

New Horizon College of Engineering
(Autonomous college, affiliated to VTU)

Department of Basic Sciences and Humanities

BOARD OF STUDIES MEETING

A-Y 2017-18

DATE: 15TH June 2017

VENUE: : Conference Hall, SBS Block, NHCE

TIME: 9.30 am onwards



Swathi

NEW HORIZON COLLEGE OF ENGINEERING
BOARD OF STUDIES MEETING
DEPARTMENT OF BASIC SCIENCES AND HUMANITIES
AGENDA

- **Agenda 1** : Introduction to I Year scheme of BE (common to all branches)
- **Agenda 2** : Discussion on syllabus for
 - a. **Engineering Physics**
 - b. **Engineering Chemistry**
 - c. **Mathematics**
 1. Engg. Mathematics I
 2. Engg. Mathematics II
 3. Applied Mathematics for M Tech
 4. Advanced Mathematics for M Tech
 5. Discrete Mathematics and graph theory for MCA

{Including discussion on course outcomes, Text and Reference books, Self Study, if applicable}

- Syllabus finalization and Approval
- Discussion on CIE and SEE

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Ravathi

MEMBERS OF THE BOARD OF STUDIES

(LIST TO BE INCLUDED)

Sl No.	Category	Nomination of the Committee	Name of the Person
1	Head of the Dept. - Physics	Chairperson	Dr.Revathi V, Professor and HOD <i>Revathi</i>
	Head of the Dept.- Chemistry		Dr.Anasuya Devi V S, Professor and HOD <i>Dr. Anasuya</i>
	Head of the Dept.- Mathematics		Dr.Srinivasa G, Professor and HOD <i>Dr. Srinivasa</i>
2	Faculty Members at different level veering different specializations	1	Dr. Vijilus Helena Raj, Assoc Prof, Maths <i>Vijilus</i>
		2	Mr. Ananda K, Sr. AP, Maths <i>Ananda</i>
		3	Mr. Prashanth K S, Sr. A P, Physics <i>Prashanth</i>
		4	Ms. Bhavya P, AP, Physics <i>Bhavya</i>
		5	Ms. Padma N. Sr. AP, Chemistry <i>Padma</i>
		6	Ms. Subhashini K, AP, Chemistry <i>Subhashini</i>
3	Subjects Experts from outside the College nominated by Academic Council	1	Dr. Rajanna KR, Prof & HOD, Dept of Mathematics, Acharya Institute of Technology, Bangalore. <i>Rajanna</i>
		2	Dr. Sankar M Professor, Mathematics, East Point College of Engineering & Technology, Bangalore. <i>Sankar</i>
		3	Dr. Bhuvaneshwar Babu Prof and HOD, Dept of Physics RVCE(Autonomous) Bangalore. <i>Bhuvaneshwar</i>
		4	Dr. Hariharan Nalatore, Assoc. Prof., Dept of Physics, SMVIT, Bangalore. <i>Hariharan</i>
		5	Dr. S. Satyanarayana Professor, Dept of Chemistry RVCE(Autonomous) Bangalore. <i>Satyanarayana</i>
5	Expert from outside college, nominated by Vice-Chancellor	Member	VTU Nominee
6	Representative from Industry/corporate sector/ allied area relating to placement nominated by Academic Council	Member	Dr. Sandeep Kumar, Professor, Raman Research Institute, Bangalore. <i>Sandeep Kumar</i>

7	Meritorious alumnus nominated by Principal	Member	Mr.Nithin P V, ME 2012-16 Batch Quality Manager, Microtech CNC.
8	Co-opted member		Ms. Asha K (Maths) <i>Nithin PV</i> Ms. Jisha P K (Physics) <i>[Signature]</i> Mr. Parasuram L (Chemistry) <i>[Signature]</i>
9	Special Invitee		Dr, Manjunatha Principal
10.	Special Invitee		Dr. CSR Prashanth Dean Academics

MEMBERS PRESENT

(LIST TO BE INCLUDED)

