



**M. M. Institute of Computer Technology & Business Management,**  
**Maharishi Markandeshwar (Deemed to be University), Mullana**  
(Established under Section 3 of the UGC Act, 1956)  
(Accredited by NAAC with Grade 'A++')

Minutes of the meeting of Board of Studies in Computer Applications was held on **17-07-2023** (Monday) at **12:50 pm** in the Board Room of M.M. Institute of Computer Technology & Business Management, MM (DU), Mullana in hybrid mode. The meeting of BOS fixed for 12.07.2023 was postponed and held on 17.07.2023.

**The following members attended the meeting:**

- |   |                 |
|---|-----------------|
| 1. Dr. Sumit Mittal, Professor, MMICTBM   | Chairman, BOS   |
| 2. Dr. Sonal Chawla, Professor,<br>Dept. of Computer Science & Applications,<br>Panjab University, Chandigarh | External Expert |
| 3. Dr. Munishwar Rai, Professor, MMICTBM  | Member          |
| 4. Dr. Rattan Pal Singh Rana, Professor, MMICTBM  | Member          |
| 5. Dr. Dalip, Assoc. Professor, MMICTBM   | Member          |
| 6. Dr. Deepa Nehra, Assoc. Professor, MMICTBM   | Member          |
| 7. Dr. Pooja Rani, Asstt. Professor, MMICTBM  | Member          |
| 8. Ms. Manju Bagga, Asstt. Professor, MMICTBM   | Member          |

Mr. Mukesh Gupta (External Expert) could not attend the meeting.

Chairman, BOS welcomed all the members especially the external expert for attending the meeting.

**The following items were discussed and approved:**

1. The minutes of the last meeting of Board of Studies held on 09.03.2023 were circulated on 10.03.2023 among all the members. Since no comment has been received, the house confirmed the minutes of meeting and action taken report of the said meeting.
2. Considered and approved the minor changes in the scheme of the following courses as per NEP-2020 under Choice Based Credit Scheme (CBCS) from the batch 2022-26 onwards (Post Facto Approval):
  - (i) BCA
  - (ii) BCA with specialization in Artificial Intelligence and Machine Learning
  - (iii) BCA with specialization in Data Science
3. Considered and approved the new syllabi of the following courses under Choice Based Credit Scheme (CBCS) from the batch 2022-26 onwards w.e.f the session 2023-24:
  - (i) BCA-2<sup>nd</sup> year (3<sup>rd</sup> Sem. & 4<sup>th</sup> Sem.)
  - (ii) BCA-2<sup>nd</sup> year (3<sup>rd</sup> Sem. & 4<sup>th</sup> Sem.) with specialization in Artificial Intelligence and Machine Learning
  - (iv) BCA-2<sup>nd</sup> year (3<sup>rd</sup> Sem. & 4<sup>th</sup> Sem.) with specialization in Data ScienceThe scheme & syllabi of 2<sup>nd</sup> year would remain the same for BCA, BCA with specialization in Artificial Intelligence & Machine Learning and BCA with specialization in Data Science.
4. Considered and approved the new syllabi of the MCA-2<sup>nd</sup> year (3<sup>rd</sup> Sem. & 4<sup>th</sup> Sem.) under Choice Based Credit Scheme (CBCS) from the batch 2022-24 onwards w.e.f the academic session 2023-24.
5. Considered and approved the new syllabi of MP-02: Computer Applications of Ph.D Course Work w.e.f the academic session 2023-24.
6. Considered and approved the syllabi of the value added course VA-MCA-05: Mining and Analysis of Big Data w.e.f the session 2023-24.
7. Considered and approved the list of MOOC subjects for BCA & MCA students for the session 2023-24 (Odd Semester) under the category of SWAYAM Courses.

8. Considered and approved the Paper Setters for the following courses:
- BCA/BCA (OL)-1<sup>st</sup> Sem., 2<sup>nd</sup> Sem., 3<sup>rd</sup> Sem. & 5<sup>th</sup> Sem. examinations to be held in December, 2023
  - MCA/MCA (OL)-1<sup>st</sup> Sem. & 3<sup>rd</sup> Sem. examinations to be held in December, 2023
  - Ph.D Course Work examinations to be held in December, 2023/January, 2024
9. Considered and approved the synopsis & supervisor of the following Ph. D research scholars:

Sr. No.	Name of Scholar	Name of Supervisor	Title of Synopsis	Date of Approval (RAC)
1.	Shivani Gupta (21-Ph.D-109)	Dr. Pooja Rani	Design a Model for Detection of Fungal Diseases in Apple plants using Machine Learning	06.05.2023
2.	Sunil Kumar (22-Ph.D-117)	Dr. Pooja Rani	Development of An AI-based Model for Prediction of Liver Disease	17.06.2023
3.	Narender Jangra (22-Ph.D-118)	Dr. Rattan Pal Singh Rana	Design a Vulnerability Assessment Model to Enhance the Security of IoT Devices	17.06.2023
4.	Ritika (22-Ph.D-116)	Dr. Dalip, Assoc. Professor	Develop a Framework for Handwritten Signature Verification using Deep Learning	07.07.2023

10. Based on the benchmarking and feedback on Curriculum from various stakeholders for the session 2022-23, the following changes has been incorporated in the syllabi of BCA-2<sup>nd</sup> year & MCA-2<sup>nd</sup> year:

Sr. No.	Course Code	Nomenclature	%age of Change
1.	MCA-301	Programming with Python	20%
2.	MCA-302	Cloud Computing	30%
3.	MCA-304 (b)	Mobile Application Development	25%
4.	MCA-304 (c)	NoSQL Database	100%
5.	MCA-305 (b)	Software Project Management	20%
6.	MCA-402	Open Source Technologies using PHP	50%
7.	MCA-403 (a)	Blockchain Technology	60%
8.	MCA-403 (c)	Design and Analysis of Algorithms	40%
9.	MCA-404 (c)	Internet of Things	30%
10.	BCA-301	Database Management System	20%
11.	BCA-302	Web Designing Fundamentals	40%
12.	BCA-403	Operating System	25%
13.	BCA-404	Software Engineering	40%
14.	MAN-001	Indian Constitution	100%

11. Considered and approved the Panel of examiner for the evaluation of Ph.D thesis of Mr. Nippun Kamboj, Regn. No. 15-Ph.D-042 under the supervision of Dr. Dalip.
12. Considered and approved the Vision, Mission of the Institute, Program Outcomes (PO), Program Specific Outcomes (PSOs) and Program Educational Objectives (PEOs) of MCA programme.
13. Considered and approved the revised syllabus of Environmental Education (EnE-101) as prescribed by UGC-2023 w.e.f the session 2023-24.

14. The weightage of continuous assessment (internal marks) and summative assessment (end semester examination) for Theory and Practical courses of BCA/MCA online programme would be 30 and 70 respectively.

The meeting ended with a vote of thanks.



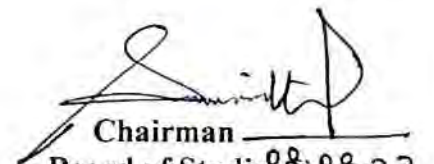
-Sd-  
Chairman  
Board of Studies

Endst. No. MMITBMBOS/2023/133

Dated: 08.08.2023

**A copy of the above is forwarded to the following for information & necessary action:**

1. Controller of Examinations, MM(DU)
2. Dean, Faculty of Engineering & Technology, MM(DU)
3. Dean, Academic (Technical), MM(DU)
4. Concerned Members, MMITBMB, MM(DU)
5. Deputy Registrar (Academic), MM(DU)
6. Dr. Sonal Chawla, Professor,  
Dept. of Computer Science & Applications, Punjab University, Chandigarh
7. Mr. Mukesh Gupta, Sr. Manager,  
Mahindra & Mahindra Ltd., Mohali



Chairman  
Board of Studies 08.08.23

**Department of Civil Engineering**

**MINUTES OF THE MEETING OF 28<sup>th</sup> BOARD OF STUDIES (Dated: 13.07.2022)**

Date: 13.07.2022

28<sup>th</sup> Board of Studies meeting in Civil Engineering of Maharishi Markandeshwar (Deemed to be University), Mullana (Ambala) was held on 13.07.2022 (Wednesday) at 11:00am.

