Amrutvahini College of Engineering, Sangamner
Department of Civil Engineering

Three days Training Programme on "Earthquake Dynamics of Structures using Computer Programming" (EDSCP-18)

Recourse Person- 1) Dr. M. R. Wakchaure
Professor, Deptt. of Civil Engg, AVCOE, Sangamner
Email ID: mrw12@rediffmail.com
2) Dr. N. U. Mate
Associate Professor, Deptt. of Civil Engg, AVCOE, Sangamner.
Email ID: nilesh.mate@avcoe.org

Date of Event – 09/04/2018 to 11/04/2018

Venue –Seminar hall and UG CAD Lab (Civil Engg Department)

Evaluation of new construction techniques together with increasing understanding of the earthquake forces and the building response has certainly contributed positively to decrease earthquake vulnerability. The up-gradation of the seismic standards has resulted in accurate and appropriate calculation of seismic forces that would act upon any structure. It is always easy to set standards but to comply with these is a Herculean task. Even after immense progress in earthquake engineering, large amount of the building structural practices in Indian subcontinent area still follows lower standards of earthquake safety and these would cause heavy catastrophe after the tremor.

It is therefore desirable that the structural engineers should know how to calculate the static and dynamic earthquake forces of structures. IS1893:2016 offers guidelines for regular and irregular structures, and it is insisted by the code to carry out the dynamic analysis for irregular structures, like, Response Spectrum Analysis, Time History Analysis, Pushover analysis and Incremental Dynamic Analysis. The computation of these dynamic forces is a complex task, where the involvement of computer programming is must. This computer programming is gaining popularity amongst the worldwide researchers due to their powerful built in functions.

The aim of the present program to teach the applications of MATLAB tool and SAP 2000 NL software for seismic analysis to the young promising and experienced structural engineers.

The course is specifically targeted to post graduate students, and teachers from engineering institutions.

