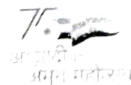




# Central University of Himachal Pradesh

Department of Physics and Astronomical Science

School of Physical and Material Sciences



## Minutes of the 15<sup>th</sup> meeting of the Board of Studies of Department of Physics and Astronomical Science

**Date and Time:** 18th November 2024 at 11:30 AM

**Venue:** Seminar Hall, Shahpur Parisar, CUHP.

The meeting of the 15<sup>th</sup> Board of Studies (BOS) of Department of Physics and Astronomical Science (DPAS) held on 18th November 11:30 AM at Shahpur Parisar of CUHP. The following members attended the meeting:

1. **Prof. Rajesh Kumar**  
Chairman, BOS  
Head  
Department of Physics and Astronomical Science, CUHP.
2. **Prof. OSKS Sastri (online)**  
Member  
Department of Physics and Astronomical Science, CUHP.
3. **Prof. Hum Chand (online)**  
Department of Physics and Astronomical Science, CUHP.
4. **Prof. B. C. Chauhan (online)**  
Member  
Department of Physics and Astronomical Science, CUHP.
5. **Prof. Pankaj Sharma**  
External member  
NITTTR Chandigarh.
6. **Prof. D. N. Gupta**  
External member  
Department of Physics and Astrophysics, University of Delhi.
7. **Dr. Mahesh Kulharia**  
Member  
Centre for Computational Biology and Bioinformatics, CUHP.
8. **Dr. Pradeep Chouksey**  
Member  
Department of Computer Science & Informatics, CUHP
9. **Dr. Dalip Singh Verma**  
Member  
Department of Physics and Astronomical Science, CUHP

The Chairman, Prof. Rajesh Kumar, welcomed and thanked the BOS members for sparing their valuable time for the meeting. He briefed the members about the activities and progress made by the department since last BOS meeting and outlined the plan of the meeting. Thereafter, agenda items were taken up, sequentially, to place before the BOS members. The members held comprehensive deliberations on all the agenda items and following decisions were unanimously taken:

- **Item PAS-BOS-15.1:** The BOS confirmed the minutes of the 14<sup>th</sup> BOS meeting held on 26-12-2023 at Shahpur Parisar (**Annexure-I**).
- **Item PAS-BOS-15.2:** The BOS approved the minutes of 3<sup>rd</sup> Research Degree Committee (RDC) meeting held on 14-11-2024 at Shahpur Parisar (**Annexure-II**).

- **Item PAS-BOS-15.3:** The BOS approved the list of new courses introduced and course revision at Ph. D. and PG level.

New Courses Introduced				Remarks
S. No.	Name	Code	Programme	
1.	Neutrino Physics	PAS9201M	PG	Annexure-III
2.	Material Science-II	PAS9201P	PG	
3.	Vedic Physics	PAS7204	UG	
4.	योग अध्ययन एवं अभ्यास	PAS7205	UG	
Course Revisions				Annexure-III
1.	Material Science-I	PAS9106E	PG	

- **Item PAS-BOS-15.4:** The BOS approved the list of courses for B. Sc. Programme for seventh semester (Honours and Honours with Research) as per CUHP NEP2020 guidelines (**Annexure-IV**).
- **Item PAS-BOS-15.5:** The BOS approved the evaluation guidelines of Project Course (M. Sc. IV Semester) and Review of Literature and Research Proposal course (B. Sc. VII Semester) detailed in **Annexure-V**.
- **Item PAS-BOS-15.6:** The BOS held detailed deliberations on the evaluation guidelines of the course "Paper Publication/Seminar-conference presentation, PAS9203" offered to M. Sc. IV semester. The BOS suggested and approved the evaluation guidelines of the course as follows:

For the students who have not been able to publish or present their project work, due to unavoidable circumstances, an expert committee with following members:

- Head of the department
- External expert
- Concerned supervisor

may be constituted to evaluate their end-term exam. They will be evaluated for maximum of 40 Marks.

In this light, the End-Term evaluation guidelines of the course PAS9203, which was passed in the 14<sup>th</sup> BOS, is revised to:

TABLE-A			
Course Code	PAS9203		
Course Name	Paper Publication/Seminar/Conference presentation		
Maximum Marks	100		
Evaluation Criteria	Internal Assessment	20 Marks	
	End-Term Examination	60 Marks (Based on Paper Publication/Seminar/Conference presentation)	
	a) Paper publication in Peer-reviewed, UGC-CARE listed journals, SCOPUS indexed journals	60	
	b) Paper presented in National/International Seminar/Conference/Workshop and full paper published in proceedings	55	

*(Handwritten signatures and initials)*

		c) Paper presented in International Seminar/Conference/Workshop	50
		d) Paper presented in National Seminar/Conference/Workshop	45
		e) Expert committee evaluation	Evaluation out of 45 Marks
	<b>Mid-Term Examination</b>	20 Marks	

**Note:**

For points (a), (b), (c) and (d), the student has to substantiate their claim with proof of journal publication/presentation/conference publication etc. as the case may be. For point (e), students have to submit their manuscript and present the work before the above constituted committee.