The following were present:

1. Dr. Vanita Aggarwal, Professor and Head, CED, MMEC, Mullana -----In Chair
2. Dr. Umesh Sharma, Professor and Head, CED, PEC, Chandigarh -----External member
3. Dr. B.S. Walia, Professor, CED, MMEC, Mullana -----Member
4. Dr. Mukesh Saini, Associate Professor, CED, MMEC, Mullana----- Member
5. Dr. Chadetrik Rout, Associate Professor, CED, MMEC, Mullana----- Member
6. Er. Sunil Chauhan, Assistant Professor, CED, MMEC, Mullana-----Member

\*The approval on agenda and annexures was received in mail by Dr. Rajesh Goyal, Dean and Professor, NICMAR, Pune (External member)

Minutes of the meeting are as follows:

The minutes of the previous BOS meeting held on 22.06.2021 were approved as no further comments were received for the same.

01.	The list/panel of Theory Paper Setters for B. Tech Civil Engineering 3 <sup>rd</sup> , 5 <sup>th</sup> and 7 <sup>th</sup> Semester for the examination to be held in November/December, 2022 was approved.	(Annexure-I)
02.	The list/panel of Theory Paper Setters for B. Tech Civil Engineering 4 <sup>th</sup> , 6 <sup>th</sup> and 8 <sup>th</sup> Semester for the examination to be held in May/June, 2023 was approved.	(Annexure-II)
03.	The list/panel of Theory Paper Setters for Open Elective Subjects offered by Civil Engineering for the examination to be held in November/December, 2022 and May/June, 2023 was approved	(Annexure-III)
04.	The list/panel of Theory Paper Setters for M. Tech Civil Engineering (Specialization: Structure Engineering, Environmental Engineering and Transportation Engineering), 1 <sup>st</sup> Semester and 3 <sup>rd</sup> Semester for the examination to be held in November/December, 2022 was approved.	(Annexure-IV)
05.	The list/panel of Theory Paper Setters for M. Tech Civil Engineering (Specialization: Structure Engineering, Environmental Engineering and Transportation Engineering), 2 <sup>nd</sup> Semester for the examination to be held in May/June, 2023 was approved.	(Annexure-V)
06.	The list/panel of Theory Paper Setters for M. Tech Civil Engineering (Elective Subjects) for the examination to be held in May/June, 2023 was approved.	(Annexure-VI)
07.	The list/panel of Theory Paper Setters for Ph.D. Course Work Department Elective subject for the examination to be held in the session 2022-2023 was approved.	(Annexure-VII)

*mhr* *Rajesh Goyal* *M* *BSF* *13/7/22*

**Department of Civil Engineering**

**MINUTES OF THE MEETING OF 28<sup>th</sup> BOARD OF STUDIES (Dated: 13.07.2022)**

08.	The list/panel of Paper Setters for Environmental Studies/Environmental Education/Environmental Science (ES-101) for exam to be held in November/December, 2022 and May/June, 2023 was approved.	(Annexure-VIII)
09.	The list of Civil Engineering subjects on SWAYAM portal for exam to be held in the session 2022-2023 was considered and approved.	(Annexure-IX)
10.	The Revised Scheme of B. Tech Civil Engineering for 3 <sup>rd</sup> to 8 <sup>th</sup> semester for students of Batch 2021-2025 onwards was considered and approved.	(Annexure-X)
11.	The Syllabus of B. Tech Civil Engineering for 3 <sup>rd</sup> and 4 <sup>th</sup> semester for students of Batch 2021-2025 onwards was considered and approved.	(Annexure-XI)
12.	The Syllabus of B. Tech Civil Engineering for Humanities Elective-I and Elective-II subjects namely Entrepreneurship Development and Management (BHUM-121), Marketing Management (BHUM-120) and Principles of Management (BHUM-005) for students of Batch 2021-2025 onwards was considered and appraised.	(Annexure-XII)
13.	The Topic, Supervisor and list of external examiners for M. Tech. (Civil Engineering) with Specialization in Structural Engineering candidate namely Deepender Singh (Roll No.: 11207763), Radhika (Roll No.: 11207764) and Aseem Sharma (Roll No.: 11207765) was considered and approved.	(Annexure-XIII)
14.	The Topic, Supervisor and list of external examiners for M. Tech. (Civil Engineering) with Specialization in Transportation Engineering) candidate namely Ankit Kumar (Roll No.: 11207721) was considered and approved.	(Annexure-XIV)
15.	The list of external examiners for M. Tech. (Civil Engineering with Specialization in Structural Engineering) 2021 batch candidate namely Rishab Aggarwal (Roll No.: 11217761), Mohit Kumar (Roll No.: 11217762), Antrish Chander (Roll No.: 11217763) and Brilliance K. Karwee (Roll No.: 11217764) was considered and approved.	(Annexure-XV)
16.	The list of external examiners for M. Tech. (Civil Engineering with Specialization in Transportation Engineering) 2021 batch candidate namely Awulu James Ugbede (Roll No.: 11217721) was considered and approved.	(Annexure-XVI)
17.	The list of external examiners for M. Tech. (Civil Engineering with Specialization in Environmental Engineering) 2021 batch candidate namely Ashu (Roll No.: 11217701) was considered and approved.	(Annexure-XVII)
18.	The Scheme of M. Tech. (Civil Engineering) with Specialization in Geotechnical Engineering for students of Batch 2022-2024 onwards was considered and approved.	(Annexure-XVIII)

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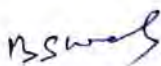
**Department of Civil Engineering**

**MINUTES OF THE MEETING OF 28<sup>th</sup> BOARD OF STUDIES (Dated: 13.07.2022)**

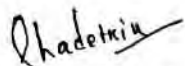
19.	The Syllabus of M. Tech. (Civil Engineering) with Specialization in Geotechnical Engineering for students of Batch 2022-2024 onwards was considered and approved.	(Annexure-XIX)
20.	The list of value added subjects for session 2021-22 onwards (Post facto) was considered and approved.	(Annexure-XX)
21.	Minor changes in scheme (Universal Human Values subject added in 5 <sup>th</sup> Semester) of batch 2020-2024 only was considered and approved.	(Annexure-XXI)
22.	Any other item with the permission of the chair.	--



Dr. Umesh Sharma  
(External Expert)



Dr. B.S. Walia  
(Member)



Dr. Chadetrik Rout  
(Member)

Approval received through mail

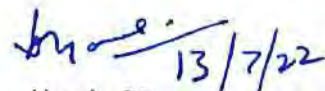
Dr. Rajesh Goyal  
(External Expert)



Dr. Mukesh Saini  
(Member)



Er. Sunil Chauhan  
(Member)



13/7/22

Head of Department  
Department of Civil Engineering  
M.M. Engineering College, Mullana (Ambala)

# Maharishi Markandeshwar (Deemed to be University)

Mullana (Ambala) 133 207 Haryana

## Department of Civil Engineering

### MINUTES OF THE MEETING OF 29<sup>th</sup> BOARD OF STUDIES (Dated: 30.06.2023)

Date: 30.06.2023

29<sup>th</sup> Board of Studies meeting in Civil Engineering of Maharishi Markandeshwar (Deemed to be University), Mullana (Ambala) was held on 30.06.2023 (Wednesday) at 10:00am.

The following were present:

1. Dr. Vanita Aggarwal, Professor and Head, CED, MMEC, Mullana -----In Chair
2. Dr. R.D. Garg, Professor, CED, IIT, Roorkee -----External Member
3. Dr. Babita Saini, Associate Professor, CED, NIT, Kurukshetra - -----External Member
4. Mr. Ujjawal Gupta, AGM, M3M India Pvt. Ltd, Gurugoa -----Industry Expert
5. Dr. B.S. Walia, Professor, CED, MMEC, Mullana -----Member
6. Dr. Mukesh Saini, Associate Professor, CED, MMEC, Mullana----- Member
7. Dr. Chadetrik Rout, Associate Professor, CED, MMEC, Mullana----- Member
8. Er. Rahul Grover, Assistant Professor, CED, MMEC, Mullana-----Member
9. Er. Parveen Kumar, Assistant Professor, CED, MMEC, Mullana -----Member

Minutes of the meeting are as follows:

The minutes of the previous BOS meeting held on 13.07.2022 were approved as no further comments were received for the same.

