

### All India Council for Technical Education



(A Statutory body under Ministry of HRD, Govt. of India) Nelson Mandela Marg, Vasant Kunj, New Delhi-110070 Website: <u>www.aicte-india.org</u>

### AICTE TRAINING AND LEARNING (ATAL) ACADEMY, (ONLINE FDP)

Date: 4th September, 2020

F. No. 01-App No. 1584174193/AICTE/ATAL-HQ/2020-21/

To The Principal Kongu Engineering College Perundurai Railway Station Road, Thoppupalayam, Perundurai 638 060 TAMIL NADU

Sub: Release of a sum of Rs 93,000 /- [Rupees Ninety three thousand only] for AICTE Training and Learning (ATAL) Academy programme Online FDP of Nine Thrust Areas and Other Emerging Areas.

Sir,

This is to convey the sanction of the Council for payment of Rs. 93,000 /- (Rupces Ninety -Three Thousand Only) for conduct of online AICTE Training And Learning (ATAL) Academy Programme [Sustainability Engineering from 07.09.2020 to 11.09.2020] to (Kongu Engineering College, Perundurai Railway Station Road, Thoppupalayam,, Perundurai, TAMIL NADU) under AICTE Training And Learning (ATAL) Academy.

This fund is being released in conformity with the terms & conditions as well as norms of the scheme as already communicated, and also being communicated in this letter.

### The instructions/guidelines to be followed by University/Institution

### I. Release of funds and maintenance of accounts

- a. The University/College/Institute shall maintain proper accounts of the expenditure out of the grants, which shall be utilized only on approved items of expenditure.
- b. The cost for conducting per programme will be Rs.93,000/- as per detail given as under:

	TOTAL:	Rs.	93,000/-
6.	Miscellaneous charges	Rs.	15,000/-
5.	Institutional charges	Rs.	15,000/-
4.	Provision for payment to Lab Attendant engaged during lab practices	Rs.	1000/-
3.	Honorarium for experts (Rs. 3000 per session for total 14 session)	Rs.	42,000/-
2.	Honorarium to Co-ordinator Rs.2000/- per day x 5 days	Rs.	10,000/
1.	Honorarium for Director	Rs.	10,000/

Programmes having permission to change amounts under different heads with overall ceiling of Rs 0.93 lakh being intact.

c. The grant is subject to the adjustment on the basis of Utilization Certificate in the prescribed proforma to be submitted by the University/College/Institution.

Further, the accounts of the institute will be open for test check by the Council or Controller & Auditor General of India or any other officer designated by them.

### II. Disbursement of funds to institutions

The full amount of the grant sanctioned will be released as an advance to the University/Institute through electronic transfer on the account of the University/Institute after submission of mandate form

### III. Conduct of test and issuance of certificate

- A test shall be conducted by coordinator at the end of the program.
- The certificates shall be issued to those participants who have attended the program with minimum 80% of attendance and scored minimum 60% marks in the test.

### IV. Submission of documents by university/institution

- a. The following mandatory relevant documents are required to be submitted by the university/institution within one month of the completion of the program: -
  - (i) List of candidates who have successfully completed the program on the basis of the test conducted by Program Coordinator.
  - (ii) A program completion report along with photographs, videos, media report is to send after the completion of workshop along with the list of participants and Utilization Certificate, Expenditure Statement and feedback form etc. within one month of conduct of AICTE Training and Learning (ATAL) Academy programme.
- b. The amount of the grant shall be adjusted on submission of utilization certificate & detailed expenditure statement by University/Institution. On receipt of these documents, the total amount of financial assistance, admissible as per the norms, shall be worked out and grant-in-aid shall to adjust.

### V. General Instructions

- a. **Maximum 200 participants** may be allowed to attend online FDP on a first come first serve basis however AICTE officials may be allowed to attend over and above 200 number. Coordinators are free to admit less number of participants depending on the feasibility.
- b. You are requested to allow new participants and discourage participants who have already done one online ATAL FDP earlier.
- c. A test has to be conducted (may be online) on the last day and those who score more than 60% will be termed as successful candidates. Those who have attendance 80% or more and also score more than 60% in the test will be issued a digital certificate.
- d. These **online sessions are to be recorded** as the facility is available on the software which is being used for online delivery of FDP. You are also requested to share recording of sessions with AICTE.

### e. Eligibility for Participants:

- (i) The faculty members of the AICTE approved institutions, research scholars, PG, Scholars, participants from Government, Industry (Bureaucrats/ Technicians/ Participants from Industry etc.) and staff of host institutions.
- (ii) Not more than 30% from Host Institution
- f. If programme is not conducted in the year 2020 only, there leased amount, along with interest accrued thereon, has to be returned back to AICTE.

