

National Institute of Technology, Tiruchirappalli: Proforma for CV of Faculty/ Staff Members

Brief Profile of Prof. S. Natarajan **Professor/MME and Chairman/CECASE**



Prof. S.Natarajan has been serving the National Institute of Technology, Tiruchirappalli since 1978 in the Department of Metallurgical and Materials Engineering. His academic background is in M.Sc. Chemistry (Madras University) and Ph.D. Metallurgical Engg (REC, Trichy / now NIT). His doctoral thesis relates to weldment corrosion and its control in power plant materials. He exhibited his passion and commitment for teaching and research which culminated him eventually to attain professional competence to win several coveted awards: Best Project Guide Award (1992), Best Teacher Award (2007), National Mascot Award from ECSI (2008) for outstanding contributions to Corrosion Science and Engineering, Award from Golden Jubilee Distinguished Alumni of NITT (2014), Award for outstanding reviewing of technical articles from Taylor & Francis group of publishers. He has been rendering guidance to 13 PhD and 12 MS Scholars besides 9 PhDs and 2 MS awarded earlier.

Prof. S. Natarajan served as Head of the Department of Metallurgical and Materials Engineering during 2009-12. As HOD, he received Best Department award in 2009. He also served as TEQIP phase I Academic Nodal Officer during 2008-09 and has been serving as Chairman, Centre of Excellence in Corrosion and Surface Engineering (CECASE) since its formal inception in 2012, which is offering MS / PhD programmes for executives drawn from industry.

Prof. S. Natarajan has been carrying out research in the areas of Corrosion Engineering, Surface Engineering and Industrial Tribology. He has, to his credit, 71 journal publications and 41 Conference proceedings. Recently (2013) he successfully completed, as Principal Investigator, a sponsored project of Neyveli Lignite Corporation, in the area of Erosion and Corrosion Control in Centrifugal Pumps of Lignite Mines with a cost of Rs.48.2 lakhs which has subsequently led to a filing of a joint patent.

Under the banner of CECASE, as Chairman, he has organized many workshops, seminars, colloquia, program on international corrosion awareness day every year and also a National Conference pertaining to the theme of the Centre besides launching an online CECASE News Bulletin,. Sophisticated instrumentation facilities for Corrosion and Surface Engineering laboratories worth of Rs. 5.0 crores have been established under the banner of CECASE and Technical Education Quality Improvement Program funded by World Bank. Prof. S. Natarajan has been on the Editorial Board of international journals of Surface Engineering and Materials and Manufacturing Processes published by Taylor & Francis. CECASE is now striving for attaining global recognition.

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9. Academic/Administrative Responsibilities within the University

Position	Faculty/Department/Centre/Institution	From	To
Chairman	Center of Excellence in Corrosion and Surface Engineering (CECASE), NITT.	12.10.2011	(Till date)
Professor & Head	Metallurgical and Materials Engineering Dept., NITT.	02.01.2009	30.01.2012
TEQIP Nodal officer (Academic)	At Institute level.	06.03.2008	25.01.2010

10. Academic/Administrative Responsibilities outside the University

Position	Institution	From	To
Question paper setter	Madurai Kamaraj University, Madras University, Periyar University, NIT Warangal, NIT Surathkal.	2000	2012
Member, Board of studies	Periyar University, Salem	2000	2003
Question paper setter & valuer	Indian Institute of Metal and Institution of Engineers, Calcutta.	2000	2012
External Expert committee member for evaluation of their in house R&D project activities	NLC, Neyveli	24.07.2013	--
Resource person	Holy Cross College, Tiruchirappalli for their event, National Conference on Corrosion Control Organized by National Corrosion Council of India	Nov 30, 2007	Dec 01, 2007

11. Awards, Associateships etc.

Year of Award	Name of the Award	Awarding Organization
1998	Best Project Guide Award	DTE, Govt. of Tamil Nadu
2007	Best Teacher Award	NITT
2008	National MASCOT Award	Electrochemical Society of India (ECSI)
2009	As HOD / MME received Best Department Award	NITT
2014	Award received from Golden Jubilee Distinguished Alumini	NITT
2009-13	Several times received Best Research Paper Awards	In various conferences organized by NAL Bangalore and other professional bodies.

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2006-16	Reviewership in journals such as surface engineering, materials and manufacturing process, Materials and Design, Metallurgical Transactions A, etc.,	For international journals published by Elsevier, Taylor & Francis, Springer, ASTM and ASME
2015	Award for outstanding contribution in reviewing technical articles	International Journal of Materials And Manufacturing Processes published by Taylor & Francis group, USA.
From 2008 onwards	Several times served as Technical Expert	CSIR-CECRI Scientists' promotions.

12. Fellowships: **NIL**

Year of Award	Name of the Fellowship	Awarding Organization	From (Month/Year)	To (Month/Year)

13. Details of Academic Work

(i) Curriculum Development:

- a) As HOD / MME, was instrumental to re-launch M.Tech. (Industrial Metallurgy) – Full time course after a period of three decades at NITT.
- b) Established Surface Engineering lab under TEQIP phase I in MME department.
- c) As Chairman / CECASE, was instrumental to launch MS (By Research) for sponsored part time candidates drawn from industrial organizations of repute.

(ii) Courses taught at Postgraduate and Undergraduate levels

UG Level: Metallurgical thermodynamics, Corrosion Engineering, Non Ferrous Extraction.

PG Level: Thermodynamics and Kinetics, Corrosion Engineering, Surface Engineering, Industrial Tribology.

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Feedback from M.Tech students and MS & Ph.D. Scholars

S.No	Session	Programme (M.Tech./MS/Ph.D)	Subject	Feedback on 10 point scale
1	Nov-2009	M.Tech-MSE	MT655-Thermodynamics and Kinetics	8.9
2	Nov-2011	M.Tech-MSE	MT655-Thermodynamics and Kinetics	9.5
3	Nov-2011	M.Tech-IM	MT622- Surface Engineering	9.3
4	Nov-2013	M.Tech-MSE	MT655-Thermodynamics and Kinetics	8.6
5	Nov-2013	MS-CECASE	MT622- Surface Engineering	10.0
6	May-2014	M.Tech-IM	MT614- Corrosion Engineering	8.4
7	May-2014	M.Tech-MSE	MT614- Corrosion Engineering	9.0
8	May-2014	MS-CECASE	MT614- Corrosion Engineering	10.0
9	May-2014	PhD-CECASE/MME	MT614- Corrosion Engineering	10.0

(iii) Projects guided at Postgraduate level:

S.No	Title of the project	Student name	year
1	Polarization studies on boiler steel weldments in acid medium	S.Manimozhi	Dec 1989
2	Corrosion behaviour of type 347 H Stainless steel weldments in acid medium	S.Singaravelu	Dec 1989
3	General corrosion and stress corrosion cracking (SCC) behaviour of modified 9Cr-1Mo(SA213 T91) steel weldments used in power plants	L.JohnBerchmans	Dec 1991
4	Studies on selective Ni-Co black coating for solar energy application	N.Karuppiah	Dec 1991
5	Studies on various properties of high temperature coatings on mild steel	P.RajeshAnanthaSelvan	Jan 2000
6	Special coating on Stainless steel for high temperature applications	A.Joesph Francis Arokiaraj	Jan 2000
7	Influence of Electro polishing on special characteristics of stainless steel	K.Lakshmi	Jan 2000
8	Corrosion and its inhibition in pressure and resistance weldments used in power plant materials	P.J.Antony	Jan 2003