01.	The members were informed that the feedback on curriculum of Civil Engineering is taken by various stakeholders i.e. students, faculty, alumni, and industry/employer from time to time. The feedback received last on year by the stakeholders was considered in the meeting and it was recorded that the scheme and the syllabus of Civil Engineering is at par with the expectation of various stakeholders and due consideration has been given to feed back while framing the syllabus.	
02.	The members discussed the new education policy (NEP-2020) and its implementation strategy in higher education meticulously. The main highlights of NEP-2020 were recorded as targeting increase in gross enrolment ratio (GER) in higher education, greater autonomy, better affordability and better accessibility with increased accountability. The NEP-2020 policy provides students the freedom of choosing any subjects/streams with no boundaries. Another important feature of NEP-2020 multi level entry and exit option available with the student. Focus has been given on regular formative assessment for learning aiming at building the required skill set in students and making them job ready for industry. The policy permits and promotes the teaching learning in higher technical education institution in regional language as well besides English language. The committee members recorded that a student can be given various qualification titles like undergraduate certificate, undergraduate diploma, bachelor's degree and bachelor's degree (Honors/Research) at the completion of first year, second year, third year and fourth year of study, respectively. It was also noted that some of the technical higher education institutions have already implement NEP-2020. The committee is of the view that NEP-2020 may be implemented for undergraduate course in Civil Engineering in MM (DU), Mullana as and when deemed fit by higher authorities.	
03.	The syllabus of environmental education based on NEP-2020 as suggested by UGC for all undergraduate courses was considered and approved.	(Annexure-I)
04.	The syllabus of B. Tech Civil Engineering for 5th and 6th semester for students of Batch 2021-2025 onwards was considered and approved.	(Annexure-II)

  
30/6/23

# Maharishi Markandeshwar (Deemed to be University)

Mullana (Ambala) 133 207 Haryana

## Department of Civil Engineering

### MINUTES OF THE MEETING OF 29<sup>th</sup> BOARD OF STUDIES (Dated: 30.06.2023)

05.	The syllabus of B. Tech Civil Engineering for Humanities Elective-I and Humanities Elective-II subjects namely Introduction to Civil Engineering (BHUM-112) for students of Batch 2021-2025 onwards was considered and approved.	(Annexure-III)
06.	The syllabus of B. Tech Civil Engineering for Open Elective I to IV for students of Batch 2021-2025 onwards was considered and approved.	(Annexure-IV)
07.	Minor changes in syllabus of Essence of Indian Traditional Knowledge (BHUM-117) of batch 2021-25 onwards was considered and approved.	(Annexure-V)
08.	Minor changes in syllabus of Surveying & Geomatics (BCIV-103) of B. Tech 3 <sup>rd</sup> semester, batch 2021-25 onwards (Post facto) was considered and approved.	(Annexure-VI)
09.	Syllabus of Prefatory Project and Project-I (Through Virtual lab Platform) for batch 2021-25 onwards (post facto) was considered and approved.	(Annexure-VII)
10.	The list of Civil Engineering subjects on SWAYAM portal for examination to be held in the session 2023-2024 was considered and approved.	(Annexure-VIII)
11.	The list/panel of Theory Paper Setters for Ph.D. Course Work Department Elective subject for the examination to be held in the session 2023-2024 was approved.	(Annexure-IX)
12.	The list/panel of Theory Paper Setters for M. Tech Civil Engineering 1 <sup>st</sup> Semester and M. Tech Civil Engineering 3 <sup>rd</sup> Semester (Specialization: Structure Engineering) for the examination to be held in November/December, 2023 was approved.	(Annexure-X)
13.	The list/panel of Theory Paper Setters for M. Tech Civil Engineering 2 <sup>nd</sup> Semester for the examination to be held in May/June, 2024 was approved.	(Annexure-XI)
14.	The list/panel of Theory Paper Setters for M. Tech Civil Engineering (Elective Subjects) for the examination to be held in November/December, 2023 and May/June, 2024 was approved.	(Annexure-XII)
15.	The list/panel of Theory Paper Setters for B. Tech Civil Engineering 3 <sup>rd</sup> , 5 <sup>th</sup> and 7 <sup>th</sup> Semester for the examination to be held in November/December, 2023 was approved.	(Annexure-XIII)
16.	The list/panel of Theory Paper Setters for B. Tech Civil Engineering 4 <sup>th</sup> , 6 <sup>th</sup> and 8 <sup>th</sup> Semester for the examination to be held in May/June, 2024 was approved.	(Annexure-XIV)
17.	The list/panel of Theory Paper Setters for Open Elective Subjects offered by Civil Engineering for the examination to be held in November/December, 2023 and May/June, 2024 was approved.	(Annexure-XV)
18.	The list/panel of Paper Setters for Environmental Studies/Environmental Education/Environmental Science (ES-101) for exam to be held in November/December, 2023 and May/June, 2024 was approved.	(Annexure-XVI)
19.	The list of External Examiners for Ph.D. (Civil Engineering) candidates namely, Mr. Jotesh Gupta (Regn No. 17-Ph.D-026), Mr. Rajesh Kumar (Regn No. 18-Ph.D-022) and Ms. Nitu Balhara (Regn No. 18-Ph.D-025) was approved.	(Annexure-XVII)
20.	The topics of research for M. Tech. (Civil Engineering) 2021 batch candidate namely Mr. Anrish Chander (Roll No.: 11217763), Mr. Brilliance K. Karwee (Roll No.: 11217764), Mr. Awulu James Ugbede (Roll No.: 11217721) and Mr. Ashu (Roll No.: 11217701) as per recommendations by RAC was approved.	(Annexure-XVIII)
21.	The list of external examiners for M. Tech. (Civil Engineering with Specialization in Structural Engineering) 2022 batch candidate namely Mr. Gokarna Awasthi (Roll No.: 11227761), Mr. Ramesh Mandal (Roll No.: 11227762), Mr. Raman Dhiman (Roll No.: 11227764) and Mr. Ekemini Edet Asuquo (Roll No.: 11227765) was considered and approved.	(Annexure-XIX)




# Maharishi Markandeshwar (Deemed to be University)

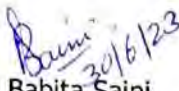
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## Department of Civil Engineering

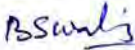
### MINUTES OF THE MEETING OF 29<sup>th</sup> BOARD OF STUDIES (Dated: 30.06.2023)


22.	The Topic and Supervisor(s) of Ph.D. (Civil Engineering) Candidate namely, Rahul Grover (21-Ph.D-052), Parveen Kumar (21-Ph.D-051), Suminder Meerwal (21-Ph.D-053), Sunil Chouhan (21-Ph.D-050), Vikas Kumar (11-ECM-1951), Vikas Bagga (21-Ph.D-056) as per recommendations by RAC was considered and approved. <i>Also the same was considered for Aneesh Goyal (21-Ph.D-54) &amp; Charin Singh (21-Ph.D-57)</i>	(Annexure-XX)
23.	Under any other items, it was recorded that the attainment level of B. Tech (Civil Engineering) has been set as 60% for batch 2018-2022. The external committee members noted that the weightage of external examination is 60% in theory examination. It was suggested that it can be reduced to 50% and rest 50% may be allotted to internal continuous evaluation as it is a very important parameter in student assessing/student's performance. Further it was decided that the set target level for attainment may be increased by 2%-5% for the next batch.	-- <i>30/6/23</i>

  
Dr. R.D. Garg  
(External Expert)

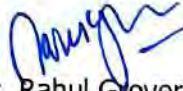
  
Dr. Babita Saini  
(External Expert)

  
Mr. Ujjawal Gupta  
(Industry Expert)

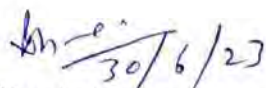
  
Dr. B.S. Walia  
(Member)

  
Dr. Mukesh Saini  
(Member)

  
Dr. Chadetrik Rout  
(Member)

  
Er. Rahul Grover  
(Member)