- g. Any extra money required to complete the programme must be borne by the institute from their own resources but the quality of the activities should not be compromised.
- h. Any unavoidable circumstantial change in the Program with respect to name of Project Coordinator, and date for organizing online AICTE Training and Learning (ATAL) Programme would mandatorily require prior approval of the Council. All such requests should be addressed to ATAL Academy, in advance, recording the specific reasons for proposed changes, failing which the offer for the grant already issued would be treated as automatically withdrawn and the financial assistance released in favour of the beneficiary institution shall be refunded immediately to the Council.

This Sanction Order may be treated as Offer Letter for all purposes.

[M. SUNDARESAN] REGIONAL OFFICER AICTE, SRO, CHENNAI

Copy forwarded for information and necessary action to: -

- 1. Coordinator ATAL Programme
- 2. ATAL Academy Cell AICTE HQ
- 3. Guard File.

### Kongu Engineering College, Perundurai, Erode -638060. Department of Mechanical Engineering

AICTE Training and Learning (ATAL) , New Delhi Sponsored Five days Faculty Development Programme on

"Modern Techniques of Diagnosis and Prognosis of Rotating Machinery Faults"

Date	Session I 9.30 am to 11.00 am	Session II 11. 00 am to 12.00 Noon		Session III 2.00 pm to 3.30 pm
07-09-20	Machine Learning Approach to Fault Diagnosis Dr. V. Sugumaran Professor/Mechanical Engineering, VIT, Chennai.	Stochastic Analysis of Bladed Disc System: Chanlages and Solutions Mr.Rahul Kumar Research Scholar Dept. of Applied Mechanics Indian Institute of Tecnology (MADRAS)	. Brake	Finite Element Technique to Predict the Failure of Rotating Parts - Hip Prosthesis A Case Study Dr.S.Shankr, Professor/Mechatronics Engineering Kongu Engineering College, Perundurai
08-09-20	Condition Monitoring of Turbine Blade  Dr.R.Prakash, Assistant Professor/Department of Mechanical Engineering, NIT, Trichy.	Introduction to Sensors and Signal processing techniques for condition monitoring of rotating machines Dr.M.Amarnath Assistant Professor/Department of Mechanical Engineering IIITDM, Jabalpur	Lunch	Motor Current Analysis  Dr.Albert Alexander Professor/ Department of Electrical and Electronics Engineering Kongu Engineering College, Perundurai
09-09-20	Modal Analyses and Experimental Correlation Dr.R Santhanam, Scientist "F" DRDL (DRDO), Hyderabad.	Vibration Measuring Instruments and Signal Processing for Different Applications Dr. S.B.Kandagal, Principal Research Scientist, (Structures) Aerospace Engineering IISc, Bangalore.		Condition Monitoring of Composite Drive Shaft Dr.G.Rajeshkumar Associate Professor//Department of Mechanical Engineering, PSG Institute of Technology and Applied Research, Coimbatore.
10-09-20	Energy Aspects in Fans and Blowers for Diagnosis Mr.M.Vivekanadhan CEO, TryCAE Industrial Engineering, Visiting Faculty-NITT Trichy.	Yoga and Human Values Dr.R.Thamilselvan HOD/Department of Computer Applications, Kongu Engineering College, Perundurai.		Vibration Analysis of Rotating Machinery Dr. M.Yuvaraja Associate Professor//Department of Mechanical Engineering, PSG College of Tech. Coimbatore.
11-09-20	Bearing Vibration using Algorithms and Research focus Dr.S.Devendran Associate Professor/ Department of Mechanical Engineering, VIT, Vellore.	Fault Diagnosis Systems -Overview Dr. Hemantha Kumar Associate Professor/ Department of Mechanical Engineering, NIT, Suratkal.		Online test and Valedictory