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9	Evaluation of electrochemical and surface characteristics of conversion coatings on ZM21 Magnesium alloy	V.RaviKiran	Dec 2003
10	Influence of anodizing and conversion coatings on ZM21 Magnesium alloy towards its surface characteristics and electrochemical properties	P.Gerald Tennyson	Jun 2004
11	Dry sand abrasive and slurry erosive wear behaviour of thermomechanically treated AISI 1038 carbon steel	R.Karthick	Jun 2006
12	Evaluation of hot cracking susceptibility of P91 austenitic strain steel using Varstraint Test.	Ramesh .M	2006
13	Evaluation of Hydrogen assisted cracking susceptibility of Grade 91 steel using implant test.	Guruprasad.V	2006
14	Corrosion and its inhibition in power plant chrome-Moly steels fabricated using FCAW process with variation in Gas composition.	Santhosh Kumar.D	2006
15	Combined effect of heat input and Gas composition on corrosion behavior of flux cored Arc Weldment in power plant Chrome –Moly steels	Santhosh Kumar.D	2007
16	Role of Plasma nitro carburized and Duplex coatings on stainless steels towards better wear and corrosion resistance	M.Mamatha Kumari	2008
17	Evaluation of Tribological behavior of WC/C coating on steels.	Pranab Kumar Mahato	2008
18	Influence of Tribological factors on the dry sliding wear behavior of Al/SiCp Brake pad Tribosystem.	Anoop	2008
19	Room temperature sliding wear behavior of Al 6061/Ti C-ZrB2 insitu composites.	N.Chadira Sekhar	2008
20	Development of Al 6063/TiC in situ composite and the influence of TiC particles on the sliding wear behavior	Jagesh Sharma	2008

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21	High temperature tribological behavior of Ti 6Al 4V alloy for automobile/aircraft disc brakes.	Naveen.R	2008
22	Room temperature sliding wear behavior of Al 6351/ZrB2 in situ composites	G.Naveen Kumar	2008
23	Development of Al-ZrB2 in situ composite and its high temperature wear behavior.	Senthil Kumaran.S	2008
24	Evaluation of dry sliding wear behavior of PECVD CLC coatings on steels	Rajesh Tikka	2008
25	Erosive wear behavior of Al 6063/TiB2 in situ composites.	B.Anil Kumar	2008
26	High Temperature sliding wear Erosive wear and abrasive wear behavior of AA 6351/ZrB2 in situ composite.	G.Naveen kumar	2009
27	Development of AA 6063/TiC in situ composite and the influence of TiC particles and the wear behavior.	Jagesh Sharma	2009
28	Study of dry sliding wear of plasma sprayed Mo-Ni/Cr-Ti-Al-4V Tribo parameters	More Satish dashrath Rao	2009
29	Wear and erosive behavior of Cr3C2-NiCr coated Ti 6Al4V alloy –Brake pad pair for automobile/aircraft disc brakes at elevated temperatures	Naveen.R	2009
30	Synthesis and Evaluation of Mechanical and Tribological properties of Al-TiC in situ composites.	Pranab Kumar Mahato	2009
31	Studies on high temperature tribological behavior of Carbon-Carbon composites.	Anoop kumar	2009
32	Structure property correlation in Tungsten and Carbon alloy systems.	M.Mamatha Kumari	2009
33	Evaluation of High temperature wear behavior of Mg Matrix composites	Rajesh Tikka	2009
34	Comparison of abrasive wear behavior of Tribaloy T-400 on Stainless steel 316 and stainless steel 410 by plasma spray process.	K.Kiranbabu	2009

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35	Slurry-erosive behavior of WC-Co-Cr coatings of Stainless steel AISI 316.	Pritesh Notwani	2009
36	Use of Artificial neural network for predictive of corrosion behavior of flux cored arc welding weldments in 1 Cr-0.5 Mo steel in acidic environment.	Pritesh Notwani	2010
37	Evaluation of Microstructure and wear behavior of SMAW hardfacings.	K.Kiranbabu	2010
38	Abrasive and Erosive wear behavior of Al 6061/Ti C-ZrB ₂ in situ composite.	N. Chandira Sekhar	2010
39	Studies on hot corrosion behavior of Ni-Cr-coatings at different temperature (800 C & 900 C) on SA 213 T91 boiler steel weldments	Anil Kumar	2011
40	Corrosion response of 316SS in different corrosive media	R.Vishnu	2012
41	Studies on electrodeposition of Co, Co-P & Co-W.	K.Balaji	2012
42	Studies on cyclic oxidation and hot corrosion of NiMoNiC80A in sodium sulphate with carbon at 900°C and 940°C	Mohammed kutty	2012
43	Studies on high temperature cyclic oxidation and hot corrosion of 310 stainless steel in sodium sulphate	Rahul singh	2012
44	Studies on cyclic oxidation and cyclic hot corrosion of NiMoNiC 80A super alloy in sodium sulphate environment at elevated temperature range of 900°C to 940°	Deepak	2012
45	Study on 310SS under the process of cyclic oxidation and hot corrosion in the environment of carbon with sodium sulphate	Tayade nitamkumar	2012
46	Hot corrosion and high temperature oxidation studies on autogenous GTA welded MONEL 400 plate	Ramu torrikonda	2012
47	Hot corrosion and high temperature oxidation studies TIG welded boiler grade steel T23	Nachiket kumthekar	2012

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48	Hot corrosion and high temperature oxidation study on dissimilar welded AISI 304 and AISI 310 stainless steel	Dharmvir kumar	2012
49	Tribo-corrosion behavior of SS 316 in artificial sea water.	R.Vishnu	2013
50	Electrodeposition of Co-W/graphite Composite coatings.	K.Balaji	2013
51	Hot corrosion studies on autogenous GTA welded monel 400 plates	Ramu torrikonda	2013
52	Hot corrosion study on dissimilar welded AISI 304 and AISI 310 stainless steel plate	Dharmvir kumar	2013
53	Study of hot corrosion of boiler grade steel T23	Nachiket kumthekar	2013
54	Studies on the wear behaviour of SS304 on plasma sprayed NiCr-Cr3C2 coating	Ajay jayaram	2013
55	Electrodeposition of cobalt – tungsten graphite composite coatings: effect of bath temperature on coatings	Sree kumar	2014
56	Studies on high temperature wear behaviour of SS304 on thermal sprayed NiCr-Cr3C2 coating	Ajay jayaram	2014
57	Electrodeposition of cobalt tungsten/ tungsten di-sulphide composite coatings: effect of surfactant and current density on coatings	P Nidhin narayanan	2014
58	Studies on erosion behavior of 17-4 PH stainless steel with and without coatings	P Thamarai kannan	2015
59	Hot Corrosion Study on Friction Welded Joint of Ti Tube to 304L Stainless Steel Tube plate with Copper Interlayer using an external tool.	Y.M. Priyanka	2015
60	Study of Mechanical properties and Corrosion behavior of 4A and 5A Cast Duplex Stainless Steel in different heat treatment conditions	Kousik Polley	2015
61	High Temperature Erosion behavior of Stellite 6 Hardfaced Austenitic Stainless Steel 304	Patil Mangesh Shantaram	2015

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(i) Other contribution(s):