SL. NO.	NAME	DESIGNATION AND AFFILIATION	EMAIL ID & PHONE NUMBER	SIGNATURE
1.	Dr. Revathi	HOD Physics, NHCE	revstharic@yahoo.com	Revathi
2.	Dr. Bhuvaneshwara	Professor + HOD RVCE	bhuvaneshwara4k@rvce.edu.in	Bhuvan
3.	Dr. Haribabu N	HOD, Sir. MVIT.	n-haran@yahoo.com	Haribabu
4.	Mr. Nithin. P.V	QC - Alamy Tech INC	nithinprasad@gmail.com	NIP RV.
5.	Mr. Prastanth K S	Sr AP, Phy, NHCE	Prastanth.Kallambali@gmail.com, 9986248564	Prastanth K S
6.	M.S. Bhavya P	Sr AP(2) Phy NHCE	BhavyaP26@gmail.com	Bhavya P
7.	M.S. Jisha P K	Sr AP Phy NHCE	jishasab13@gmail.com, 9900192687	Jisha P K
8.	K. Subashini	Sr AP. Chem. NHCE	subashinikrishna@gmail.com, 9611336446	K. Subashini
9.	L. Parasuram K.	AP Chem NHCE	ramacademy1995@gmail.com	L. Parasuram K.
10.	S. Satyanarayana	Professor of Chemistry R.V. College of Engg.	Satya.SA RVCE.edu.in, 9900497845	S. Satyanarayana
11.	Sandeep Kumar	Ramaram Res. Inst. in Professor	skumar@ramaram.edu.in, 9448309554	Sandeep Kumar
12.	Dr. Anusuya	HOD - Chem NHCE	anusuyamishra@gmail.com	Anusuya
13.	Dr. SRINIVASA G.	Prof & Head Math NHCE	srinivasa1774@gmail.com, 9449817583	Dr. SRINIVASA G.
14.	Dr. Rajanna K R	Prof & Head, AITB	rajanna@acharya.ac.in, 9845475728	Dr. Rajanna K R
15.	Ananda. K	Sr Assst prof, NHCE	anandak@nhcegnur	Ananda. K
16.	Dr. Vijliu Helan Raj	Asso. Prof, NHCE	vijliu.9945373241@gmail.com	Dr. Vijliu Helan Raj
17.	Asha. K	A.P	ashaganavin@gmail.com	Asha. K
18.	Mrs. Padma. N.	Sr. Assst Prof, NHCE	padmachem66@gmail.com	Mrs. Padma. N.

WELCOME ADDRESS BY THE CHAIRMAN OF THE BOS AND INTRODUCTION OF MEMBERS

Minutes:

Dr. Revathi V, HOD Dept Physics, Chairman BOS Physics welcomed each and every member present under BS Board. She explained the purpose and significance of the meeting in her address. Then she individually introduced invited members both from academic and industry, followed by HODs, - Dr, Srinivasa G (HOD- Mathematics), and Dr. Anusuya S V (HOD- Chemistry) along with the faculty members from department under Mathematics, Physics and Chemistry subjects.

NEW HORIZON COLLEGE OF ENGINEERING DEPARTMENT OF BASIC SCIENCES AND HUMANITIES 2nd BOARD OF STUDIES MEETING AGENDA -1

TITLE OF AGENDA: Introduction to I Year scheme of BE (common to all branches)

Minutes:

Welcome and Introduction session of members was followed by introducing the Scheme of I & II Semesters under Physics and chemistry cycles (2017-18).

Thereafter, Chairman BOS Physics opened the meet individually for discussing the drafted syllabus under Mathematics (for BE, MTech and MCA), Engg Physics and Engg Chemistry subjects in forms of three sub-divisions of the BS Board at the same venue. Then, the process continued with the discussion on the each syllabus and scheme by the subject specific BOS members.

Revathi

**NEW HORIZON COLLEGE OF ENGINEERING
DEPARTMENT OF BASIC SCIENCES AND HUMANITIES
2nd BOARD OF STUDIES MEETING**

AGENDA -2

**TITLE OF AGENDA 2 : Discussion on syllabus for subjects under each division of
BS under BSH : Mathematics, Physics and Chemistry**

Minutes of Meeting

1. Mathematics

{Including discussion on course outcomes, Text and Reference books}

All concerned members had a detailed discussion about the syllabus for all Mathematics Subjects. Suggestions given by Dr. Rajanna K R, Prof & Head Dept of Mathematics, AIT and other members were recorded. Dr. Srinivasa G, HOD Mathematics, also expressed his views. The Alumini Member Mr. Nithin P V Suggested that inclusion of **MATLAB** in curriculum or as a certificate course will be of much use for the students in their Projects or in the their higher studies. Dr. Srinivasa G has taken this suggestion and told necessary action to be taken in future semesters. Useful suggestions were recorded as recommendations.