  
Er. Parveen Kumar  
(Member)

  
Head of Department  
Department of Civil Engineering  
M.M. Engineering College, Mullana (Ambala)

MAHARISHI MARKANDESHWAR (DEEMED TO BE UNIVERSITY)  
MULLANA - AMBALA, HARYANA (INDIA) - 133207

(Established under Section 3 of the UGC Act 1956)

(NAAC Accredited Grade 'A++' University)

M. M. Engineering College, Mullana, Ambala

Department of Computer Science & Engineering

Ref. No.: MMEC/CSE/2023/7.1

Date: 05/07/2023

MINUTES of the meeting of the Board of Studies in Computer Science & Engineering department held on 30.06.2023 at 3:30 pm onwards in hybrid (online / offline) mode. The following members had attended this meeting:

1. Dr. Sandip Goyal, Professor & Head, CSE	In-Chair
2. Dr. Neeraj Nehra, Professor, CSE, Thapar University, Patiala	External Expert (Online)
3. Dr. Sandeep Garg, Associate Professor, IIT Roorkee	External Expert (Online)
4. Mr. Vikas Goel, Senior Software Architect, Resolution Life, Australia	Special Invitee (Online)
5. Dr. Vishal Bharti, Professor, CSE	Member
6. Dr. Sanjeev Kumar, Professor, CSE	Member
7. Dr. Rajneesh Kumar, Professor, CSE	Member
8. Dr. Avinash Sharma, Professor, CSE	Member
9. Dr. Amit Bindal, Professor, CSE	Member
10. Dr. Neeraj Mangla, Professor, CSE	Member
11. Dr. Neera Batra, Professor, CSE	Member
12. Dr. Sandhya Bansal, Professor, CSE	Member
13. Dr. Amandeep Kaur, Professor, CSE	Member
14. Dr. Suneet Kumar, Professor, CSE	Member
15. Dr. Kamal Prakash, Professor, CSE	Member
16. Dr. Vaishali Mehta, Professor, CSE	Member
17. Dr. Deepak Dudeja, Professor, CSE	Member
18. Dr. Prachi Garg, Associate Professor, CSE	Member
19. Dr. Neeraj Raheja, Associate Professor, CSE	Member

Agenda items were discussed one by one and following decisions were taken:

- Minutes of meeting of Board of Studies held on 01 May, 2023 were confirmed.
- Panels of paper setters / examiners of all the theory and practical papers for the examination to be held during (Oct / Nov 2023) of the following courses were recommended and as decided the panels of paper setters / examiners will be sent to the Controller of Examinations separately in a confidential cover:
  - i) B. Tech (CSE & its various specializations) - 1<sup>st</sup> / 2<sup>nd</sup> semester.
  - ii) B. Tech. (CSE)-3<sup>rd</sup>, 5<sup>th</sup> & 7<sup>th</sup> semester.
  - iii) B. Tech (CSE with specialization in Data Science) - 3<sup>rd</sup>, 5<sup>th</sup> & 7<sup>th</sup> semester.
  - iv) B. Tech (CSE with specialization in Cloud Technology & Information Security)-3<sup>rd</sup>, 5<sup>th</sup> & 7<sup>th</sup> semester.
  - v) B. Tech (CSE with specialization in Big Data and Analytics) - 3<sup>rd</sup> semester.
  - vi) B. Tech (CSE with specialization in Full Stack Development) - 3<sup>rd</sup> semester.
  - vii) Open elective subjects floated by CSE department in other departments of MMEC.
- M. Tech (CSE) - 1<sup>st</sup> semester.
- PhD (CSE) - Departmental subjects of course work examination.
- For B. Tech (Computer Sc. & Engineering) (Batch 2020-2024 only), the house considered and approved:
  - Some minor changes in the scheme of 7<sup>th</sup> semester. These changes involve:
    - Subject: (BCSE-518: Compiler Design) is changed to (BCSE-555: Programming Languages).
    - In list of Elective-IV, subject (BCSE-562: Cybersecurity) is replaced by subject (BCSE-634: Information Security and IPR) and a new subject (BCSE-557: Quantum Computing) is added.
    - In list of Elective-V, subject (BCSE-573: Speech & Natural Language Processing) is replaced by subject (BCSE-560: Natural Language Processing) and subject (BCSE-574: Discrete Mathematics) is replaced by subject (BCSE-518: Compiler Design).
    - In list of Open Elective-III, subject (OME: Entrepreneurship and Family Business) is replaced by subject (BECE-550: Internet of Things).
  - As departmental subjects already existed in the scheme of previous batches with same/different code. So, no need to approve syllabi for these subjects.

Head  
Department of Computer  
Science & Engineering  
M. M. Engineering College  
Maharishi Markandeshwar  
(Deemed To Be University)  
Mullana, Ambala, Haryana-133207

05/7/2023

For B. Tech (Computer Sc. & Engineering with Specialization in Cloud Technology & Information Security) (Batch 2020-2024 only), the house considered and approved:

A) Some minor changes in the scheme of 7<sup>th</sup> semester. These changes involve:

i) Subject: (BCSE-517: Compiler Design) is replaced with (BCSE-634: Information Security and IPR).

ii) In list of Open Elective-III, subject (OME: Entrepreneurship and Family Business) is replaced by subject (BECE-550: Internet of Things).

B) Syllabi for departmental subjects of 7<sup>th</sup> semester. This includes:

i) Modifications (more than 20%) in already existing syllabus: Openstack, Privacy and Security of Online Social Media Networks, Information Security and IPR.

ii) As remaining departmental subjects already existed in the scheme of previous batches with same/different code. So, no need to approve syllabi for these subjects.

5. For B. Tech (Computer Sc. & Engineering with Specialization in Data Science) (Batch 2020-2024 only), the house considered and approved:

A) Some minor changes in the scheme of 7<sup>th</sup> semester. These changes involve:

i) Subject: (BCSE-517: Compiler Design) is replaced with (BCSE-617: Advanced Machine Learning).

ii) In list of Elective-IV, a new subject (BCSE-561: Blockchain Technology) is added.

iii) In list of elective-V, subject Recommender System is replaced by subject (BCSE-639: Advanced Big Data Analytics).

iv) In list of Open Elective-III, subject (OME: Entrepreneurship and Family Business) is replaced by subject (BECE-550: Internet of Things).

B) As departmental subjects already existed in the scheme of previous batches with same/different code. So, no need to approve syllabi for these subjects.

6. For B. Tech (Computer Sc. & Engineering) (Batch 2021-2025 onwards), the house considered and approved:

A) Some minor changes in the scheme of 5<sup>th</sup> semester. These changes involve updation in credits of subject Elective-II from 2 to 3 and subject Elective-II Lab is dropped. Total credits remain unaffected.

B) As departmental subjects already existed in the scheme of previous batches with same/different code. So, no need to approve syllabi for these subjects. Only Course objectives & Course Outcomes of subject BCSE-514 : Big Data & Analytics were approved with some updations.

7. For B. Tech (Computer Sc. & Engineering with Specialization in Cloud Technology & Information Security) (Batch 2021-2025 onwards), the house considered and approved Syllabi for CSE departmental subjects of 5<sup>th</sup> semester. This includes:

i) Modifications (more than 20%) in already existing syllabus: Virtualization & Scheduling.

ii) As remaining departmental subjects already existed in the scheme of previous batches with same/different code. So, no need to approve syllabi for these subjects.

8. For B. Tech (Computer Sc. & Engineering with Specialization in Data Science) (Batch 2021-2025 onwards), the house considered and approved Syllabi for CSE departmental subjects of 5<sup>th</sup> semester. As departmental subjects already existed in the scheme of previous batches with same/different code. So, no need to approve syllabi for these subjects.

9. For B. Tech (Computer Sc. & Engineering, Computer Sc. & Engineering with Specialization in Cloud Technology & Information Security, Computer Sc. & Engineering with Specialization in Data Science, Computer Sc. & Engineering with Specialization in Full Stack Development, Computer Sc. & Engineering with specialization in Big Data and Analytics) (Batch 2022-2026 onwards), the house considered and approved Syllabi for CSE departmental subjects of 3<sup>rd</sup> semester. As departmental subjects already existed in the scheme of previous batches with same/different code. So, no need to approve syllabi for these subjects.