- **Item PAS-BOS-15.7:** The BOS approved Swayam courses taken by UG and PG students during Spring 2024:

S. No.	Course Name	Course Code	Credits	Semester
1.	Human Behaviour	PASPGS002A	2	M. Sc. II
2.	Energy Resources, Economic, and Sustainability	PASPGS002B	2	M. Sc. II
3.	Enhancing Soft Skills and Personality	PASPGS002C	2	M. Sc. II
4.	Centre-State Relations in India	PASPGS002D	2	M. Sc. II
5.	Modelling and Simulation of Dynamic Systems	PASPGS002E	2	M. Sc. II
6.	Linear Programming and its Applications to Computer Science	PASPGS002F	2	M. Sc. II
7.	Photo Geology and Remote Sensing	PASUGS002	2	B. Sc. II
8.	Basics of Organic Chemistry	PASUGS004	4	B. Sc. IV

- **Item PAS-BOS-15.8:** The BOS discussed the course distribution of B Sc VII and VIII semesters (Honours with Research) in view of CUHP NEP. The BOS suggested and approved to combine Research Work (4 credits) of B. Sc. VII semester (Honours with Research) with Research Work (8 credits) of VIII semester. Thus, making Research work, in VIII semester, of 12 credits. 4 credits under the category "Advanced knowledge of research" can be transferred to VII semester from VIII semester to make total 20 credits in the VII semester. This may be implemented from the next academic session.
- **Item PAS-BOS-15.9:** The BOS approved the addition of following teachers in the list of possible examiners:

S. No.	Name of the examiner	Institute
1.	Dr. Balbir Singh Patial	HPU Shimla
2.	Dr. Raj Kumar Jagota	HPU Shimla
3.	Dr. Dheeraj Sharma	HPU Shimla
4.	Dr. Jaskaran Singh	Panjabi University Patiala
5.	Dr. Satyendra Prakash Pal	BHU Varanasi
6.	Prof. Arvind	IISER Mohali
7.	Prof. Kavita Dorai	IISER Mohali
8.	Dr. Harpreet Singh	GNDU Amritsar
9.	Prof. Rajesh Kumar	SPU Mandi
10.	Dr. Ankush Vij	Panjab University

*Dr. Balbir Singh Patial*

*Dr. Raj Kumar Jagota*

*Dr. Dheeraj Sharma*

*Dr. Jaskaran Singh*

*Dr. Satyendra Prakash Pal*

	Prof. Hitesh Sharma	IKG Punjab Technical University, Kapurthala
12.	Prof. Atul Khanna	GNDU Amritsar
13.	Dr Akshay Kumar	SPU Mandi
14.	Dr. Vinay Kumar	Central University of Jammu
15.	Dr. Jagdish Kumar	Central University Panjab
16.	Dr. Rajesh Kumar Singh	BBAU, Lucknow
17.	Prof. Anand Narayan	Indian Institute of Space Science & Technology
18.	Prof. Nasir Iqbal	Department of Physics, University of Kashmir
19.	Prof. R. Srikanand	IUCAA
20.	Prof Mousami Das	Indian Institute of Astrophysics, Koramangala, Bangalore
21.	Prof. Ranjeev Misra	IUCAA
22.	Dr. Ravi Joshi	Indian Institute of Astrophysics, Koramangala, Bangalore
23.	Prof. Yogesh Wadadekar	National Centre for Radio Astrophysics, TIFR
24.	Prof. T.R. Seshadri	Department of Physics and Astrophysics, University of Delhi
25.	Prof. Gulab Dewangan	IUCAA
26.	Prof. C. S. Stalin	Indian Institute of Astrophysics, Koramangala, Bangalore

The meeting ended with vote of thanks to all board members by the Chairman.

**Signatures:**

1. **Prof. Rajesh Kumar**  
Chairman, BOS  
Head  
Department of Physics and Astronomical Science, CUHP.

  
18/11/2024

2. **Prof. OSKS Sastri (online)**  
Member  
Department of Physics and Astronomical Science, CUHP.

3. **Prof. Hum Chand (online)**  
Department of Physics and Astronomical Science, CUHP.

4. **Prof. B. C. Chauhan (online)**  
Member  
Department of Physics and Astronomical Science, CUHP.

5. **Prof. Pankaj Sharma**  
External member  
NITTTR Chandigarh.

  
18/11/2024

6. **Prof. D. N. Gupta**  
External member  
Department of Physics and Astrophysics, University of Delhi.

  
18/11/2024

7. **Dr. Mahesh Kulharia**  
Member  
Centre for Computational Biology and Bioinformatics, CUHP.