2. Engineering Physics

{Including discussion on course outcomes, Text and Reference books, Self Study}

All concerned members had a detailed discussion about the syllabus for theory and lab. Suggestions given by Dr. Bhuvaneshwar Babu, Prof & Head Dept of Physics, RVCE Dr. Hariharan N Prof. Dept of Physics, MVIT and other members were recorded. Dr. Revathi V, HOD Physics, also presented her thoughts. Discussion pertained to all five modules along with Lab Experiments are recorded. Useful suggestions were recorded as recommendations.

3. Engineering Chemistry

{Including discussion on course outcomes, Text and Reference books, Self Study}

All concerned members had a detailed discussion about the syllabus for theory and lab. Suggestions given by Dr.S. Satyanarayana, Prof. Dept of Chemistry, RVCE Dr.Sandeep Kumar Prof. RRI, and other members were recorded. Dr. Anasuya Devi V S, HOD Chemistry, also presented her thoughts. Discussion pertained to all five modules along with Lab Experiments are recorded. Useful suggestions were recorded as recommendations.

Revathi

NEW HORIZON COLLEGE OF ENGINEERING
DEPARTMENT OF BSH
2nd BOARD OF STUDIES MEETING
AGENDA - 3
Syllabus Finalization and Approval

Minutes:

RECOMMENDATIONS OF THE BOARD (BS: Engg Physics)

Module 1:

- Suggested to remove Davisson and Germer experiment.
- Recommended to include SEM (Qualitative discussion)
- In Quantum mechanics suggested to change sequence of the topics.
- Suggested to discuss broadening of spectral line as application of HUP.

Module 2:

- Approved the unit

Module 3:

- Approved the unit

Module 4:

- Proposed to include discussion on variation of Fermi level with doping concentration along with temperature.
- Recommended that fabrication of semiconductors by lithography to be given as self study topic.
- Suggested that applications to be discussed on Hall Effect.
- Proposed to include Hall Effect experiment.

Module 5:


- Suggestion given to replace nanomaterials synthesis of CVD by PVD.

1) Dr. Bhuvaneshwara Babu.T 

2) Dr. Hariharan.N 

3) Mr. Nithin P.V. 

4) Revathi.V 

5) Prashanth.K.S 

6) Bhavya.P  T. Jisha Pu 

NEW HORIZON COLLEGE OF ENGINEERING
DEPARTMENT OF BSH
2nd BOARD OF STUDIES MEETING
AGENDA - 3
Syllabus Finalization and Approval

Minutes:

RECOMMENDATIONS OF THE BOARD (BS: Engg Chemistry)

Syllabus :-

MODULE 1 :- To add EMF of the cell, electrochemical conventions, and problems.

> To mention specific Li-ion battery (Li-CO₂)

MODULE 2 :- To add organic additives and determination of throwing power of plating bath by Haring-Blum cell.

MODULE 3 :- > Include the mechanism of knocking in Diesel Engine.

> To include disensitized solar cell as a SSA topic.

MODULE 4 :- > Minor corrections are suggested with respect to title of the experiments.

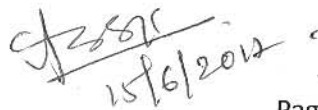
MODULE 5 :- To include poly lactic acid synthesis and application in bio-degradable polymers.

Others :- > Suggested to restrict the maximum number of COs to 4, which shall be mapped to all 5 modules and Bloom's Taxonomy levels.

> Suggested to avoid giving assignment and to give more weightage to SSA and quiz.

 15/6/17

Sandeep Kumar,
15.6.2017

 15/6/2017

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 15/6/17

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RECOMMENDATIONS OF THE BOARD (BS: Mathematics)

Syllabus discussed in detail and the following recommendations were drafted:

- Engg. Mathematics I(17MAT11):

Module 4:

1. To introduce Eigen values and Eigen Vectors of a square matrix.
2. To remove curve tracing of three and four leaved rose.