### ATAL workshop on Modern Techniques of Diagnosis and Prognosis $\Big|\ 2020$ of Rotating Machinery Faults

### Participants List:

SI No.	Name	Institute	Email	Phone
1	Mr. Jariwala Samir Dhansukhlal	Shroff S R Rotary Institute of Chemical Technology	samirjariwala83@gmail.com	9825547691
2	Dr. BARANIRAJ A	Government college of engineering,salem- 11	baranıraj.a@gmaii.com	
3	Dr. Murugan P C	KONGU ENGINEERING COLLEGE	murugan.mech@kongu.ac.in	9500968262
4	Dr. SAJI RAVEENDRAN P	Kongu Engineering College	saji.mech@kongu.ac.in	9790432974
5	Mrs. V.Ramya	Sri Sai Ram Institute of Technology	ramyaah80@gmail.com	9940296680
6	Dr. P.NAVANEETHAKRISHNAN	Kongu Engineering College	pnk.mech@kongu.edu	9842950323
7	Dr. S.KATHIRESAN	Kongunadu College of Engineering and Technology (Autonomous)	kathiakash@gmail.com	9786242332
8	Dr. GUKENDRAN R	Kongu Engineering College, Perundurai	gukendran.r@gmail.com	9842468578
9	Dr. MOGANA PRIYA C	Kongu Engineering College	mogana98@kongu.ac.in	9976855006
10	Mr. Girishkumar Mohanlal Bramhakshatriya	Shroff S.R. Rotary Institute of Chemical Technology	girishvarde@gmail.com	9979562454
11	Mr. M MAKESHKUMAR	KONGU ENGINEERING COLLEGE	msmakeshkumar@gmail.com	9715857958
12	Mr. Venkateshwaran	Ksr polytechnic college	Venkateshwaran2020@gmail.com	9788796321
13	Dr. K G SARAVANAN	Sona College of Technology	kgsmechanical@gmail.com	9842740648
14	Dr. Shunmugesh K	Viswajyothi College of Engineering and Technology	shunmugesh@vjcet.org	9947929956
15	Mr. Ramachandran P	Kongunadu Polytechnic College	sriraman305@gmail.com	9566417335
16	Dr. Mohan Kumar Anand Raj	Kongu Engineering College	amohanmech2006@gmail.com	9442710605
17	Mrs. R.GAYATHRI	PAAVAI COLLEGE OF ENGINEERING	gayathrieee5@gmail.com	9791337389
18	Dr. Sathishkumar T P	Kongu Engineering College	tpsathish81@gmail.com	8072996380
19	Dr. J KANDASAMY	Maturi Venkata Subba Rao Engineering College	kandaswamy_mech@mvsrec.edu.i 94413	
20	Mr. T VINOTHKUMAR	RVS College of Engineering and Technology, Coimbatore	tvinoth15f@gmail.com	9790432880
21	Mr. Sanjeev Kumar Lambha	GURUKULA KANGRI VISHWAVIDYAL AYA HARIDWAR	fetgkvsanjeevlambha@gmail.com	9897058062

22	Mr. YOGARAJ N	V S B ENGINEERING COLLEGE	yogaraj0506@gmail.com	7904358658
23	Mr. V.VAIRAMANI	KONGUNADU COLLEGE OF ENGINEERING AND TECHNOLOGY	vairamani88mech@gmail.com	9003077126
24	Mr. K.GOPALAKRISHNAN	KONGUNADU COLLEGE OF ENGINEERING AND TECHNOLOGY	gopalkrishnan18@gmail.com	9944915997

### ATAL workshop on Modern Techniques of Diagnosis and Prognosis $\left|\ 2020\right|$ of Rotating Machinery Faults

25	Mr. IBRAHIM SHERIFF.K.A	Kongu Engineering College,Perundur ai	ibusheriffmech786@gmail.com	9080445494
26	Mr. CHANDIRAN R	Mahendra College of Engineering, Salem	chandiran3@gmail.com	9597756560
27	Mr. N.Saravanan	Kongu engineering college	nsaravanan03@gmail.com	9488076564
28	Dr. S.K.THANGARASU	KONGU ENGINEERING COLLEGE	skthangarasu@gmail.com	9942783338
29	Mr. G.Thangaraj	Knowledge institute of technology	gtmech@kiot.ac.in	7667049422
30	Mr. Abhinav Kumar	Shri Shankaracharya Institute Of Professional Management & Technology Raipur Chhattisgarh	a.kumar@ssipmt.com	7999577828
31	Mr. Vishant Kumar	School of Engineering & Technology	guliavishant@gmail.com	9888924514
32	Mrs. G.KALAIMAGAL	Kongunadu College of Engineering and Technology	kalai.gkm@gmail.com	9962722265
33	Dr. S.JEYASUDHA	K.Ramakrishnan College of Technology	jeayasudhas.eee@krct.ac.in	9629054969
34	Dr. Sudershan B Gadwal	A. G. Patil Institute of Technology	drsbgadwal@gmail.com	9130646448
35	Mr. AHOBAL N	Dayananda Sagar College of Engineering. Bengaluru	ahobalnb@gmail.com	7411608530
36	Mr. HARI BS	Kongu Engineering College	bsharime@gmail.com	9443399590
37	Mr. MANIKANDAN	Bharath Institute of Higher Education and Research, Chennai	rmkpremium@gmail.com	7012023060
38	Mr. Karthik MK	Bharath Institute of Higher Education and Research	karthikmechatronics@gmail.com	9094072763
39	Mr. RAMAKRISHNA MADHIRA	Bharath Institute of Higher Education & Research	ramuaero@gmail.com	8122289298
40	Mr. MAHA VISHNU E	Bharath institute of higher education and research	mahavishnu518@gmail.com	9092536657
41	Dr. DineshKumar Karupanasamy	Kongu engineering college	k.dineshkumar@yahoo.co.in	9443599356
42	Dr. RAMAKRISHNAN S	KONGU ENGINEERING COLLEGE	srmech.mech@kongu.edu	9715541194
43	Mr. SENTHIL S M	kongu Engineering College	smsmech@kongu.ac.in	9994884614
44	Dr. Sivakumar Annamalai	KONGU ENGIEERING COLLEGE	askmechkongu@gmail.com	8870067895
45	Mr. Praveen Kumar S	Kongu Engineering college	praveenkumar.mts@kongu.edu	9500575414
46	Dr. M.Sundararaj	Bharath Institute of Higher Education and Research	sundar.sonic@gmail.com	9840844425