(a) Patent filed, based on NLC project:

Patent Title: *High Longevity Coatings and Alternate Material for Erosion and Corrosion resistance in Mining Pumps.* (Application No: 5145/CHE/2014, date of filing: 14/10/2014)

(b) Self appraisal on TEQIP activities as Academic Nodal officer:

- Served as a Nodal Officer (Academic) during 2008-2009 for TEQIP phase I.
- During my tenure, the maximum score of 9.7 out of 10.0 points was reached.
- NIT-T became the topper amongst all NITs .
- Under the banner of TEQIP, I conducted three Short term courses and Work shop.
- Undertook collaborative project with NIT-K Surathkal.
- Many faculty of the Institute were motivated to undergo one month training in Universities abroad.
- Took lot of initiative to bring many Stalwarts from abroad to deliver Invited Lectures under TEQIP. (Example : Dr.T.S.Sudarshan of USA, a World renowned Expert in Surface Engineering)
- It was a matter of great opportunity for me to associate with TEQIP, a World Bank sponsored scheme of MHRD, Govt of India. Indeed, it was a great boon to myself both technically and administratively and also to the Institute.

(c) Self appraisal on assignment as HOD/MME:

- Nomination of faculty member as additional coordinator for every regular and research laboratory for achieving better efficiency and monitoring.
- Utilization of equipment and machinery in each laboratory for proper requisition forms.
- Coordination and good rapport amongst various labs.
- Ensuring periodically, proper entries and maintenance of log books of every lab.
- Regular conduct of monthly department faculty meeting (DFM).
(for 2009 – 14, 2010 – 12, 2011 – 12 DF meetings were duly conducted and minutes documented).
- Circulating the minutes of every such meeting within three to four days.
- Hundred percent compliance towards financial grant for all regular labs based on their actual requirements.
- Uniform allocation / equal distribution of total allocated annual plan fund to all research labs.
- Display / updating of all notable events of the departments.
- Allotment of Ph.D scholars to the faculty based on the prescribed norms etc.,
- Was instrumental to re-launch M.Tech. (Industrial Metallurgy) – Full time course after a period of three decades at NITT.

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All these had eventually helped me to ensure reasonable transparency and smooth sailing in discharging my duties both at administrative and academic level. Thus I could duly discharge my responsibilities of the HOD post.

(d) Self appraisal on assignment as Chairman/CECASA:

Have been instrumental and could serve as constant monitor for the last four years since inception of CECASA for the following accomplishments.

- A separate space location allocated by the administration for housing the equipments procured under CECASA in the second floor of main administrative building
- The ongoing services rendered by CECASA for consultancy and research projects involving equipments worth of Rs.4.0 Crores
- The huge number of industrial executives (22 PhDs and 37 MS scholars) presently pursuing for their degrees,
- Existence of effective interactions with as many as 15 industries of repute for R&D and Consultancy Collaborations.
- Conduct of two trainings programs, three colloquia, one short term course, one workshop, one national conference, two seminars till date
- The presentation of seven technical papers in International SMT 26 Conference held in Ecole, France during June 2012.
- Organising one day seminar on Corrosion and Surface Engineering: Global Scenario with Dr. T.S. Sudarshan, a World Renowned Expert as the Chief guest cum the main thematic speaker held at Chennai on May 13, 2016 are some of the highlights that stand testimony for the credentials of CECASA.
- An alumnus has emerged as MS Degree holder (Mr. R. Sankaran, Diesel Loco Shed, S.Rly. Ponmalai, Trichy) in track record time with prescribed minimum duration of two and half years,
- A DRDO-GTRE sponsored project worth of Rs.9.8 lakhs has been received and presently ongoing (PI:self).
- A project proposal with myself as PI on Studies on corrosion and tribological characteristics of various components and major assemblies involved in small turbo fan engine (STFE) has been submitted to GTRE-DRDO. The cost of the project is around Rs. 70.0 lakhs.

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14. Details of Major R&D Projects

Title of Project	Funding Agency	Duration		Status
		From	To	Ongoing/ Completed
Evaluation and Prevention of Corrosion in Storm Water Control Pumps of Neyveli Lignite Mines (as PI)	M/s. Neyveli Lignite Corporation, Neyveli (Cost Rs.48.2 Lakhs)	Dec, 2009	Feb,2013	Completed
Enhancing life of DE-Watering Pipes in Coal/Lignite Mines By prevention of Erosion Corrosion with Nano-Crystalline Surface Engineering Treatments (as Co PI)	Coal Science & Technology Grant, CMPDI Ranchi, Ministry of Coal, Govt. of India. (Cost Rs.2.16 Crores)	Sep,2012	Aug,2016	Completed
Investigations on the effects of mechanical working and surface treatments on Al 3003 alloy for oil tank applications.	DRDO-GTRE (CARS) (Cost Rs.9.80 Lakhs)	Nov,2016	--	Ongoing (This project has been sanctioned to CECASE)
Studies on corrosion and tribological characteristics of various components and major assemblies involved in small turbo fan engine (STFE).	DRDO-GTRE (Cost Rs.70.0 Lakhs proposed)	Nov,2016	--	Proposal submitted by CECASE (which is under active consideration of DRDO)

15. Details of PhDs guided

Sl. No	Name of the PhD Scholar	Title of PhD Thesis	Role(Supervisor/ Co-Supervisor)	Year of Award
1	Mr. SR. Dhinesh kumar	Laser surface modification of functionally graded thermal barrier coating for aero-engine applications (Thesis submitted)	Co-Supervisor	2016
2	Mr.KG.Thirugnanasambantham	Mechanistic studies on degradation of some super alloys through hot air jet erosion and high temperature sliding wear	Supervisor	2016
3	Mr.M.Kumarasamy	Evaluation and Prevention of erosion and corrosion in pumps under mining environments	Supervisor	2015
4	Mr.E.Edward Anand	Corrosion and tribological studies on pulse electrodeposited cobalt based coatings reinforced with carbon nanotubes	Supervisor	2015

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5	Mr.M.Adam Khan	Studies on plasma sprayed NiCr-Cr ₂ O ₃ And A40T coatings on inconel 617 for gas turbine applications	Co-Supervisor	2014
6	Mr.J.Yoganandh	Erosion and Corrosion behavior of materials under mining conditions with and without surface modifications	Supervisor	2013
7	Mr.Senthil Kumar	Studies on tribological behavior of thermal sprayed ceramic and carbide coatings for power plant and automobile components	Supervisor	2011
8	Mr.N.Mohan	Mechanical and Tribological behavior of fabric reinforced functional filler filled epoxy based hybrid components	Supervisor	2011
9	Mr.Edward kennedy	Studies on Abrasive and Erosive wear behavior of Thermal Spray Coatings and Glass Fiber Reinforced Epoxy – Polyster Composites	Supervisor	2009
10	Mr.S.P.Kumaresh Babu	Weldment corrosion and its control in power plant materials using FCAW, SAW and GTAW processes	Supervisor	2006

16. Participation in Workshops/ Symposia/ Conferences/ Colloquia /Seminars/ Schools etc. (mentioning the role):

S. No.	Title of Activity	Level of Event (International/ National/ Local)	Role (Participant/ Speaker/ Chairperson, Paper presenter, Any other)	Event Organized by	Venue & Date (s)
1	Corrosion of metals and alloys	National	Participant	QIP	Met. Engg. Dept. IIT-Mumbai Dec 17-29.
2	High temperature oxidation of metals and alloys	National	Participant	QIP	Met. Engg. Dept. Roorkee University Jun 23-Jul 7, 92.
3	Intellectual property and innovation management in knowledge era	National	Participant	NITT & NRDC, New Delhi	NITT, Sep,07, 2009.