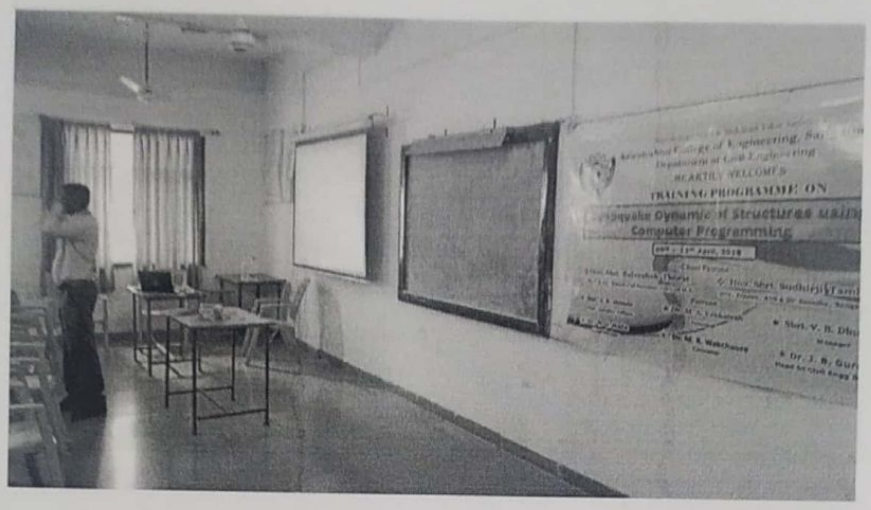
Course content includes,

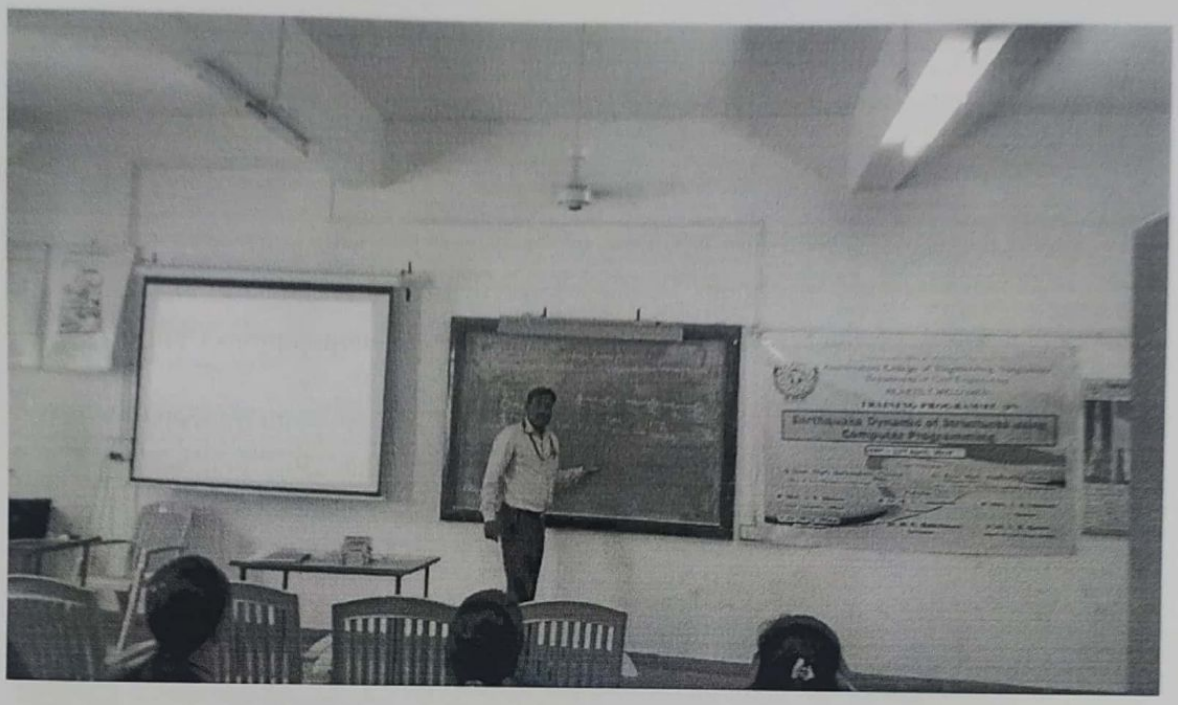
- Numerical evaluation of dynamic response for complex structures as per IS1893:2016.
- Ductile design and detailing of reinforced concrete structures subjected to seismic forces
- Eigen value analysis, buckling analysis, Vibration analysis, response spectrum, Equivalent static earthquake analysis, P-Delta, Pushover analysis, Time history analysis of structures, etc.
- Numerical computing with MATLAB solver.
- Hands on practice on SAP 2000NL software.

Outcome of the Event:

1) Participants have understood the application SAP 2000NL software and MATLAB 2000 solver for structural analysis and design.
2) Participants have learnt how to perform the dynamic analysis of structures specially response spectrum method, push over analysis and time history method etc.
3) Students were encouraged to carry out the some project work related to FEM and dynamics of structures.
4) This program is useful for those students who want to set their own structural design office.

Glimpses of the Event.





Three fold leaflet of the training programme

ANNOUNCEMENT

Three Days Training Programme

On

"Earthquake Dynamics of Structures using Computer Programming"

EDSCP-18

9th- 11th April 2018

Organized By

Department of Civil Engineering

Amrutvahini College of Engineering, Sangamner- 422 608, Dist- Ahmednagar Maharashtra

(Thrice Accredited by NBA, Accredited by NAAC Bangalore with 'A' Grade)

An ISO 9001- 2015 Certified Institute

Phone: 02425-259015/17/320333

Fax: 02425-259016

www.avcoe.org

About the institute

Amrutvahini college of Engineering, Sangamner was established in the year 1983 by Amrutvahini Shetti and Shikshan Vikas Sanstha, Amrutnagar, Sangamner under the visionary and pragmatic leadership of ***Hon'ble Sahakar Maharshi Shri Bhausaheb Santuji Thorat***, a freedom fighter and the doyen of co-operative movement.

The institute is approved by AICTE and is permanently affiliated to University of Pune. The institute has been accredited thrice by NBA, New Delhi, in the year of 2002, 2007 and 2012. The institute has credential of 'A' grade by NAAC Bangalore and is also an ISO 9001:2008 certified institute.

The institute imparts undergraduate engineering courses in Civil, Mechanical, Production, Electronics, Electronics & Telecomm. Information Technology, & Computer Engineering. The institute runs PG courses in Civil Engg., Mechanical Engg., Computer Engg., Electronics and Telecommunication Engg., and MBA. The institute is also a recognized research center in the discipline of Mechanical Engineering.

The institute is known for high academic standards and ambience supported by well qualified, committed and motivated faculty members and enthusiastic and disciplined students.

Location of the Institute:

The institute is well connected by both rail & road. It is located on the Nashik-Pune highway (NH-50). It is 5 km from Sangamner, 56 km from Nashik Road railway station, 50 km from Shirdi (Shrine Shri Sai Baba) & 150 km from Pune. The nearest AirPort is at Shirdi.

Theme and Objective:

Evaluation of new construction techniques together with increasing understanding of the earthquake forces and the building response has certainly contributed positively to decrease earthquake vulnerability. The up-gradation of the seismic standards has resulted in accurate and appropriate calculation of seismic forces that would act upon any structure. It is always easy to set standards but to comply with these is a Herculean task. Even after immense progress in earthquake engineering, large amount of the building structural practices in Indian subcontinent area still follows lower standards of earthquake safety and these would cause heavy catastrophe after the unrest.