47	Dr. Rajasekar R	Kongu Engineering College	rajasekar.cr@gmail.com	9952460698
48	Mr. JAYANI DHARMESH CHIMANBHAI	Tapi Diploma Engineering College,Surat	jiyanidharmesh16@gmail.com	9558899042
49	Dr. Selvakumar Subramanian	Kongu Engineering College	selvasumathy@gmail.com	9842960609
50	Dr. Harikrishana Kumar M	Kongu Engineering College	m.harikrishnakumar@gmail.com	9715808222

## ATAL workshop on Modern Techniques of Diagnosis and Prognosis of Rotating Machinery Faults

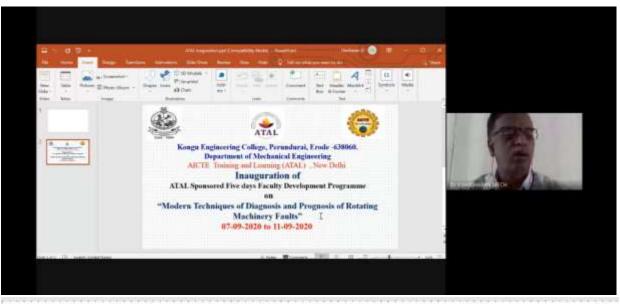
51	Mr. Hemantharaja kommineni	K L Deemed to be University	komminenihemantharaja@gmail.co m	9666665322
52	Mr. Pragash s	VSB engineering college Karur	aeropragash@gmail.com	9964880994
53	Dr. K.Umamaheswari	V.S.B Engineering College	umakrishnan21@yahoo.co.in	8012124309
54	Dr. M.Sambathkumar	Kongu Engineering College	sambathkumar.mech@kongu.edu	9952306585
55	Dr. M. Vijay Anand	Kongu Engineering College	vijayanand@kongu.ac.in	9942834224
56	Dr. K.Deepandurai	Kongu Engineering College	deepan.mech@kongu.edu	9994543214
57	Dr. P.Prabhakaran	Kongu Engineering College	prabakr.p@gmail.com	9943113999
58	Dr. Baskar Chelladurai	Kongu Engineering College	baschelladurai@gmail.com	9994050745

### Feedback from participants:

- 1. Overall nice organization □ kindly share the recorded lectures in google drive to download.
- 2. All speakers from reputed institutions made the sessions very useful.
- 3. This FDP gives the eye opener for the new researchers in the area of rotating systems.
- 4. The session topics are discussed very elaborately and easy to understand.
- 5. The Yoga and Human values session was valuable during this pandemic.

(Dr.P.Thangavel)

(Dr.V.Hariharan)









Kongu Engineering College, Perundurai, Erode -638060.

