Kanpur Foundation (Tax ID: 94-3370645) is Tax Exempt under 501(c)(3) classification of IRS.

(e). All donations are Tax free (up to 50%) under section 80/G.

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