8. **Dr. Pradeep Chouksey**  
Member  
Department of Computer Science & Informatics, CUHP



9. **Dr. Dalip Singh Verma**  
Member  
Department of Physics and Astronomical Science, CUHP

  
18/11/24



# Central University of Himachal Pradesh

Department of Physics and Astronomical Science

School of Physical and Material Sciences



## Agenda of 15<sup>th</sup> Board of Studies Meeting

**Date and Time:** 18<sup>th</sup> November, 2024, 11:00 AM.

**Venue:** Seminar Hall, Shahpur Parisar.

- **PAS-BOS-15.1:** To confirm the minutes of the 14<sup>th</sup> BOS meeting held on 26-12-2023 at Shahpur Parisar (**Annexure-I**).
- **PAS-BOS-15.2:** To approve the minutes of Research Degree Committee (RDC) meeting held on 14-11-2024 at 11:30 AM, Shahpur Parisar (**Annexure-II**).
- **PAS-BOS-15.3:** To approve new courses and course revisions:

New Courses Introduced				
S. No.	Name	Code	Programme	Remarks
1.	Neutrino Physics	PAS9201M	PG	Annexure-III
2.	Material Science-II	PAS9201P	PG	
3.	Vedic Physics	PAS7204	UG	
4.	योग अध्ययन एवं अभ्यास	PAS7205	UG	
Course Revisions				
1.	Material Science-I	PAS9106E	PG	Annexure-III

- **PAS-BOS-15.4:** To approve the list of courses for B. Sc. Programme for Seventh Semesters per CUHP NEP2020 guidelines (**Annexure-IV**).
- **PAS-BOS-15.5:** To approve the evaluation guidelines of Project Course (M. Sc. IV Semester) and Review of Literature and Research Proposal course (B. Sc. VII Semester) detailed in **Annexure-V**.
- **PAS-BOS-15.6:** The evaluation guidelines of the course "Paper Publication/Seminar-conference presentation, PAS9203" offered to M. Sc. IV semester students had been approved in 14<sup>th</sup> BOS held on 26<sup>th</sup> December, 2023. For ready reference, it is appended below:

TABLE-A			
Course Code	PAS9203		
Course Name	Paper Publication/Seminar/Conference presentation		
Maximum Marks	100		
Evaluation Criteria	Internal Assessment	20 Marks	
	End-Term Examination	60 Marks (Based on Paper Publication/Seminar/Conference presentation)	
		a) Paper publication in Peer-reviewed, UGC-CARE listed journals, SCOPUS indexed	60

		b) Paper presented in National/International Seminar/Conference/Workshop and full paper published in proceedings	55
		c) Paper presented in National/International Seminar/Conference/Workshop	40
	<b>Mid-Term Examination</b>	20 Marks	
<b>Note:</b> The student has to substantiate their claim with proof of journal publication/presentation/conference publication etc. as the case may be.			

It was observed that the non-availability of chemicals or characterization equipments sometime led to delay in completing the research proposed in the course, particularly, in experimental physics. A six-months window, sometime, may not be enough for analysis and subsequent preparation of the manuscript for submission to journal or presentation at some conference. Moreover, it is an outgoing batch so the result has to be compiled in a timely manner. In this light, the department wants to put this issue before the BOS for deliberations and suggestions in the evaluation process of this course.

- **PAS-BOS-15.7:** To approve Swayam courses taken by UG and PG students during Spring 2024:

S. No.	Course Name	Course Code	Credits	Semester
1.	Human Behaviour	PASPGS002A	2	M. Sc. II
2.	Energy Resources, Economic, and Sustainability	PASPGS002B	2	M. Sc. II
3.	Enhancing Soft Skills and Personality	PASPGS002C	2	M. Sc. II
4.	Centre-State Relations in India	PASPGS002D	2	M. Sc. II
5.	Modelling and Simulation of Dynamic Systems	PASPGS002E	2	M. Sc. II
6.	Linear Programming and its Applications to Computer Science	PASPGS002F	2	M. Sc. II
7.	Photo Geology and Remote Sensing	PASUGS002	2	B. Sc. II
8.	Basics of Organic Chemistry	PASUGS004	4	B. Sc. IV

- **PAS-BOS-15.8:** To discuss the course distribution of B Sc VII and VIII semesters (Honours with Research) in view of CUHP NEP.
- **PAS-BOS-15.9:** To approve the addition of following teachers in the list of possible examiners:

S. No.	Name of the examiner	Institute
1.	Dr. Balbir Singh Patial	HPU Shimla
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6.	Prof. Arvind	IISER Mohali
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8.	Dr. Harpreet Singh	GNDU Amritsar
9.	Prof. Rajesh Kumar	SPU Mandi
10.	Dr. Ankush Vij	Panjab University
11.	Prof. Hitesh Sharma	IKG Punjab Technical University, Kapurthala
12.	Prof. Atul Khanna	GNDU Amritsar
13.	Dr Akshay Kumar	SPU Mandi
14.	Dr. Vinay Kumar	Central University of Jammu
15.	Dr. Jagdish Kumar	Central University Panjab

- **Any other agenda item with the permission of the Chair.**



**Prof. Rajesh Kumar**

Head

Department of Physics and Astronomical Science  
Central University of Himachal Pradesh  
Shahpur Parisar.