Department of Mechanical Engineering

AICTE Training and Learning (ATAL), New Delhi

### Inauguration of

ATAL Sponsored Five days Faculty Development Programme

on

"Modern Techniques of Diagnosis and Prognosis of Rotating Machinery Faults" I

07-09-2020 to 11-09-2020



# AICTE TEACHING AND LEARNING FACULTY DEVELOPMENT PROGRAMME



Under Thrust Area: Sustainability Engineering
On

# Modern Techniques of Diagnosis and Prognosis of Rotating Machinery Faults

07-09-2020 to 11-09-2020

### **REPORT**

AICTE TEACHING AND LEARNING ACADEMY, PUNE

Organized by

DEPARTMENT OF MECHANICAL ENGINEERING
KONGU ENGINEERING COLLEGE
ERODE, TAMILNADU - 638060.

AICTE Teaching and Learning sponsored 5 days Faculty Development Programme on "Modern Techniques of Diagnosis and Prognosis of Rotating Machinery Faults" was conducted from 7<sup>th</sup> to 11<sup>th</sup> September 2020 in which around 100 participants from different parts of the country participated.

The speakers for the 5-day workshop on "Modern Techniques of Diagnosis and Prognosis of Rotating Machinery Faults" were:

### Dr. V. Sugumaran, Professor/Mechanical Engineering, VIT, Chennai.

#### Education

- PhD in Machine Learning approach to fault diagmosis of roller bearing at Amrita Vishwa Vidhyapeetham, Coimbatore (2008)
- M. Tech. in Production Engineering and Technology from VTU (2004)
- B. E. in Mechanicl Engineering, Bharathiar University (1998)

#### Experience

- 18 years as a teaching faculty. Areas of proficiency are in applications of machine learning especially machine condition monitoring using tools like Artificial Neural Networks, Fuzzy logic, Data Mining and Support Vector Machines at VIT University, Chennai.
- 2 years in TataFones with expertise in planning, scheduling and monitoring sub-contractor quality. Developed and maintained quality records to meet the requirements of ISO-9001 Certification.
- No. of Patents filed: 20,

	,
Date & Session	Title
07-09-2020 & I	Machine Learning Approach to Fault Diagnosis

Mr.Rahul Kumar, Research Scholar, Dept. of Applied Mechanics, (Solid Group) Indian Institute of Technology Madras (IITM), Chennai.



#### Education

- Rahul is currently a research scholar in the Dept. of Applied Mechanics, Indian Institute of Technology Madras. He is working under the supervision of Prof. Shaikh Faruque Ali and Prof. Sayan Gupta.
- Before joining IIT Madras for PhD, he has completed B. Tech in Mechanical Engineering with distinction from Cochin University of Science & Technology Kochi (Batch of 2015)
- Research interests are: Reduced Order Modeling Rotor Dynamics, Uncertainty Quantification

Date	&	Sess	sio	n
07-09	-2	020	&	II

### Title

Stochastic Analysis of Bladed Disc System: Challenges and Solutions

### Dr.S.Shankar, Professor/Mechatronics Engineering, Kongu Engineering College, Perundurai - 638 060.



#### Education

- PhD in Contact Mechanics at IIT Madras, Chennai (2008)
- M. Tech. in Engineering Design from Bharathiar University (2002)
- B. E. in Mechanicl Engineering, Bharathiar University (2001)

### **Experience:**

- 4 Years of Research experience in Contact Mechanics using FEA concepts
- 2 Years of Industrial Experience in Structural Analysis using ANSYS
- 10 Year Experience in Teaching at Kongu Engineering College, Erode, Tamilnadu

Date & Session	Title
07-09-2020 & III	Finite Element Technique to Predict the Failure of Rotating Parts - Hip Prosthesis A Case Study.

### Dr.R.Prakash, Assistant Professor/Department of Mechanical Engineering, NIT, Trichy.



#### Education

Ph.D in Applied Mechanics from IIT Madras, Chennai, 2015. M.E in Engineering Design from Anna University, Chennai, 2010. B.E in Mechanical Engineering from Anna University, Chennai, 2005. **Experience** 

Assistant Professor, National Institute of Technology, Tiruchirappalli, Tamil Nadu.

Senior Assistant Professor, SASTRA Deemed to be University, Thanjavur, Postdoctoral Research Associate, Texas A&M University at Qatar, Doha, Qatar.

Senior Assistant Professor, SASTRA Deemed to be University, Thanjavur, Faculty on Contract, National Institute of Technology, Puducherry, Karaikkal, India.