10. As per AICTE issued guidelines and suggestions; CSE department has started a new specialization AI & Machine Learning under B. Tech (Computer Sc. & Engineering) course (For Batch 2023-2027 onwards). Entire Scheme (for 1<sup>st</sup> to 8<sup>th</sup> semester) has been approved. Since scheme & syllabus for B.Tech 1<sup>st</sup> year is common for all branches, so 1<sup>st</sup> year syllabi for this specialization will be same as used for other engineering branches.

11. Panel of examiners for the evaluation of PhD thesis of following research scholars were recommended and approved from BoS and will be sent to Controller of Examinations separately in confidential cover:

i) Minakshi Kamboj (Regn. No. 15-PhD-021) entitled, "Secure and Robust Framework for the Management of Cloud Data Centers".

ii) Mr. Zatin Gupta (Regn. No. 09-ECM-1854) entitled, "IoT Based Efficient Approach for Smart Farming".

iii) Ms. Ritu Aggarwal (Regn. No. 11-ECM-1810) entitled, "Meticulous Presaging of Heart Disease using Machine Learning".

iv) Mr. Ravi Kumar Barwal (Regn. No. 18-PhD-042) entitled, "Development of Efficient Data Mining Approaches Using Machine Learning".

v) Ms. Deepti Sharma (Regn. No. 18-PhD-048) on the topic, "An Efficient Breast Cancer Prediction Model Using Machine Learning".

Handwritten signatures and dates at the bottom of the page, including "5/2/2023" and "1/11/23".

- vi) Ms. Deepika (Regn. No. 17-PhD-061) on the topic, "An Enhanced Secure Integrated Framework for Cloud Environment".
- vii) Ms. Vineeta (Regn. No. 19-PhD-022) on the topic, "Efficient Prediction Model for Chronic Kidney Disease Diagnosis Using Machine Learning".
- viii) Ms. Usha Devi (Regn. No. 19-PhD-018) on the topic, "Towards Improving Credit Risk Prediction using Machine Learning Approach".
12. Department has also approved the list of courses which can be floated as open elective course to students of other engineering branches during session July – Nov 2023. These subjects already existed in the CSE scheme. So, no need to approve syllabi for these subjects.
13. Considered & approved the SWAYAM / MOOC courses which can be opted by students (Batch 2020-2024, Batch 2021-2025, Batch 2022-2026 and Batch 2023-2027) under the category of Swayam courses. Also list of approved courses can be expanded.
14. Stakeholders feedback report and research output of the department during session Jan – June 2023 was presented before the house. Based on the feedback, new specialization AI & Machine Learning has been started.
15. PhD synopsis of following research scholars were considered and approved by house (as per the mentioned minutes of RAC meetings):

Sr. No.	Name of the Research Scholar	Registration No.	Topic of Thesis	Supervisor	Date of Approval by RAC
1.	Sonu Chawla	21-PhD-100	Fault-Tolerant Task Scheduling in Cloud Computing Environment	Dr. Amandeep Kaur, Professor, CSE Department, MMEC	18.03.2023

16. After discussion on Attainment of POs, PSOs, COs & target level, the house made following decisions regarding setting of target level for continuous improvement for various courses during upcoming session:

For CO Attainment:

- i) Average Percentage >70%: Level 3, Average Percentage ( $\geq 60$  & <70): Level 2, Average Percentage ( $\geq 50$  & <60): Level 1 And Average Percentage (<50): Level 0
- ii) The respective course instructor may recommend any updation in set target levels depending upon course nature with the prior approval of competent authorities.

The house was made aware about the fact that during last semester, these target levels were:

- i) Average Percentage >65%: Level 3, Average Percentage ( $\geq 55$  & <65): Level 2, Average Percentage ( $\geq 50$  & <55): Level 1 And Average Percentage (<50): Level 0

For PO Attainment:

- Target level: 65% (For PO1, PO2, PO3, PO5, PO8, PO9, PO11), 60% (For PO4, PO7, PO10, PO12), 50% (For PO6)
- The house was made aware about the fact that during last session, these target levels were: 60% (For PO1, PO2, PO3, PO4, PO5, PO8, PO9, PO11), 55% (For PO10, PO12), 50% (For PO6, PO7)

For PSO Attainment:

- Target level: 65% (For PSO1, PSO2, PSO4), 60% (PSO3)

The house was made aware about the fact that during last session, these target levels were: 60% (For PSO1, PSO2, PSO3, PSO4).

7. Discussion on level wise mapping of multiple entry & multiple exit as per NEP 2020 was also done.
18. As per the request made by Head (EE department) regarding approval of Subject code & Subject Syllabus for subjects Java Programming Lab and Data Structure Lab (which is going to be floated by EE department in 3<sup>rd</sup> semester & 4<sup>th</sup> semester respectively under Specialization category), the house considered and approved BCSE-580: Java Programming Lab & BCSE-581: Data Structure Lab syllabi for B. tech. (EE) 3<sup>rd</sup> semester & 4<sup>th</sup> Semester respectively w.e.f. July 2023.
19. Also resolved to authorize the HOD / Chairman Board of Studies of Computer Science & Engineering department to recommend the names of paper setters / examiners for any paper of any course taken by Computer Sc. & Engineering department for the examination to be held during session 2023-24 not covered by the panels of paper setters / examiners recommended under item no. 2 or if the names recommended for any paper in the panels already recommended have been exhausted.

The meeting ended with a vote of thanks to all the members especially to the external experts.

Note: This meeting has been conducted using Google meet online platform. External experts attended this meeting in online mode.

- CC: 1. All Members of the Board of Studies. 2. PA to the Principal. 3. Controller of Examination.  
4. DR (Academic). 5. Head, Electrical engineering Department.

HOD/CHAIRMAN



**MAHARISHI MARKANDESHWAR (Deemed to be University)**  
**Mullana- Ambala, 133207**  
**(Established under Section 3 of the UGC Act. 1956)**  
**(NAAC Accredited Grade 'A' University)**  
**Department of Mathematics & Humanities**

Date: 18.07.2022

MMPU/MA/BOS/22

A meeting of the **Board of Studies** of the Department of Mathematics was held on **18<sup>th</sup> July, 2022 at 11.30 A.M.** in the committee Hall of the administrative block of the university. The following members attended the meeting.

- |   |                  |
|---|------------------|
| 1. Dr. Deepak Gupta, Head & Professor                         | : Chairman       |
| 2. Dr. V.K. Katiyar, Ex. Professor, IIT, Roorkee              | : Member         |
| 3. Dr. Satya Bir Singh, Professor, Punjabi University Patiala | : Member         |
| 4. Dr. Praveen Ailawalia, Professor                           | : Member         |
| 5. Dr. Satish Kumar, Professor                                | : Member         |
| 6. Dr. Vishal Gupta, Professor                                | : Member         |
| 7. Dr. Nidhi Sharma, Associate Professor                      | : Member         |
| 8. Dr. Gurdas Ram, Assistant Professor                        | : Member         |
| 9. Dr. A.K. Tripathi, Assistant Professor                     | : Invited Member |

Chairman B.O.S. extended a warm welcome to the entire members present and explained the agenda of the meeting.

The following items were discussed and recommended for approval and necessary action.