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17. Workshops/ Symposia/ Conferences/ Colloquia/Seminars **Organized** (as Chairman/ Organizing Secretary/ Convenor / Co-Convenor)

Sl. No	Title of Activity	Level of Event (International/ National/ Local)	Date (s)	Role	Venue
1	Heat treatment of ferrous material	National	Aug 3 & 4, 1984	Co-coordinator	RECT
2	Electroplating and metal finishing	National	Nov 21 & 22, 1987	Co-coordinator	RECT
3	Material surface and characterization using advanced instrumentation techniques	National	Jan 21 & 22, 1992.	Coordinator	RECT
4	Recent trends in Corrosion Control & Surface Engineering (CC & SE 2009) (MHRD-AICTE Staff Development Programme)	National	June 08-20, 2009	Convener	NITT
5	Three Days Short Term course on “Electron Microscopy” EM – 2008 (Under TEQIP Community Service)	National	Sept. 06 - 08, 2008	Convener	NITT
6	Two Days Workshop on Nano Materials (Science Technology & Applications) – NANO 2008 (Under TEQIP Community Service)	National	March 05 - 06, 2008	Convener	NITT
7	One Day Seminar on Challenges & Opportunities in Surface Engg Research(Challenge 2007) Under TEQIP Community Service)	National	November 21, 2007	Convener	NITT
8	Two days workshop on emerging trends in Corrosion Control & Surface Engineering (CC & SE 2007)	National	February 09-10, 2007	Convener	NITT

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9	Two Days Short Term course on Corrosion Control & Surface Engineering, CECASE/ Event - 1	National	October 18, 2007	Convener	NITT
10	Three-one Day Colloquium on Corrosion Control & Surface Engineering: Current R&D and industrial scenario, CECASE/ Event – 2, 3&4.	National	Dec., 10-12, 2012.	Convener	NITT
11	National Conference on Corrosion, Surface Engineering and Tribology (CST-2013), CECASE/ Event – 5.	National	April, 22-23, 2013	Organizing Secretary	NITT
12	Program on Corrosion awareness day	Institute level	April, 22, 2013	Convener	NITT
13	Three Days Workshop on Engineering Tribology (for M/s. Rane Group of industries)		Oct 30-31 and Nov 1, 2014.	Convener	NITT
14	Two Days training program for the benefit of executives of mines	National	Dec 29-30, 2015	Convener	NITT
15	Two Days training program for the benefit of executives of Thermal power plants	National	Feb 15-16, 2016	Convener	NITT
16	“Global 2016” (surface engineering: Global scenario and nano technology)-one day seminar	National	May 13, 2016	Convener	Chennai
17	“Future 2016” Trends for materials in engineering application: Industrial scenario-one day seminar	National	June 19, 2016	Convener	NITT

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18. Invited Talks delivered

S.No.	Topic	Date	Inviting Organization
1	Gas tungsten metal arc welding and defects in welding	Sept-Oct, 1996	Confederation of Indian Industries (S.R), WRI / BHEL & III Cell RECT
2	Recovery of metals by electrometallurgical technique	Nov 15, 1996	ISTE-STTP on novel separation technique by Chemical Engg. Dept. RECT
3	Corrosion and corrosion inhibition	Sep 24-25, 1992	Inter-collegiate semester on electro chemistry Association, National college Trichy.
4	Anti Corrosion Materials	Nov 04, 1994	All India Radio, Trichy
5	Frontier Materials	March, 1989	All India Radio, Trichy
6	Perennial need for Metallurgical Engg. Education in Indian academic curriculum and research at all Universities.	During 2011	All India Radio, Trichy
7	Challenges and Opportunities in Corrosion Control And Surface Engineering	Oct, 2006	VIT Vellore
8	National Award Lecture on weldment corrosion and its control in power plant materials – recent R&D efforts at NITT Trichy	18.07.2008	IISc Bangalore organized by Electrochemical Society of India
9	Challenges and Opportunities in Corrosion Control And Surface Engineering	March, 2008	Annamalai University
10	Challenges and Opportunities in Corrosion Control And Surface Engineering	During 2011	Jayaram college of Engineering, Trichy
11	Challenges and Opportunities in Corrosion Control And Surface Engineering	During 2010	IIM Trichy Chapter
12	Exiting trends ahead in surface engineering	Nov 30, 2007	Holy cross college, Trichy
13	Challenges and Opportunities in Corrosion Control And Surface Engineering	04.03.2016	Karur
14	Challenges and Opportunities in Corrosion Control And Surface Engineering	March 19, 2013	Chemistry Dept., NITT
15	Challenges and Opportunities in Corrosion Control And Surface Engineering with some highlights and recent trends in mining scenario	Dec 03-05, 2015	IISc Bangalore
16	Corrosion and its control in gas turbine technology	04.12.2015	GTRE Bangalore

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17	Challenges and Opportunities in Corrosion Control And Surface Engineering	Dec 29-30, 2015	For the benefit of executives of Mines, NLC, Neyveli
18	Challenges and Opportunities in Corrosion Control And Surface Engineering	Feb 15-16,2016	For the benefit of executives of NLC Thermal power stations, Neyveli
19	Challenges and Opportunities in Corrosion Control And Surface Engineering	28 th March 2016	SAEST, Karaikudi
20	Challenges and Opportunities in Corrosion Control And Surface Engineering	21.06.2016	Ordnance Factory, Trichy

Note: Many times served as invited speaker for in house requirements of various departments at NITT for their functions organized by TEQIP and other sponsors.

19. Membership of Learned Societies

Type of Membership (Ordinary Member/ Honorary Member / Life Member)	Organization	Membership No. with date
Life Member	Indian Society of Technical Education	LM 39104 / 22.12.2003
Life Member	Electrochemical Society of India	LM 149 / 2008
Life Member	Indian Institute of Metals *	LM 46518, since 2010-11.
Life Member	Indian Welding Society	LM 01051 / 30.05.2011

* Served as Vice chairman IIM – Trichy chapter during 2010-12.