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- Numerical computing with MATLAB solver.
- Hands on practice on SAP 2000NL software.

Course faculty:

The resources persons are from various prestigious institutions.

Advisory committee:

- Dr. R K Ingle, Professor & Head, VNIT, Nagpur.
- Dr. O R Jaiswal, Professor, Department of Applied Mechanics, VNIT, Nagpur.
- Dr. M K Shrimali, Professor, Department of Civil Engineering, MNIT, Jaipur.
- Dr. V A Matsagar, Associate Professor, IIT Delhi.
- Dr. S V Bakre, Associate Professor, Department of Applied Mechanics, VNIT, Nagpur.
- Dr. H D Chalak, Assistant Professor, NIT Kurushektra, Harayana.
- Dr. S K Hirde, Professor & Head, GCOE Karad.
- Dr. S N Khante, Professor, GCOE Amravati.
- Dr. S N Madhekar, Associate Professor, COEP, Pune.
- Dr. R L Wankhade, Asst. Professor, GCOE, Nagpur.
- Dr. S Y Kute, Professor, KKWIER, Nashik.
- Dr. A S Sayyad, Sanjivani College of Engineering, Kopargaon, Ahmednagar.
- Dr. Abhay Khandeshe, Structural Consultant, Ahmednagar.
- Dr. S L Ghodke, Post-Doctoral Fellow, IIT Delhi.

Registration Fees:

Category	Home institute	Other institute
Teacher	700 ₹	1500 ₹
Student (UG&PG)	700 ₹	1500 ₹
Consultant/Industry person	1500 ₹	

Who should attend?

The course is specifically targeted to Structural Engineers, Practitioners, Designers in public and private sectors, and teachers from engineering institutions. In additions to above a few seats will be available to post graduate and research students.

PATRONS:

Hon'ble Shri. Balasaheb B. Thorat
M.A and Former Minister of Revenue, Agriculture, Water conservation, Employment Guarantee Scheme & additional charge of School Education Maharashtra State (President: AVS&SV"s, Sangamner.)

Hon'ble Dr. Sudhirji Tambe
M.L.C, Trustee of AV&SSV Sanstha and Senate Member of SPPU.

ShriAnil. B. Shinde
Chief Executive Officer

Dr. M. A. Venkatesh
Principal, Amrutvahini College of Engg., Sangamner

Dr. J. B. Gurav
Head, Department of Civil Engineering

Prof. M.R. Wakchaure
Dean Academics

Contact Address:

Prof. N. U. Mate (Course Coordinator)
Mobile No: 09423622923.
E-Mail: nilesh.mate@avcoe.org

Organizing committee:

Er. V A Auti	Er. A V Navale
Er. V R Rahane	Er. V P Kulkarni
Er. A J Mohure	Er. S. B. Kandekar
Er. A R Ghode	Er. B E Gite
Er. V B Navale	Er. M D Kokate
Er. J A Malunjkar	Er. M R Gadhe
Er. C R Satpute	Er. S B Kolhe
Er. N K Khairnar	Er. P R Mehetre
Er. M A Navale	Er. P R Chandane
Er. J B Sangale	Er. P B Kanawade
Er. D T Kahane	Er. T R More
Er. N V Mande	Er. A P Yadav
Er. C S Kadlag	Er. A C Pemgirkar
Er. A C Bochare	Er. A A Pachore

Three Days Training Programme
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EDSCP-18

Registration Form

Name

Designation

Institute / Organization

Teaching experience/ Field Experience

Mailing Address

Telephone No:

Mobile No.

E-Mail

Specialization

DD No. Date

Bank

Lodging facility required: - Yes / No

Date Signature of the candidate

Signature & Seal of Sponsoring Authority (Shared accommodation will be provided in the institute guest house & in the student hostels to the participants.DD of requisite amount drawn on any nationalized bank in favor of Principal, Amrutvahini College of Engineering payable at Sangamner is to be attached with the application.)

Selection Information:
Please mail the application so as to reach the coordinator on or before 06th April 2018. The number of seats is limited. Selected candidate will be informed by email.

Certificate

Amrutvahini Sheti & Shikshan Vikas Sanstha's

AMRUTVAHINI COLLEGE OF ENGINEERING, SANGAMNER

DEPARTMENT OF CIVIL ENGINEERING

EDSCP-18

CERTIFICATE

This is certify that Mr/Miss/Mrs _____

has participated in three days training programme on **"Earthquake Dynamics of Structures using Computer Programming"** during 9th – 11th April 2018 at Department of Civil Engineering, AVCOE, Sangamner.