**Item No. 1: Confirmation of the minutes of the previous meeting of Board of Studies:** The minutes of the previous meeting of Board of Studies held on 14th January, 2022 were confirmed (Annexure-1)

**Item No. 2: Approval of the minutes of the previous RAC meetings:** The minutes of the RAC meetings held on 01.02.2022, 25-03-2022, 16-04-2022, 08-06-2022, 30.06.2022 were discussed and recommendations were approved. (Annexure-2)

**Item No.3: The Scheme of B.Sc. (Honor's) Mathematics 1<sup>st</sup> to 6<sup>th</sup> semester as per NEP-2020 was discussed and approved. (Annexure-4)**

**Item No.4: The Scheme and syllabi of M.Sc. Mathematics 1<sup>st</sup> to 4<sup>th</sup> Semester in Online (OL) mode w.e.f. 2022-23 onwards were discussed and approved. (Annexure-5)**

**Item No.5: The modifications in the Scheme and syllabi of M.Sc. Mathematics 1<sup>st</sup> to 4<sup>th</sup> Semester w.e.f. 2022-23 onwards were discussed and approved. (Annexure-6)**

**Item No.6: Approval of Value Added Course: Syllabi of value added course on Vedic mathematics (MAT-601) open for all students of the university was discussed and approved. (Annexure-7)**

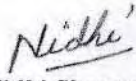
**Item No. 7: The panel of paper setters for M.Sc. (1<sup>st</sup> to 4<sup>th</sup> semesters), B.Tech. (1<sup>st</sup> to 3<sup>rd</sup> semesters), B.Tech. Bio-Tech. (1<sup>st</sup> to 2<sup>nd</sup> semesters), B.Sc. (1<sup>st</sup> to 6<sup>th</sup> semesters), B.Sc. Mathematics Honors (1<sup>st</sup> to 6<sup>th</sup> Semester) & Ph.D. Course work examinations of the university for the session 2022-2023 were discussed and approved. (Annexure-6)**

*Deepak*  
18/7/22

Item No. 9: To consider and approve the panel of examiners for the Ph.D. thesis of Ms. Richa Goel (17-Ph.D.-024), Mr. Sourav Singla (12-ECM-1651), Mr. Sukhvir Singh (12-ECM-1653), Ms. Poojadeep Sehgal (10-ECM-1288), Mr. Sunit Kumar (18-Ph.D.-017), Ms. Rakhi Gupta (18-Ph.D.-021), Ms. Namarata Rani (18-Ph.D.-020) and Ms. Vandana Goyal (18-Ph.D.-018) were discussed and approved (Annexure-7).


The meeting ended with a vote of thanks.

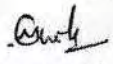
  
Dr. Gurdas Ram


  
Dr. Nidhi Sharma

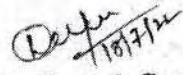
  
Dr. Vishal Gupta

  
Dr. Satish Kumar

  
Dr. Praveen Ailawalia

  
Dr. Satya Bir Singh

(Attended online)   
Dr. V.K. Katiyar

  
Dr. Deepak Gupta  
Chairman  
Board of Studies in Mathematics

Copy to:

1. PA to Principal - for kind information of the Hon'ble Principle
2. Dean (Academic Affairs)
3. Deputy Registrar (Academic)
4. Controller of Examinations
5. Office file



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**Department of Mathematics & Humanities**

XIMBA/MA/BOS/22

Date: 18.07.2022

A meeting of the **Board of Studies** of the Department of Mathematics was held on **18<sup>th</sup> July, 2022 at 11.30 A.M.** in the committee Hall of the administrative block of the university. The following members attended the meeting.

- |   |                  |
|---|------------------|
| 1. Dr. Deepak Gupta, Head & Professor                         | : Chairman       |
| 2. Dr. V.K. Katiyar, Ex. Professor, IIT, Roorkee              | : Member         |
| 3. Dr. Satya Bir Singh, Professor, Punjabi University Patiala | : Member         |
| 4. Dr. Praveen Ailawalia, Professor                           | : Member         |
| 5. Dr. Satish Kumar, Professor                                | : Member         |
| 6. Dr. Vishal Gupta, Professor                                | : Member         |
| 7. Dr. Nidhi Sharma, Associate Professor                      | : Member         |
| 8. Dr. Gurdas Ram, Assistant Professor                        | : Member         |
| 9. Dr. A.K. Tripathi, Assistant Professor                     | : Invited Member |

Chairman B.O.S. extended a warm welcome to the entire members present and explained the agenda of the meeting.

The following items were discussed and recommended for approval and necessary action.

**Item No. 1: Confirmation of the minutes of the previous meeting of Board of Studies:** The minutes of the previous meeting of Board of Studies held on 14th January, 2022 were confirmed (Annexure-1)

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**Item No.6: Approval of Value Added Course:** Syllabi of value added course on Vedic mathematics (MAT-601) open for all students of the university was discussed and approved. (Annexure-7)

**Item No. 7: The panel of paper setters for M.Sc. (1<sup>st</sup> to 4<sup>th</sup> semesters), B.Tech. (1<sup>st</sup> to 3<sup>rd</sup> semesters), B.Tech. Bio-Tech. (1<sup>st</sup> to 2<sup>nd</sup> semesters), B.Sc. (1<sup>st</sup> to 6<sup>th</sup> semesters), B.Sc. Mathematics Honors (1<sup>st</sup> to 6<sup>th</sup> Semester) & Ph.D. Course work examinations of the university for the session 2022-2023 were discussed and approved.** (Annexure-6)

*D. Gupta*  
18/7/22

Item No. 8: To consider and approve the panel of examiners for the Ph.D. thesis of Ms. Richa Goel (17-Ph.D.-024), Mr. Sourav Singla (12-ECM-1651), Mr. Sukhvir Singh (12-ECM-1653), Ms. Poojadeep Sehgal (10-ECM-1288), Mr. Sunit Kumar (18-Ph.D.-017), Ms. Rakhi Gupta (18-Ph.D.-021), Ms. Namarata Rani (18-Ph.D.-020) and Ms. Vandana Goyal (18-Ph.D.-018) were discussed and approved (Annexure-7).

The meeting ended with a vote of thanks.

  
Dr. Gurdas Ram


  
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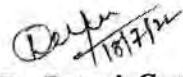
  
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5. Office file





**M. M. Institute of Computer Technology & Business Management,**  
**Maharishi Markandeshwar (Deemed to be University), Mullana**  
(Established under Section 3 of the UGC Act, 1956)  
(Accredited by NAAC with Grade 'A++')

Minutes of the meeting of Board of Studies in Computer Applications was held on **17-07-2023** (Monday) at **12:50 pm** in the Board Room of M.M. Institute of Computer Technology & Business Management, MM (DU), Mullana in hybrid mode. The meeting of BOS fixed for 12.07.2023 was postponed and held on 17.07.2023.

**The following members attended the meeting:**

- |   |                 |
|---|-----------------|
| 1. Dr. Sumit Mittal, Professor, MMICTBM   | Chairman, BOS   |
| 2. Dr. Sonal Chawla, Professor,<br>Dept. of Computer Science & Applications,<br>Panjab University, Chandigarh | External Expert |
| 3. Dr. Munishwar Rai, Professor, MMICTBM  | Member          |
| 4. Dr. Rattan Pal Singh Rana, Professor, MMICTBM  | Member          |
| 5. Dr. Dalip, Assoc. Professor, MMICTBM   | Member          |
| 6. Dr. Deepa Nehra, Assoc. Professor, MMICTBM   | Member          |
| 7. Dr. Pooja Rani, Asstt. Professor, MMICTBM  | Member          |
| 8. Ms. Manju Bagga, Asstt. Professor, MMICTBM   | Member          |

Mr. Mukesh Gupta (External Expert) could not attend the meeting.

Chairman, BOS welcomed all the members especially the external expert for attending the meeting.

**The following items were discussed and approved:**

1. The minutes of the last meeting of Board of Studies held on 09.03.2023 were circulated on 10.03.2023 among all the members. Since no comment has been received, the house confirmed the minutes of meeting and action taken report of the said meeting.
2. Considered and approved the minor changes in the scheme of the following courses as per NEP-2020 under Choice Based Credit Scheme (CBCS) from the batch 2022-26 onwards (Post Facto Approval):
  - (i) BCA
  - (ii) BCA with specialization in Artificial Intelligence and Machine Learning
  - (iii) BCA with specialization in Data Science
3. Considered and approved the new syllabi of the following courses under Choice Based Credit Scheme (CBCS) from the batch 2022-26 onwards w.e.f the session 2023-24:
  - (i) BCA-2<sup>nd</sup> year (3<sup>rd</sup> Sem. & 4<sup>th</sup> Sem.)
  - (ii) BCA-2<sup>nd</sup> year (3<sup>rd</sup> Sem. & 4<sup>th</sup> Sem.) with specialization in Artificial Intelligence and Machine Learning
  - (iv) BCA-2<sup>nd</sup> year (3<sup>rd</sup> Sem. & 4<sup>th</sup> Sem.) with specialization in Data ScienceThe scheme & syllabi of 2<sup>nd</sup> year would remain the same for BCA, BCA with specialization in Artificial Intelligence & Machine Learning and BCA with specialization in Data Science.
4. Considered and approved the new syllabi of the MCA-2<sup>nd</sup> year (3<sup>rd</sup> Sem. & 4<sup>th</sup> Sem.) under Choice Based Credit Scheme (CBCS) from the batch 2022-24 onwards w.e.f the academic session 2023-24.
5. Considered and approved the new syllabi of MP-02: Computer Applications of Ph.D Course Work w.e.f the academic session 2023-24.
6. Considered and approved the syllabi of the value added course VA-MCA-05: Mining and Analysis of Big Data w.e.f the session 2023-24.
7. Considered and approved the list of MOOC subjects for BCA & MCA students for the session 2023-24 (Odd Semester) under the category of SWAYAM Courses.