20. Academic Foreign Visits: **NIL**

Country	Duration of Visit	Programme

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21. Publications

(A) Refereed Research Journals: **(International)**

S. N	Author(s)	Title of Paper	Journal	Volume (No.)	Pg No	Year
1	SR.Dhineshkumar, M Duraiselvam, S Natarajan, SS Panwar, T Jana, and M.A. Khan	Effect of Laser Glazing on Thermo Mechanical Properties of Plasma Sprayed LaTi ₂ Al ₉ O ₁₉ Thermal Barrier Coatings	Materials and Manufacturing Processes.	http://dx.doi.org/10.1080/10426914.2016.1244841.	--	2016
2	SR Dhineshkumar, M Duraiselvam, S Natarajan, SS Panwar, T Jana, M.A. Khan	Enhancement of strain tolerance of functionally graded LaTi ₂ Al ₉ O ₁₉ thermal barrier coating through ultra-short pulse based laser texturing	Surface and Coatings Technology.	304	263-271.	2016
3	R. Sankaran D. Rajamani S. Natarajan K. G. Thirugnana-sambantham	Sliding wear behaviour and its mechanisms of carbonitrided AISI 8620 steel at 1008C under unlubricated conditions	Surface Engineering Maney Publishing UK	doi:10.1179/1743294415Y.0000000090	--	2016
4	S.R.Dhineshkumar M.Duraiselvam S. Natarajan	Enhanced ablation resistance through laser glazing of plasma sprayed LaTi ₂ Al ₉ O ₁₉ -based functionally graded thermal barrier coating	Ceramics International Elsevier	42 (8)	10184 – 10190	2016
5	E. Edward Anand S. Natarajan	Strengthening Mechanisms in Multiwalled Carbon Nanotubes Reinforced Co – W Pulse Electrodeposited Coating	Journal of Materials and Manufacturing Processes, Taylor & Francis	31 (1)	48-52	2016
6	M. Kumarasamy S. Natarajan	Selection and characterisation of HVOF cermet coatings for volutes of high capacity pumps of opencast lignite mines	Surface Engineering Maney Publishing UK	32(3)	229-237	2016

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7	K.G.Thirugnana -sambantham S. Natarajan	Degradation Through Erosion: Mechanistic Studies On In-718 Super alloy Under Hot Air Jet Conditions	Journal of Materials Engineering and Performance, ASM International	24 (7)	2605 – 2613	2015
8	M.Adam Khan S.Sundarrajan S.Natarajan	Hot corrosion behavior of Inconel 617 in mixed salt environment at 900 and 1000°C for gas turbine applications	High Temperature Materials and Processes DE GRUYTER GERMANY	34 (3)	221– 225	2015
9	E.E.Anand S.Natarajan	Preparation and characterisation of nanocrystalline cobalt–phosphorus coatings reinforced with carbon nanotubes	Surface Engineering Maney Publishing UK	30(10)	716- 721	2014
10	M.Adam Khan S.Sundarrajan S.Natarajan	Influence of plasma coatings on Inconel 617 for gas turbine applications	Surface Engineering Maney Publishing UK	30(9)	656- 661	2014
11	M.Adam Khan S.Sundarrajan S.Natarajan P.Parameswaran E.Mohandas	Oxidation and Hot Corrosion Behavior of Nickel-Based Superalloy for Gas Turbine Applications	Materials and Manufacturing Processes Taylor and Francis UK	22(9)	832- 839	2014
12	J.Yogananth S.Natarajan S.P.KumareshBabu	Erosion Wear Characteistics of Surface Modified Grey Cast Iron by WC-Co-Cr/NiCrBSi coating using HVOF Thermal Spray Processes	Materials Performance and Characterization ASTM international USA	3(1)	309- 326	2014
13	J.Yogananth S.Natarajan S.P.KumareshBabu	Erosion behavior of NiCrBSi coating under mining conditions	Surface Engineering Maney Publishing UK	30(1)	71 -77	2014
14	B.Thirumaran S.Natarajan S.P.KumareshBabu	CNT reinforced Corrosion behavior of AA7075 Nanocomposites	Advances in Materials Science PG Publications	2(1)	1-5	2013
15	J.Yogananth S.Natarajan S.P.KumareshBabu	Erosion Behaviour of WC–Co–Cr Thermal Spray Coated Grey Cast Iron under Mining Environment	Transactions of Indian Institute of Metals	66(4)	437- 443	2013

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16	J.Yogananth S.Natarajan S.P.KumareshBabu	Erosive Wear Behavior Of Nickel Based High Alloy White Cast Iron Under Mining Conditions Using Orthogonal Array.	International Journal of Materials Engineering and Performance (ASM)	22(9)	2534-2541	2013
17	J. Yoganandh, T. Kannan, S.P.KumareshBabu, S. Natarajan	Optimization of GMAW Process Parameters in Austenitic Stainless Steel Cladding Using Genetic Algorithm Based Computational Models	Experimental Techniques, Wiley publications.	DOI: 10.1111/j.177-567.2011.00803.x		2012
18	M.Kumarasamy, S.Natarajan, S.P.Kumareshbabu, S.Santhanam, P.Veerabalu, S.Chokkuvel- Murugan	Assessment of failure modes of components in high capacity pumps due to synergistic effects of Erosion and Corrosion –A case study in Lignite Mines	Key Engineering Materials, Trans Tech Publishing	710	689	2012
19	N.Mohan, S.Natarajan,andS. P.KumareshBabu	Sliding Wear Behavior of Graphite filled Glass-Epoxy Compositated at Elevated Temperatures	Jr of Polymer-Plastics Technology and Engineering	50	251 – 259	2011
20	N.Mohan, S.Natarajan, S.P.KumareshBabu	Abrasive wear behavior of hard powders filled glass fabric-epoxy hybrid composites	Materials and Design	32	1704 - 1709	2011
21	P.R.S. Kumar, S.Kumaran, T.SrinivasaRao, S.Natarajan	High temperature sliding wear behavior of press-extruded AA6061/fly ash composite	Materials science and Engineering A	527	1501-1509	2011
22	N.Mohan, S.Natarajan, S.P.KumareshBabu, Siddaramaiah	Investigation on sliding Wear Behaviour and Mechanical Properties of Jatropa Oil Cake-filled Glass- Epoxy Composites	Journal of American and Oil and chemical society	88,	111-117	2011
23	N.Mohan, S.Natarajan S.P.KumareshBabu, Siddaramaiah	Investigation on Two-Body Abrasive Wear Behavior of Silicon Carbide filled Glass Fabric-Epoxy Composites	Journal of Minerals & Materials Characterization & Engineering	9 (3)	231-246	2011
24	N.Mohan, S.Natarajan, S.P.KumareshBabu, Siddaramaiah, JoongHee Lee	Solid particle erosion of UHMWPE aramid fabric-epoxy hybrid composites	Advanced Materials research (Trans Tech Publications, Switzerland)	123-125	1051-1054	2011

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25	Z.Edward Kennedy, S.Natarajan	Abrasive wear behavior of rotary tiller blades used in farming application	International Journal of Materials Science	(6) 3	263-277	2011
26	P.R.S. Kumar, S. Kumaran, T. SrinivasaRao, S. Natarajan	High Temperature Sliding Wear Behavior of Press-Extruded AA6061 / Fly Ash composite	Materials Science and Engineering A (<i>Elsevier Publishers</i>)	527	1501-1509	2010
27	S.Jerome, B.Ravisankar, Pranab Kumar Mahato, S.Natarajan,	Synthesis and evaluation of mechanical and high temperature tribological properties of in-situ al-TiC composites	Tribology International (<i>Elsevier Publishers</i>)	43	2029 - 2036.	2010
28	Mamthakumari, Alphonsa, S .Natarajan	Dry sliding wear behavior of plasma nitro-carburised AISI 304 stainless steel using response surface methodology	Institute of Materials, Minerals and Mining	26 (3)	191 - 198	2010
29	M. Prince, P. Gopalakrishnan, M.Duraiselvam, S. Natarajan,	“Dry Sliding Wear Behavior of HVOF Sprayed Molybdenum and Nickel/Chromium Coatings”	International Journal of Applied Engineering Research	(5)	75-86	2010
30	N.Mohan, S.Natarajan, S.P.KumareshBabu	Studies on Two-body Abrasive Wear Behavior of Graphite Filled glass Fabric –Epoxy composites	International Journal of Materials Science	5 (2)	181-196	2010
31	M.MamathaKumari, S.Natarajan, J.Alphonsa and S.Mukherjee	Dry Sliding wear behavior of plasma nitrocarburised AIS 304 stainless steel using response surface methodology.	Surface Engineering (<i>Maney Publishers</i>)	2010, 20(3)	191-198	2010
32	S.P.KumareshBabu S.Natarajan	High temperature corrosion and characterization studies in flux cored arc welded 2.25Cr-1Mo power plant steel	Jr of Materials Engineering and Performance, ASM Int (<i>Springer Publishers</i>)	2010, 19	743 - 750	2010
33	G. Naveen Kumar, R. Narayanasamy, S. Natarajan, S.P.KumareshBabu	“Dry sliding wear behaviour of AA 6351-ZrB2 in situ composite at room temperature”	Materials and Design (<i>Elsevier Publishers</i>)	2010, 31(3)	1526 - 1532	2010