Date & Session	Title
08-09-2020 & I	Condition Monitoring of Turbine Blade

### Dr.M.Amarnath, Assistant Professor/Department of Mechanical Engineering, IIITDM, Jabalpur



### Education

- Ph.D., in Fault Assessment in Spur gear and Helical gear using vibration and Tribological Analysis from IITM, Chennai (2008)
- M. Tech in Maintenance Engineering, Visvesvaraya Technological University, Mysore. (2002)
- B.E in Mechanical Engineering from National Institute of Engineering, University of Mysore, (1999)

#### Experience

- Visiting Research Fellow, Chiba University, Japan.
- Assistant Professor, Indian Institute of Information Technology,
- Design & Manufacturing Jabalpur. (July 2007 to 29th June 2010)
- Associate Professor, Indian Institute of Information Technology, Design & Manufacturing Jabalpur. (July 20010 to 29th Jan 2012)
- Assistant Professor, Department of Electrical Engineering, Indian Institute of Technology Ropar, (30th Jan 2012 to till this date)

Date & Session	Title

08-09-2020 & II	Introduction to Sensors and Signal processing techniques for condition monitoring of rotating machines			
	rofessor/ Department of Electrical and Electronics			
Engineering, Kongu Ei	ngineering College, Perundurai -638060.			
	<ul> <li>Education</li> <li>Postdoctoral Research Fellow from Northeastern University, Boston, MA, USA,2017</li> <li>Ph.D.in Power Electronics for solar photovoltaic systems from Anna University, Chennai, (2014)</li> <li>M. E., Power Electronics and Drives, Mepco Schlenk Engineering College, Sivakasi Tamil Nadu, India. (2007)</li> <li>Experience</li> <li>4 Years of Research experience in Multilevel Invertors at Kongu Engineering College, Erode, Tamil Nadu</li> </ul>			
	13 Year Experience in Teaching at Kongu Engineering College, Erode, Tamil Nadu			
Date & Session	Title			
08-09-2020 & III	Motor Current Analysis			

### Mr.R Santhanam, Scientist "F", DRDL (DRDO), Hyderabad.



### Education

- Pursuing PhD in Shape Memory Alloy at IIT Madras, Chennai.
- M.E. in Compute Aided Design from Periyar University, Salem (2002)
- B. E. in Mechanicl Engineering, Bharathidasan University (2000)

### **Experience:**

- Joined as Scientist B in Aerospace Structures Division, DRDL, DRDO, Hyderabad in 2002
- Presently Scientist F in Aerospace Structures Division, DRDL, DRDO, Hyderabad

Date & Session	Title		
09-09-2020 & I	Modal Analyses and Experimental Correlation		

### Dr. S.B.Kandagal, Principal Research Scientist, (Structures), Aerospace Engineering, IISc, Bangalore.



#### Education

- Ph.D, Indian Institute of Science (2005)
- M.Tech, NITK, Suratkal (1992)
- B.E, NITK, Suratkal (1989)

#### **Experience**

- Principal Research ScientistStructures in Aerospace Department , IISc.Bangalore.
- He has more than 150 publications in various international journal and conferences.
- He also has a patent on "form with displaceable vibratory panel".
- He has guided 3 PhD students, 17 ME students and has worked in around 110 consultancy projects.

Date & Session	Title			
09-09-2020 & II	Vibration Measuring Instruments and Signal Processing			
	for Different Applications			

### Dr.G.Rajeshkumar, Associate Professor//Department of Mechanical Engineering,

### PSG Institute of Technology and Applied Research, Coimbatore.



#### **Education**

- B.E in Mechanical Engineering from Sri Ramakrishna Institute of Technology, Coimbatore in 2010
- M.E Engineering Design From Anna University in 2012 with a Gold Medal.
- Ph.D. in Investigations on Development and Characterization of *Phoenix sp.* Fiber and its Epoxy Composites from Anna University, Chennai in 2017.

#### **Experience**

- Associate Professor in the Department of Mechanical Engineering, PSG Institute of Technology and Applied Research, Coimbatore from 2017 to till now.
- Assitant Professor, in the Department of Mechanical Engineering at Kongu Engineering College, from 2012 to 2017

Date & Session	Title		
09-09-2020 & III	Condition Monitoring of Composite Drive Shaft		

### Mr.M.Vivekanadhan, CEO, TryCAE Industrial Engineering, Visiting Faculty-NITT, Trichy.

#### **Education**

- B.Tech. in Mechancial Engineering from SASTRA University, 2009
- M.Tech. CAD/CAM From Anna University in 2015.
- Pursuing Ph.D. in CFBC Boiler/Energy from NIT, Trichy.