8. Considered and approved the Paper Setters for the following courses:
- BCA/BCA (OL)-1<sup>st</sup> Sem., 2<sup>nd</sup> Sem., 3<sup>rd</sup> Sem. & 5<sup>th</sup> Sem. examinations to be held in December, 2023
  - MCA/MCA (OL)-1<sup>st</sup> Sem. & 3<sup>rd</sup> Sem. examinations to be held in December, 2023
  - Ph.D Course Work examinations to be held in December, 2023/January, 2024
9. Considered and approved the synopsis & supervisor of the following Ph. D research scholars:

Sr. No.	Name of Scholar	Name of Supervisor	Title of Synopsis	Date of Approval (RAC)
1.	Shivani Gupta (21-Ph.D-109)	Dr. Pooja Rani	Design a Model for Detection of Fungal Diseases in Apple plants using Machine Learning	06.05.2023
2.	Sunil Kumar (22-Ph.D-117)	Dr. Pooja Rani	Development of An AI-based Model for Prediction of Liver Disease	17.06.2023
3.	Narender Jangra (22-Ph.D-118)	Dr. Rattan Pal Singh Rana	Design a Vulnerability Assessment Model to Enhance the Security of IoT Devices	17.06.2023
4.	Ritika (22-Ph.D-116)	Dr. Dalip, Assoc. Professor	Develop a Framework for Handwritten Signature Verification using Deep Learning	07.07.2023

10. Based on the benchmarking and feedback on Curriculum from various stakeholders for the session 2022-23, the following changes has been incorporated in the syllabi of BCA-2<sup>nd</sup> year & MCA-2<sup>nd</sup> year:

Sr. No.	Course Code	Nomenclature	%age of Change
1.	MCA-301	Programming with Python	20%
2.	MCA-302	Cloud Computing	30%
3.	MCA-304 (b)	Mobile Application Development	25%
4.	MCA-304 (c)	NoSQL Database	100%
5.	MCA-305 (b)	Software Project Management	20%
6.	MCA-402	Open Source Technologies using PHP	50%
7.	MCA-403 (a)	Blockchain Technology	60%
8.	MCA-403 (c)	Design and Analysis of Algorithms	40%
9.	MCA-404 (c)	Internet of Things	30%
10.	BCA-301	Database Management System	20%
11.	BCA-302	Web Designing Fundamentals	40%
12.	BCA-403	Operating System	25%
13.	BCA-404	Software Engineering	40%
14.	MAN-001	Indian Constitution	100%

11. Considered and approved the Panel of examiner for the evaluation of Ph.D thesis of Mr. Nippun Kamboj, Regn. No. 15-Ph.D-042 under the supervision of Dr. Dalip.
12. Considered and approved the Vision, Mission of the Institute, Program Outcomes (PO), Program Specific Outcomes (PSOs) and Program Educational Objectives (PEOs) of MCA programme.
13. Considered and approved the revised syllabus of Environmental Education (EnE-101) as prescribed by UGC-2023 w.e.f the session 2023-24.

14. The weightage of continuous assessment (internal marks) and summative assessment (end semester examination) for Theory and Practical courses of BCA/MCA online programme would be 30 and 70 respectively.

The meeting ended with a vote of thanks.



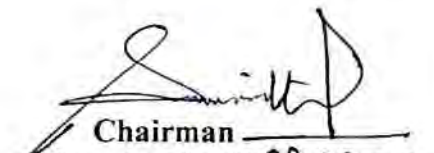
**-Sd-  
Chairman  
Board of Studies**

Endst. No. MMITBMBOS/2023/133

Dated: 08.08.2023

**A copy of the above is forwarded to the following for information & necessary action:**

1. Controller of Examinations, MM(DU)
2. Dean, Faculty of Engineering & Technology, MM(DU)
3. Dean, Academic (Technical), MM(DU)
4. Concerned Members, MMITBMB, MM(DU)
5. Deputy Registrar (Academic), MM(DU)
6. Dr. Sonal Chawla, Professor,  
Dept. of Computer Science & Applications, Punjab University, Chandigarh
7. Mr. Mukesh Gupta, Sr. Manager,  
Mahindra & Mahindra Ltd., Mohali



**Chairman**  
**Board of Studies** 08.08.23



# DEPARTMENT OF PHYSICS

Maharishi Markandeshwar (Deemed to be University)

Mullana - Ambala

(NAAC Accredited Grade 'A++' University)

MM(DU)/PHY/2023/15

Dated: 09/08/2023

A meeting of the Board of Studies was held on August 09, 2023 at 12:30 PM. in the office of undersigned.

Following members attended the meeting:

1. Dr. Vandana Sharma (Chairman BOS)
2. Dr. R.K. Moudgil, Professor, Department of Physics, KUK (External Member)
3. Dr. J.K Sharma (Internal Member)
4. Dr Suresh Kumar (Internal Member)
5. Dr. Renu Sharma (Internal Member)
6. Dr. Chhavi Pahwa (Internal Member)
7. Dr. Gurpreet Kaur (Internal Member)

After extensive discussion following recommendation were made:

1. Approval of minutes of previous BOS held on 09/08/2022
2. Approval of Synopses of following Ph.D candidates (Annexure-A):
  - Ms. Navneet Saini
  - Ms. Shakun Saini
  - Mr. Naveen Sharma
3. Approval of panel of evaluators for the Ph.D. theses of following candidates (Annexure-B):
  - Ms. Manmeet
  - Mr. Vishal Dhiman
  - Mr. Vishal
  - Ms. Suman Saini
4. Approval of modification in the syllabi of Mathematical Physics-I PH-503, Mathematical Physies II ,PH-504 and Physics of Nanomaterials , PH-518 of M.Sc. Physics (Annexure-C)
5. Approval of syllabus of the 1st year of B.Sc. Physics (Hon's/Research) as NEP 2020 Policy (Annexure-D)
6. The panel of paper setters and evaluators for B.Tech, B.Sc.(Honors) Physics, B.Sc. Physics (Honours / Research) NEP 2020 Policy, B.Sc (Non-Medical), M.Sc. (Physics) and Ph.D course work. (Annexure -E)
7. Upgradation of Mr. Deepak Malik from JRF to SRF (Annexure-F)
8. Also resolved to authorize the HOD / Chairman Board of Studies of Physics Department to recommend the names of paper setters / examiners for any paper of any course taken by Physics department for the examination to be held during session 2023-24 not covered by panels of Paper setters / examiners recommended under item no. 6 or if the names recommended for any paper in the panels already recommended have been exhausted.

The meeting ended with a vote of thanks to all the members especially to the external experts.

Dr. Vandana Sharma  
Chairman BOS

- CC.
1. PA to The Director for information pleases.
  2. Dy Registrar Academics
  3. Dy Registrar Finance

19/8/2023

19/8/2023

**MAHARISHI MARKANDESHWAR (DEEMED TO BE UNIVERSITY), MULLANA-AMBALA**  
(Established under Section 3 of the UGC Act, 1956)  
(Accredited by NAAC with Grade 'A++')

No. Acad./SAC./AC/F.13/2142

Dated: 24-02-2023

To  
All the Members of  
Academic Council,  
Maharishi Markandeshwar  
(Deemed to be University)  
Mullana-Ambala.