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34	Z.E.Kennedy, S.Natarajan	Slurry erosion properties of detonation sprayed and plasma sprayed coatings for materials used in mining environments	<i>Surface Engineering (Maney Publishers)</i>	25 (6)	476 – 481	2009
35	S.Natarajan, R.Narayanasamy S.P.KumareshBabu, G.Dinesh, B.Anil Kumar, K.Siva Prasad	Sliding Wear Behaviour of Al 6063/TiB ₂ in situ composites at elevated temperatures	<i>Materials and Design (Elsevier Publishers)</i>	30 (7)	2521 - 2531	2009
36	Anoop, S. S.Natarajan, S.P.KumareshBabu	Analysis of factors influencing dry sliding wear behaviour of Al/SiCp-Brake pad tribo-system	<i>Materials and Design (Elsevier Publishers)</i>	30	3831-3838.	2009
37	S.SenthilKumaran S.P.KumareshBabu, K.Sivaprasad, S.Natarajan.	High temperature wear behavior of Al-4032-ZrB ₂ in situ composite	<i>International Journal of Materials Science</i>	4(3)	283 - 298.	2009
38	Prince M Gopalakrishnan P M.Duraiselvam Satish D, Naveen Natarajan S	Study of Dry Sliding Wear of Plasma Sprayed Mo-Ni/Cr - Ti-6Al-4V Tribo Pair	European Journal of Scientific Research, EuroJournals Publishing, Inc.	37 (1)	41-48	2009
39	S.P.KumareshBabu, S.Natarajan	Influence of heat input on high temperature weldment corrosion in submerged arc welded power plant carbon steel	IntJr of Materials and Design (Elsevier)	29	1036 – 1042	2008
40	K.Sivaprasad, S.P.KumareshBabu, S.Natarajan, R.Narayanasamy, B.Anil Kumar	Study on Abrasive and Erosive Wear Behaviour of Al 6063/TiB ₂ in situ Composites	Materials Science and Engineering A (Elsevier)	498	495-500	2008
41	S.P.KumareshBabu, S.Natarajan	Corrosion Behavior of Pulsed Gas Tungsten Arc Weldments in Power Plant Carbon Steel	Jr. of Materials Engg. and Performance (ASM-Intl)	16(5)	620-625	2007
42	S.Natarajan, S.P.Kumareshbabu, M.Ramesh	Corrosion behaviour of gas tungsten arc welded 9Cr-1Mo power plant steel	IWS journal	March 2007	44-49	2007
43	S.P.KumareshBabu, S.Natarajan,	Corrosion behavior of flux cored arc weldments in carbon steel used in power plants	Jrl. of Steel and related materials	(4) 3	207-211	2006

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44	S.Natarajan, S.P.KumareshBabu	Corrosion and its Inhibition in SA213-T22 TIG Weldments used in Power Plants under Neutral and Alkaline Environments	Materials Science & Engg. A	432	47-51	2006
45	S.Natarajan, V.Ravikiran,	Evaluation of Electrochemical and Surface characteristics of conversion coatings on ZM21 Magnesium Alloy	Jrl of Surface Engineering	22(4)	1-7	2006
46	S.P.KumareshBabu, S.Natarajan,	Influence of heat input on flux cored arc welded power plant carbon steel	Int. Jrl of joining of Materials	18(1)	19-26	2006
47	S.Natarajan	Corrosion behaviour of GMA weldments in 1Cr-0.5Mo power plant steel	Australasian Welding Journal	50	33-39	2005
48	S.Natarajan, V.Sivan, P.Gerald Tennyson, V.Ravikiran	Protective coatings on magnesium and its alloys- a critical review	Jrl. of Corrosion prevention and control	51(4)	142-163	2004
49	Istiaq Ahmed, S.Natarajan, V.Sivan, R.Vaideeswaran	General corrosion and stress corrosion behaviour of freely corroding and active passive materials used in power and petrochemical plants	Jrl. of Steel and related materials	5	S399	2004
50	P.Gerald Tennyson, S.Natarajan, V.Sivan	Influence of anodizing and conversion coatings on ZM21 magnesium alloy towards its surface characteristics and electrochemical properties	Jrl. of Steel and related materials	5	S398	
51	F.GinoPrakash, S.Natarajan, R.Vaideeswaran,	Weldment corrosion and its inhibition in power plant materials under neutral and alkaline environment	Jrl of steel and related materials	2 (1)	151	2004
52	M.K.Karthikeyan, S.Natarajan, R.vaideeswaran	Weldment, corrosion and its control in active-passive materials used in power, process and petrochemical industries	Journal of steel and related materials	2 (2)	78	2004

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53	P.J.Antony, S.Natarajan, R.Vaideeswaran	Corrosion and its inhibition in Induction pressure weldments in carbon steel used in power plants	Journal of corrosion prevention and control	51(4)	181-187	2003
54	S.Natarajan, V.Sivan	High temperature corrosion and its inhibition in carbon steel fusion weldments used in power and process plants	Journal of joining of Materials	15 (3)	17-24	2003
55	R.Vaideeswaran, S.Natarajan, V.Sivan	The corrosion behaviour of Incoloy 825 weldments used in the process and petrochemical industries	Journal of corrosion prevention and control	50(2)	64-70	2003
56	S.Natarajan, V.Sivan	Weldment corrosion and its inhibition in power – generating components	Journal of Corrosion prevention and control	50(1)	7-19	2003
57	P.J.Antony, S.Natarajan, R.Vaideeswaran	Corrosion and its inhibition in carbon steel flash butt resistance weldments used in power plants	Journal of Steel and Related Materials	(1)	77-78.	2003

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58	N.Karuppiyah, S.John, S.Natarajan, V.Sivan	Characterisation of Electrodeposited Nickel-Cobalt selective black coatings: Electron Probe Micro Analysis	Bulletin of Electrochemistry	18(7)	299-304	2002
59	N.Karuppiyah, S.John, S.Natarajan, V.Sivan	Characterisation of Electrodeposited Nickel-Cobalt selective black coatings: Scanning Electron Microscopic studies	Bulletin of Electrochemistry	18(7)	295-298	2002
60	L.John Berchmans, S.Muralidharan, N.S.Rangasamy, S.Natarajan V.Sivan, S.Venkatakrisna Iyer	"Stress corrosion and hydrogen embrittlement susceptibility studies on modified 9 Cr-1 Mo steel weldments in acidic and neutral media	British Corrosion Journal	31 (3)	223-226	1996
61	L.JohnBerchmans, V.Kapali, S.Natarajan, V.Sivan	General corrosion behaviour of 9Cr-1Mo steel weldments in acidic environments	British Corrosion Journal	29(2)	143-146	1994
62	S.Natarajan V.Sivan	Polarization studies on low alloy boiler steel (T22) weldments in acid medium				1989