Dr. N U Mate	Dr. J B Gurav	Dr. M R Wakchaure	Dr. M A Venkatesh
Coordinator	Head of Deptt.	Dean- Academics	Principal

Invitation letter sent to the various universities and institutes

Amrutvahini Shetti and Shikshan Vikas Sanstha's

AMRUTVAHINI COLLEGE OF ENGINEERING

SANGAMNER- 422 608, Dist- Ahmednagar (M.S.) India

Approved by AICTE, New Delhi, "A" Grade by Govt. of Maharashtra

Accredited by NBA, New Delhi and NAAC, Bangalore

An ISO 9001:2015 Certified Institute

Coordinator
Prof. N U Mate
09423622923
numate@rediffmail.com

To,

_____

_____

Respected Sir,

I am happy to communicate to you that the three days Training Programme on **"Earthquake Dynamics of Structures using Computer Programming"** is being organized by Civil Engineering Department on **9th - 11th April 2018**.

The objectives of the program are as below:

- To create awareness amongst the participant about the developing areas of research in the earthquake and structural engineering using different soft tools and programming.
- To train the civil-structural engineers for the computations of static and dynamic earthquake forces of structures.
- To give the exposure to teacher, engineers, researchers and students about new challenges of seismic analysis of structures using national code specifications and guidelines.

With the strong support and consent of advisory committee members, this program provides a forum to the young academicians and engineers to enhance their skills for research, consultancy and development activities.
The resource persons for the program are having enough experience and numerous publications over the application of structural tools and programming language in the field of earthquake engineering.
It's kind request to you to circulate the leaflet among the concerned staff members and encourage them to be a part of this workshop.

Thanking you,

Dr. J B Gurav
Head, Department of Civil Engineering

Letter of Sanctions from Institute

Saturday, 12th February 2019

Submitted to,

The Principal,
Amrutvahini College of Engineering,
Sangamner

Subject: Permission to conduct the three days training program on "Experimental and Numerical Evaluation of Response of Structures under Vibration and Earthquake loading" 25th-27th April 2019

Sir,

This is with the reference to the civil engineering department self-finance proposal as mentioned above, we will be organizing 03 days training program on "Experimental and Numerical Evaluation of Response of Structures under Vibration and Earthquake Loading" during 25th-27th April 2019. The expected budget expenditure for the said program will be as under.

Sr. No.	Particulars	Approximate Expenditure (Rs)
1	Printing of leaflets, covering letters and envelops. (Qty. 70)	2000.00
2	Postage charges (Qty. 70)	700.00
3	Banners (01 big and 02 medium sizes)	3000.00
4	Certificate printing	1400.00
5	Lunch for outstation participants (70*90*3=18900) and dinner for guest (10*90*3=2700)	21600.00
6	Tea and snacks (60*70*70=4200)	4200.00
7	Breakfast (90*35*70=3150)	3150.00
8	Course Honorarium for guest faculty	18000.00
9	Inaugural valedictory function and faculties during the session. (Bouquets, Shawl, Memento etc.)	2000.00
10	Material to the participants (Pen-Rs.10, Writing Pad-Rs.15, File folder-Rs.45, Course Material printout/CD-Rs.30) (Qty. 70)	7700.00
11	Contingence expenditure	5000.00
	Total	68750.00

The aforesaid program will run by the department of civil engineering under no profit and no loss basis. The revenue collected through participants registration is Rs.69000/-(45*100+25*1500) and program expected expenditure is Rs. 68750/-.

Submitted for your kind perusal and sanction.

Thanking you,

Dr. N U Mate (Course Coordinator)

Through, HOD of Civil Engg.,

Invitation to the advisory committee members of the training programme

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Approved by AICTE, New Delhi, "A" Grade by Govt. of Maharashtra
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An ISO 9001: 2015 Certified Institute

Ref AE Office/17-18 Date: 09/03/2018

To,
Dr. V A Matnagar
Associate Professor, Department of Civil Engineering
Indian Institute of Technology, Delhi
Delhi

Dear Sir,

I am very happy to communicate to you that the three Days Training Programme on "Earthquake Dynamics of Structures using Computer Programming" is being organized by Civil Engineering Department on 5th - 8th April 2018 at our institute under self financed scheme.

The aim of the present course to teach the computation of dynamic earthquake forces for various structures through computer programming and soft tools. The specific objective of present course is to create awareness amongst the participant about the developing areas of research in the earthquake and structural engineering using different soft tools and programming.

Sir, your contribution in the field of structural earthquake dynamics by using various computing tools and programmingare recognized at global level and therefore, wehave put your name in the advisory committee. So, please give us consent to successful conduction of program. We are very much thankful to you for showing interest and encourage us to to organize such kind of events in our institute located in rural part of India.

Looking forward to your interaction and valuable guidance to young academicians.

Thanking you,

Yours truly,

Dr. J B Gurav
Head, Department of Civil Engineering

Dr. N. U. Mate
Training Programme Coordinator

Dr. J.B. Gurav
Head
Dept. of Civil Engineering