#### Experience

- TryCAE Industrial Engineering Pvt. Ltd.CEO, September, 2016 to Till date
- Uttam Industrial Engg. Trichy, DGM Design (R&D)January, 2016 to August, 2016
- Uttam Industrial Engg. Trichy, Senior Manager Design & R&DJanuary, 2013 to December, 2015
- Uttam Industrial Engg, Trichy, Manager Design (Head) January, 2009 to December, 2012

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Date & Session	n Title		
10-09-2020 & I	Energy Aspects in Fans and Blowers for Diagnosis		

### Dr.R.Thamilselvan, HOD/Department of Computer Applications, Kongu Engineering College, Perundurai.



### Education

- MCA from Bharathidasn University, during 2000
- M.E., in Computer Scienc and Engineering, From Anna University, 2005
- Ph.D., From Ann University, 2013

#### **Experience**

• 20 years of Teaching as a Professor in Computer Applications at Kongu Engineering College, Erode, Tamil Nadu

Date & Session	Title
10-09-2020 & II	Yoga and Human Values

## ATAL workshop on Modern Techniques of Diagnosis and Prognosis of Rotating Machinery Faults

### Dr. M.Yuvaraja, Associate Professor/Department of Mechanical Engineering, PSG College of Tech., Coimbatore.



#### Education

- B.E in Mechanical Engineering, Bharathiar University, 2003
- M.E., CAD/CAM from Anna University, 2005
- Ph.D., From Ann University, 2014

### Experience

• 16 years of Associate professor in Mechanical Engineering Department, PSG college of Technology Coimbatore, Tamil Nadu

Date & Session	Title	
10-09-2020 & III	Vibration Analysis of Rotating Machinery	

### Dr.S.Devendran, Associate Professor/ Department of Mechanical Engineering, VIT, Vellore.



### Education

- B.E in Mechanical Engineering , Government College of Engineering, Salem, 2003
- M.E., Engineering Design from Anna University, 2007
- Ph.D., Vibration Based Fault Diagnosis of Bearing and Gear Using Artificial Intelligent Techniques from VIT University, Vellore, 2016

#### Experience

- 4 .5 years as a Production Quality Engineer at Kumar Industrial works, Salem, Tamilnadu, India.
- 2.5 years as an Mechanical Design Engineer at Prima Automation Systems Private Limited, Chennai
- 9.5 years Associate professor in Mechanical Engineering Department, VIT University, Vellore, Tamil Nadu, India.

Date & Session	Title		
11-09-2020 & I	Bearing Vibration using Algorithms and Research focus		

### Dr. Hemantha Kumar, Associate Professor/ Department of Mechanical Engineering, NIT, Suratkal.



### Education

- Ph.D IIT Madras (2009)
- M.Tech VTU (2003)
- B.E in Mechanical Engineering Mysore University (2000)

#### Experience

• 8 years Associate professor in Mechanical Engineering Department, NIT, Suratkal, Karnataka, India.

Date & Session	Title
11-09-2020 & II	Fault Diagnosis Systems -Overview

### Kongu Engineering College, Perundurai, Erode -638060. Department of Mechanical Engineering

AICTE Training and Learning (ATAL) , New Delhi Sponsored Five days Faculty Development Programme on

"Modern Techniques of Diagnosis and Prognosis of Rotating Machinery Faults"

Date	Session I 9.30 am to 11.00 am	Session II 11. 00 am to 12.00 Noon		Session III 2.00 pm to 3.30 pm	
07-09-20	Machine Learning Approach to Fault Diagnosis Dr. V. Sugumaran Professor/Mechanical Engineering, VIT, Chennai.	Stochastic Analysis of Bladed Disc System: Chanlages and Solutions Mr.Rahul Kumar Research Scholar Dept. of Applied Mechanics Indian Institute of Tecnology (MADRAS)	. Brake	Finite Element Technique to Predict the Failure of Rotating Parts - Hip Prosthesis A Case Study Dr.S.Shankr, Professor/Mechatronics Engineering Kongu Engineering College, Perundurai	
08-09-20	Condition Monitoring of Turbine Blade  Dr.R.Prakash, Assistant Professor/Department of Mechanical Engineering, NIT, Trichy.	Introduction to Sensors and Signal processing techniques for condition monitoring of rotating machines Dr.M.Amarnath Assistant Professor/Department of Mechanical Engineering IIITDM, Jabalpur	Lunch	Motor Current Analysis  Dr.Albert Alexander Professor/ Department of Electrical and Electronics Engineering Kongu Engineering College, Perundurai	
09-09-20	Modal Analyses and Experimental Correlation Dr.R Santhanam, Scientist "F" DRDL (DRDO), Hyderabad.	Vibration Measuring Instruments and Signal Processing for Different Applications Dr. S.B.Kandagal, Principal Research Scientist, (Structures) Aerospace Engineering IISc, Bangalore.		Condition Monitoring of Composite Drive Shaft Dr.G.Rajeshkumar Associate Professor//Department of Mechanical Engineering, PSG Institute of Technology and Applied Research, Coimbatore.	
10-09-20	Energy Aspects in Fans and Blowers for Diagnosis Mr.M.Vivekanadhan CEO, TryCAE Industrial Engineering, Visiting Faculty-NITT Trichy.	Yoga and Human Values Dr.R.Thamilselvan HOD/Department of Computer Applications, Kongu Engineering College, Perundurai.		Vibration Analysis of Rotating Machinery Dr. M.Yuvaraja Associate Professor//Department of Mechanical Engineering, PSG College of Tech. Coimbatore.	
11-09-20	Bearing Vibration using Algorithms and Research focus Dr.S.Devendran Associate Professor/ Department of Mechanical Engineering, VIT, Vellore.	Fault Diagnosis Systems -Overview Dr. Hemantha Kumar Associate Professor/ Department of Mechanical Engineering, NIT, Suratkal.		Online test and Valedictory	