**Subject: Minutes of meeting of the Academic Council of Maharishi Markandeshwar  
(Deemed to be University), Mullana-Ambala.**

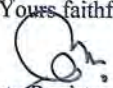
Sir/Madam,

The meeting of the Academic Council of this MM (DU) was held on 10-02-2023 at 11:30 A.M in the Committee Room. A copy of the **Minutes** of the said meeting duly approved by the Vice-Chancellor is being sent herewith for your information. Discrepancy, if any, may kindly be intimated.

Thanking you,

DA.: As above.

Yours faithfully,

  
Deputy Registrar (Acad.)  
for Registrar

<p>Biotechnology (BOS meeting held on 05-08-2022)</p>	<p>Item No.17.7</p>	<p>17.7.1 Consideration and approval of the introduction of the new scheme of B.Sc. (Hons.) Biotechnology &amp; syllabus of 1st and 2nd semester along with electives (July 2022-onwards) as per the NEP 2020 model scheme. <b>Annexure-17.7.1 (Pages 1-24)</b></p> <p>17.7.2. To consider and approve the changes in the syllabi of the following courses:BBIO-505 (Genetics) of B.Tech. Biotechnology 3rd semester,BIO-538 (Bioinformatics) of B.Tech. Biotechnology 7th semester, MMIC-502 (Fundamentals of Microbiology) of M.Sc. Microbiology 1st semester, MMIC-518 (Biostatistics and Computers) of M.Sc. Microbiology 3rd semester, BBIT-525 (Bioinformatics) of B.Sc. (Hons.) Biotechnology 5th Semester, MBIO-506 (Biostatistics and Research Methodology) of M.Sc. Biotechnology 1st semester,MBIO-518 (Proteomics and Genomics) M.Sc. Biotechnology 3rd Semester, MBOT-520 (Plant cell, tissue and organ culture) of M.Sc. Botany 3rd Semester. <b>Annexure-17.7.2 (Pages 1-19)</b></p> <p>17.7.3 To consider the introduction of the following value-added courses: <b>Annexure-17.7.3(Pages 1-8)</b></p> <table border="1" data-bbox="303 459 966 691"> <thead> <tr> <th>Sr. No.</th> <th>Name of Course</th> <th>Duration</th> <th>Start date of the course</th> </tr> </thead> <tbody> <tr> <td>1</td> <td>Entrepreneurship Development and Communication Skills BT-VA-001</td> <td>22 Hrs</td> <td>Offered from August, 2022-onwards</td> </tr> <tr> <td>2</td> <td>Philosophy of Science, Communication, Knowledge &amp; Spirituality BT-VA-002</td> <td>24 Hrs</td> <td>Offered from January, 2023-onwards</td> </tr> <tr> <td>3</td> <td>Floriculture, Land Scaping and Gardening BT-VA-003</td> <td>20 Hrs</td> <td>Offered from January, 2023-onwards</td> </tr> </tbody> </table>	Sr. No.	Name of Course	Duration	Start date of the course	1	Entrepreneurship Development and Communication Skills BT-VA-001	22 Hrs	Offered from August, 2022-onwards	2	Philosophy of Science, Communication, Knowledge & Spirituality BT-VA-002	24 Hrs	Offered from January, 2023-onwards	3	Floriculture, Land Scaping and Gardening BT-VA-003	20 Hrs	Offered from January, 2023-onwards
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<p>Mechanical Engg. (BOS meeting held on 6-08-2022)</p>	<p>Item No.17.8</p>	<p>17.8.1 To consider &amp; approve the syllabi of 'Human Values HSMC-051' (For batch 2020-24 onwards in 6<sup>th</sup> Semester) <b>Annexure -17.8.1 (Pages 1-3)</b></p> <p>17.8.2 To consider &amp; approve the list of Swayam Course. <b>Annexure -17.8.2 (Pages 1-1)</b></p> <p>17.8.3 To consider &amp; approve the list of Value Added Course <b>Annexure -17.8.3 (Pages 1-1)</b></p>																
<p>ICA/BCA (BOS meeting held on 0.06.21)</p>	<p>Item No.17.9</p>	<p>17.9.1 The new syllabi of BCA-3<sup>rd</sup> year (5<sup>th</sup>Sem. &amp;6<sup>th</sup>Sem.) under Choice Based Credit Scheme (CBCS) for the batch 2020-23 w.e.f the session 2022-23 (Post Facto Approval). <b>Annexure-17.9.1 (Pages 1-23)</b></p> <p>17.9.2 The new scheme of BCA (NEP-2020) under Choice Based Credit Scheme (CBCS) from batch 2022-25 onwards w.e.f the session 2022-23. <b>Annexure-17.9.2 (Pages 1-5)</b></p> <p>17.9.3 The new syllabi of BCA-1<sup>st</sup> year (1<sup>st</sup> Sem. &amp; 2<sup>nd</sup> Sem.) [NEP-2020] under Choice Based Credit Scheme (CBCS) from batch 2022-25 onwards w.e.f the session 2022-23. <b>Annexure-17.9.3 (Pages 1-19)</b></p> <p>17.9.4 The scheme of BCA with specialization in Artificial Intelligence and Machine Learning (NEP-2020) under Choice Based Credit Scheme (CBCS) from batch 2022-25 onwards w.e.f the session 2022-23. <b>Annexure-17.9.4 (Pages 1-4)</b></p> <p>17.9.5 The scheme of BCA with specialization in Data Science [NEP-2020] under Choice Based Credit Scheme (CBCS) from batch 2022-25 onwards w.e.f the session 2022-23. <b>Annexure-17.9.5 (Pages 1-4)</b></p> <p>17.9.6 The scheme &amp; syllabi of B.Sc Programming &amp; Data Science-1<sup>st</sup>Sem. [NEP-2020] under Choice Based Credit Scheme (CBCS) from batch 2022-25 onwards w.e.f the session 2022-23. <b>Annexure-17.9.6 (Pages 1-11)</b></p> <p>17.9.7 The scheme &amp; syllabi of B.Sc Animation, VFX &amp; Gaming-1<sup>st</sup>Sem. [NEP-2020] under Choice Based Credit Scheme (CBCS) from batch 2022-25 onwards w.e.f the session 2022-23. <b>Annexure-17.9.7 (Pages 1-11)</b></p> <p>17.9.8 The minor changes in the scheme of MCA under Choice Based Credit Scheme (CBCS) from batch 2022-24 onwards w.e.f the session 2022-23. <b>Annexure-17.9.8 (Pages 1-3)</b></p>																

**MAHARISHI MARKANDESHWAR (DEEMED TO BE UNIVERSITY), MULLANA-AMBALA**  
(Established under Section 3 of the UGC Act, 1956)  
(Accredited by NAAC with Grade 'A++')

No. Acad./SAC./AC/F.13/2142

Dated: 24-02-2023

To  
All the Members of  
Academic Council,  
Maharishi Markandeshwar  
(Deemed to be University)  
Mullana-Ambala.

**Subject: Minutes of meeting of the Academic Council of Maharishi Markandeshwar  
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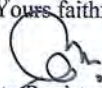
Sir/Madam,

The meeting of the Academic Council of this MM (DU) was held on 10-02-2023 at 11:30 A.M in the Committee Room. A copy of the **Minutes** of the said meeting duly approved by the Vice-Chancellor is being sent herewith for your information. Discrepancy, if any, may kindly be intimated.

Thanking you,

DA.: As above.

Yours faithfully,

  
Deputy Registrar (Acad.)  
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Mechanical Engg. BOS meeting held on 6-08-2022)	Item No.17.8	17.8.1 To consider & approve the syllabi of 'Human Values HSMC-051' (For batch 2020-24 onwards in 6 <sup>th</sup> Semester) <b>Annexure -17.8.1 (Pages 1-3)</b>
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ICA/BCA BOS meeting held on 0.06.21)	Item No.17.9	17.9.1 The new syllabi of BCA-3 <sup>rd</sup> year (5 <sup>th</sup> Sem. &6 <sup>th</sup> Sem.) under Choice Based Credit Scheme (CBCS) for the batch 2020-23 w.e.f the session 2022-23 (Post Facto Approval). <b>Annexure-17.9.1 (Pages 1-23)</b>
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