Module 5:

To remove the solution of system of linear equations by LU-Decomposition, method.

- Engg. Mathematics II (17MAT21):

Module 2:

1. To remove solution of Homogeneous linear P.D.E with constant coefficients.
2. To remove stretched string, heat flow concepts.
3. To introduce various possible solutions of heat, wave and Laplace equations.

Module 3:

To remove application of triple integrals to find volume of revolution.

Module 4:

1. To mention the problems on properties of Laplace Transforms of shifting property, $t^n f(t)$ and $\frac{f(t)}{t}$ forms.
2. To change inverse Laplace Transforms as Module No.5
3. To shift Initial and Final Value theorem to Module No.5

Module 5:

1. To change the module name as Inverse Laplace Transforms.
2. To remove proof of Convolution Theorem.
3. To remove problems on Initial and Final Value theorem.
4. To remove to find Matrix exponential for second order homogeneous and non-homogeneous system by Laplace Transform and spectral form of second order systems

- Discrete Mathematics (17MCA11):

Module 2:

To change proofs of theorem to introduction of proofs and disproofs.

• Applied Mathematics (17ECE11):

Module 1:

1. To introduce Gauss-Seidel iterative method
2. To introduce Power method
3. To remove SOR method.
4. To remove Gershgorin circle theorem

• Advanced Mathematics (17MMD11):

Module 1:

1. To introduce Gauss-Seidel iterative method
2. To introduce Power method
3. To remove SOR method.
4. To remove Gershgorin circle theorem

Module 2:

1. To introduce Trapezoidal rule, Simpson's $1/3^{\text{rd}}$ rule & Simpson's $3/8^{\text{th}}$ rule.
2. To remove integration of equations.

15/6/17. 





Nilo P.V. 

Name and Signatures of all the Attendees:

1. Chairman BOS-Physics Levathi

2. Nithin P.V. NIP.V.

3. Dr. Hariharan N. Hariharan

4. Dr. Bhuvaneshwarbabu Bhuvan
15/6

5. Praseerthi K.S. Praseerthi
15/06

6. Chairman-BOS Praseerthi

7. Subhanshini K. Subhanshini

8. Parashuram L. Parashuram

9. Prof-Sateja Narayana Sateja

10. Dr. Sandeep Kumar. Sandeep Kumar 20.

11. Chairman BOS-Mathematics Sandeep

12. Dr. Vijilius Helana Raj Vijilius

13. Dr. Rajanna K.R. Rajanna

14. Ananda.K Ananda

15. Asha.K Asha

16. Bhanya.P Bhanya

17. Jisha P.K. Jisha

18. Mrs. Padma Padma

19.

VOTE OF THANKS BY THE CHAIRMAN-BOS

Chairman BOS-Chemistry & HOD-Chemistry, Dr. Anasuya Devi V S took the lead in acknowledging the presence of each of the members. She thanked all members from academic and Research institute with HODs of each subject and faculty members under BSO –BS.

She applauded their valuable inputs in deliberation in the meeting and appreciated their contribution of worthy suggestions towards fine tuning the syllabi presented under Autonomous status of NHCE. Thus, Dr Rajanna, K R, Prof & HOD, Dept of Mathematics, AIT were thanked profoundly for discussing all 5 syllabus under Mathematics. Dr. Srinivasa G and Dr Vijilius also thanked the said members.

Chairman BOS specially thanked external BOS members for Engg Chemistry, Dr. Sathyanarayana, Professor, Dept of Chemistry, RVCE for his commendable inputs and presence. Elegant presence of Dr. Sandeep Kumar, Professor, Raman Research Institute was also duly acknowledged.

Dr.. Bhavaneswar Babu, Prof and HOD Dept of Physics, RVCE was credited and profoundly thanked for his inputs in finalizing the tabled Engg Physics syllabus. Mrs. Revathi Joined her in thanking Dr. Hariharan, Prof, Dept of Physics, Sir MVIT.

The presence of alumini member Mr.Nithin P V, (2012-16 Batch Mechanical Engg. Student) was greatly acknowledged for his insightful inputs by Chairman and members of BOS of BS Board.