### ALL INDIA COUNCIL FOR TECHNICAL EDUCATION

Nelson Mandela Marg, Vasant Kunj, New Delhi – 110 070

### **AICTE Training And Learning (ATAL) Academy**

### **Certificate**

This is certified that **SAJI RAVEENDRAN P**, **Assistant Professor** of **Kongu Engineering College** participated & completed successfully AICTE Training And Learning (ATAL) Academy **Online** FDP on "**Sustainability Engineering**" from **2020-9-7** to **2020-9-11** at **Kongu Engineering College**.

Mundasone

**Director ATAL Academies** 



Jambaran

Coordinator

### KONGU ENGINEERING COLLEGE, PERUNDURAI - 638060 UTILIZATION CERTIFICATE FOR THE FINANCIAL YEAR 2020-2021 AICTE Training and Learning Academy (Online FDP)

AICTE File No.

: F.No.01-App.No.1584174193/AICTE/ATAL-HQ/2020-21

Name of Co-ordinator

:Dr.V.HARIHARAN

Dates of the Programme

: 07-09-2020 to 11-09-2020

Title of the ATAL Programme

: Modern Techniques of Diagnosis and Prognosis of Rotating

Machinery Faults

SI.	ALCTE C	acilinery raul	15
No.	AICTE Sanction Order/Letter No. & Date under which grant was sanctioned	Amount (Rs.)	•
1.	F.No.01-App.No.1584174193/ AICTE/ATAL-HQ/2020-21, Dated 4 <sup>th</sup> September 2020 AICTE Training and Learning Academy (Online FDP)	93000.00	Certified that out of the grant-in-aid of Rs.93000/-(Ninety Three Thousand only) sanctioned by the AICTE during the financial year 2020-2021 in favour of Kongu Engineering College as per letter mentioned in the margin, Rs. 93000/- on account of unspent balance of previous year, Rs.NIL on account of other income / receipts, a sum of Rs.93000/- has been utilized for the purpose for which it was sanctioned and the balance of Rs. NIL remained unutilized at the end of the year.

Certified that I have satisfied myself that the conditions on which the grant-in-aid was sanctioned have been duly fulfilled and that I have exercised the following checks to see that the money was actually utilized for the purpose for which it was sanctioned.

### Kinds of checks exercised: -

Audited Annual Accounts of the Institute Receipt and Payment account Periodical Progress Reports.

(1). Name, Signature & Address of the Claimant/Awardee/Coordinator with seal Dr. V. HARIHARAN M.E., Ph.D.,

Professor of Mechanical Engineering: Kongu Engineering College, Perundurai. Erode-638 052

2). Signature of Chartered Accountant:

Name of Chartered Accountant:

Membership No: Rubber stamp:

Full Address:

Date: 17.10.20

U.DIN: 2=026921AAAAGIS4863 C. VELUMANI, B.Sc., F.C.A.,

Chartered Accountant

Date:

Full Address:

(3). Signature of Head of the Institute: Name & Designation of the Head of Institute:

Rubber stamp:

Dr. V. BALUSAMY PRINCIPAL

KONGU ENGINEERING COLLEGE THOPPUPALAYAM(PO)

PERUNDURAI (TK) ERODE-638060 TAMILNADU.INDIA

33/1, Annamalai Layout, (4). Signature of the Finance Officer Accounts Officer:

Name of the Finance Officer Accounts Officer: (If it is Govt./Govt. Aided Institute)