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63	S.Natarajan, S.P.Kumaresh babu, M.Ramesh	Corrosion behaviour of gas tungsten arc welded 9Cr-1Mo power plant steel	IWS journal	44-49		2007
64	S. John, V.Sivan N. Karuppiyah, S.Natarajan	High Performance Electrodeposited Selective Surfaces of Nickel – Cobalt for the Photothermal Conversion of Solar Energy	Transactions of Metal Finishers Association of India	11 (2)	63-68	2002
65	S.Natarajan V.Sivan	Corrosion Behaviour of Steels Used in Boiler Plants	Jrl of Electrochemical Society of India	34(4)	250- 255.	1985

Book review publications in international journals

S.No.	Reviewer	Title of Book	Journal	Volume (No.)	Pg No	Year
66	S.Natarajan	Thermochemical Surface Engineering of Steels	Materials and Manufacturing Processes	31:11	875-878	2015
67	S.Natarajan	Biomimetic, Bioresponsive, and Bioactive Materials	Materials and Manufacturing Processes	31:7	976-977	2016
68	S.Natarajan	Introduction to Industrial Polypropylene: Properties, Catalysts, Processes	Materials and Manufacturing Processes	31:3	379-380	2016
69	S.Natarajan	What is What in the Nanoworld	Materials and Manufacturing Processes	31:12	1643- 1643	2016
70	S.Natarajan	Glass-Ceramic Technology	Materials and Manufacturing Processes	31:4	550-551	2016
71	S.Natarajan	Nanotechnology for the Energy Challenge	Materials and Manufacturing Processes	31:4	1935- 1939	2016

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(B) Conferences/Workshops/Symposia Proceedings (International)

S No	Author(s)	Title of Abstract/ Paper	Title of the Proceedings	Theme	Venue	Year
1	Kumarasamy M, Natarajan S, KumaresHBabu S.P, Santhanam S, Veerabalu P ChokkuVelmurugan S	Assessment of failure modes of components in high capacity pumps due to synergistic effects of Erosion and Corrosion –A case study in Lignite Mines.	International Conference on Advances in Metallic Materials and Manufacturing process for Strategic Sectors	Corrosion and surface Engg.	Trivandrum,	2012
2	Kumarasamy M, Natarajan S, KumaresHBabu S.P, Santhanam S, Veerabalu P, Chokku-Velmurugan S,	A Case Study on Design and Evaluation of Performance of HVOF Coatings for Prevention of Pitting and Erosion Corrosion in High Capacity Pumps of Opencast Lignite Mines	XXVI International Conference on Surface Modification Technologies' (SMT 26)	Corrosion and surface Engg.	Ecole Centrale de Lyon (ECL) France,	2012
3	Thirumaran B, Natarajan S, KumaresHBabu S.P,	Synthesis, Characterization and Corrosion behavior of CNT reinforced AA7075 composite	XXVI International Conference on Surface Modification Technologies' (SMT 26)	Corrosion and surface Engg.	Ecole Centrale de Lyon (ECL) France,	2012
4	Yoganandh, J., M.Saravanakumar, S.Natarajan, S.P.KumaresHBabu A.Sreekanth	Erosion Behaviour of Thermal Spray Coated FG 260 Cast Iron and its Surface Characterization by Spectroscopic Techniques	International Conference on Surface Modification Technologies,	Corrosion and surface Engg.	Ecole Centrale de Lyon, Ecully, France	2012
5	Yoganandh, J., S. Natarajan, S.P.KumaresHBabu	Slurry Jet Erosive Wear Behaviour of NiCrBSi Coated Grey Cast Iron Under Mining Environment.	Third Asian Symposium on Materials & Processing,	Corrosion and surface Engg.	IIT Madras,	2012
6	Yoganandh, J. S. Natarajan, S.P.KumaresHBabu	Erosion Behaviour of WC–Co–Cr Thermal Spray Coated Grey Cast Iron under Mining Environment	International Symposium for Research Scholars on Metallurgy, Material Science & Engg.	Corrosion and surface Engg.	IIT Madras,	2012

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7	Yoganandh, J. S. Natarajan, S.P.KumareshBabu	Erosion Behaviour of High Chromium Iron Under Mining Conditions Using Orthogonal Array	National Conference on Corrosion, Surface Engineering and Tribology (Best Paper Award)	Corrosion and surface Engg.	NITT	2013
8	Yoganandh, J. S. Natarajan, S.P.KumareshBabu	Erosion Wear Characteristics of Duplex Stainless Steel Under Mining Conditions	National Symposium on Electrochemical Science & Technology	Corrosion and surface Engg.	IISc,	2013
9	M. Adam Khan, S.Sundarrajan, S.Natarajan, P.Parameswaran E.Mohandas	Oxidation and hot corrosion behaviour of Inconel 617 at 900° and 1000°C	A National Symposium on Electrochemical Science and Technology NSEST-2013 Organized by Electrochemical Society of India	Corrosion and surface Engg.	IISc,	2013
10	Adam Khan M, Sundarrajan S, Natarajan S	Assessment on plasma coatings towards hot corrosion behaviour of Inconel 617 through factorial design for gas turbine applications,	International Conference on Electrochemical Science & Technology (ICONEST – 2014), CECRI, Karaikudi organised by National Corrosion Council of India, Karaikudi	Corrosion and surface Engg.	IISc,	2013
11	Adam Khan M, Sundarrajan S, Natarajan S	Evaluation of thermal barrier coatings on Inconel 617 for gas turbine applications	Seventeenth National Congress on Corrosion Control	Corrosion and surface Engg.	CSIR	2014
12	Edward Anand, E S. Natarajan	Effect of Carbon Nanotubes Addition on the Corrosion Behavior of Pulse Electrodeposited Nanocrystalline Co-W Coatings	International Conference on Electrochemical Science & Technology (CONEST – 2014)	Corrosion and surface Engg.	Bangalore	2014
13	Mohan, N., S. Natarajan, S.P.KumareshBabu Siddaramaiah	Evaluation of thermal barrier coatings on Inconel 617 for gas turbine applications	International conference on Total Engineering Received Best Technical Paper Award at TEAM TEACH	Analysis and Manufacturing Technology – 09	Bangalore	2009

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14	Mohan, N., S. Natarajan, S.P.KumareshBabu	Effect of Jatropha oil cake on Erosive wear of E-Glass Fabric Reinforced Epoxy Composite Materials	International Conference on Nano – Composites	Corrosion and surface Engg.	kotayam	2010
15	Mohan, N., S. Natarajan, S.P.KumareshBabu	Dry – Sliding wear behavior of SiC filled Glass Fabric Reinforced Epoxy Composite Material at Elevated temperatures	International Conference on Nano – Composites	Corrosion and surface Engg.	kotayam	2010
16	Mohan, N., S. Natarajan, S.P.KumareshBabu	Dry – Sliding wear behavior of UHMWPE filled Aramid - Epoxy Composites	International Conference on Nano – Composites	Corrosion and surface Engg.	kotayam	2010
17	Mohan, N., S. Natarajan, S.P.KumareshBabu Siddaramaiah	Influence of Jatropha press cake filler in glass fabric – epoxy composites on sliding wear behavior	International Conference on Recent Trends in Materials and Characterization	Corrosion and surface Engg.	NITK	2010
18	Mohan, N., S. Natarajan, S.P.KumareshBabu Siddaramaiah Jong HeeLee	Solid Particle erosion of UHMWPE filled Aramid Fabric Epoxy Hybrid Composites	International Conference on Multifunctional Materials and Structures (MFMS)	Corrosion and surface Engg.	Korea	2010
19	Mohan, N., S. Natarajan, S.P.KumareshBabu	Solid Investigation on Two-body abrasive wear behavior of Tantalum Niobium Filled Glass – Epoxy Composites'	International Conference in Recent Trends in Materials Science & Technology	Corrosion and surface Engg.	Tiruvananthapuram	2010
20	Mohan, N., S. Natarajan, S.P.KumareshBabu Siddaramaiah	Sliding wear behavior of Tungsten Carbide filled Glass – Epoxy composites at elevated temperatures	International Symposium for Research Scholar on Metallurgy, Materials Science and Engineering, (ISRS)	Corrosion and surface Engg.	IITM, Chennai	2010
21	Mohan, N., S. Natarajan, S.P.KumareshBabu Siddaramaiah	Abrasive wear behavior of tantalum niobium carbide filler filled glass fabric reinforced epoxy composites	Second International Conference on Polymer Processing and Characterization	Corrosion and surface Engg.	Kottayam	2010

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22	Kumarasamy M, Natarajan S, KumareshBabu.S.P Santhanam S, Veerabalu P ,Chokku- Velmurugan S	Assessment of failure modes of components in high capacity pumps due to synergistic effects of Erosion and Corrosion –A case study in Lignite Mines	International Conference on Advances in Metallic Materials and Manufacturing process for Strategic Sectors	Corrosion and surface Engg.	Trivandrum	2012
23	Thirumaran B, Natarajan S, KumareshBabu S.P	Synthesis, Characterization and Wear behavior of CNT reinforced AA7075 composite	1 st International Conference on Functional Materials for DefenceICFMD 2012, DIAT	Corrosion and surface Engg.	Pune	2012
24	Kumarasamy M, Natarajan S, KumareshBabu.S.P Santhanam S, Veerabalu P, Chokku- Velmurugan S	A Case Study on Design and Evaluation of Performance of HVOF Coatings for Prevention of Pitting and Erosion Corrosion in High Capacity Pumps of Opencast Lignite Mines	XXVI International Conference on Surface Modification Technologies' (SMT 26)	Corrosion and surface Engg.	EcoleCentrale de Lyon (ECL) France	2012
25	Thirumaran B, Natarajan S, KumareshBabu S.P	Synthesis, Characterization and Corrosion behavior of CNT reinforced AA7075 composite	XXVI International Conference on Surface Modification Technologies' (SMT 26)	Corrosion and surface Engg.	EcoleCentrale de Lyon (ECL) France	2012
26	Yoganandh, J., M.Saravanakumar, S.Natarajan, S.P.KumareshBabu, and A.Sreekanth	Erosion Behaviour of Thermal Spray Coated FG 260 Cast Iron and its Surface Characterization by Spectroscopic Techniques	XXVI International Conference on Surface Modification Technologies' (SMT 26)	Corrosion and surface Engg.	EcoleCentrale de Lyon (ECL) France	2012
27	Yoganandh, J., S. Natarajan, S.P.KumareshBabu	Slurry Jet Erosive Wear Behaviour of NiCrBSi Coated Grey Cast Iron Under Mining Environment	Third Asian Symposium on Materials & Processing	Corrosion and surface Engg.	IITM	2012
28	Yoganandh, J., S. Natarajan, S.P.KumareshBabu	Erosion Behaviour of WC–Co–Cr Thermal Spray Coated Grey Cast Iron under Mining Environment	International Symposium for Research Scholars on Metallurgy, Material Science & Engg.	Corrosion and surface Engg.	IITM	2012

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29	Yoganandh, J., S. Natarajan, S.P.KumareshBabu	Erosion Behaviour of High Chromium Iron Under Mining Conditions Using Orthogonal Array	National Conference on Corrosion, Surface Engineering and Tribology (Best Paper Award in the Tribology Session)	Corrosion and surface Engg.	NITT	2013
30	Yoganandh, J., S. Natarajan, S.P.KumareshBabu	Erosion Wear Characteristics of Duplex Stainless Steel Under Mining Conditions	National Symposium on Electrochemical Science & Technology	Corrosion and surface Engg.	IISc	2013
31	M. Adam Khan, S.Sundarrajan, S.Natarajan, P.Parameswaran, E.Mohandas	Oxidation and hot corrosion behaviour of Inconel 617 at 900° and 1000°C	A National Symposium on Electrochemical Science and Technology NSEST-2013	Corrosion and surface Engg.	IISc	2013
32	Adam Khan M, Sundarrajan S and Natarajan S.	Assessment on plasma coatings towards hot corrosion behaviour of Inconel 617 through factorial design for gas turbine applications	International Conference on Electrochemical Science & Technology (ICONEST – 2014), Organised by ECSI.	Corrosion and surface Engg.	IISc	2013
33	Adam Khan M, Sundarrajan S, Natarajan S	Evaluation of thermal barrier coatings on Inconel 617 for gas turbine applications	Seventeenth National Congress on Corrosion Control, held during on 21-23, August 2014, at CSIR - CECRI, Karaikudi	Corrosion and surface Engg.	Karaikudi	2014

National Conference

34	Edward Anand, E S. Natarajan	Effect of Carbon Nanotubes Addition on the Corrosion Behavior of Pulse Electrodeposited Nanocrystalline Co-W Coatings	International Conference on Electrochemical Science & Technology (ICONEST – 2014)	Corrosion and surface Engg.	Banglore	2014
35	S.Natarajan & V.Sivan	Corrosion Behaviour of boiler Steel Weldments		National Welding Seminar	New Delhi	1989

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36	S.Natarajan & V.Sivan	Influence of induction pressure welding process on corrosion and its inhibition in SA213/T11 1.0Cr - 0.5 Mo low alloy steel used in power plants	National Welding Seminar – 97 organised by Indian Institute of Welding/ Bangalore Branch	Corrosion and surface Engg.	Bangalore	1997
37	R.Vaideeswaran, S.Natarajan & V.Sivan	Dissimilar Weldment Corrosion in Incoloy 825 Vs SA516 Gr.70 material	National Welding Seminar -97 organised by the Indian Institute of Welding/ Bangalore	Corrosion and surface Engg.	Bangalore	1997
38	S.Natarajan, V.Sivan & R.Vaideeswaran,	Corrosion behaviour of friction weldments in power plant materials and its relation to other welding processes.	National Conference on Processing of Metals (NCPM-2002) organised by the Department of Metallurgical Engineering, P.S.G. College of Technology	Corrosion and surface Engg.	Coimbatore	2002
39	K.Lakshmi, S.Natarajan & V.Sivan	Influence of Electropolishing on Corrosion and high temperature Oxidation behaviour of Stainless steel	Conf. on Processing of Metals (NCPM 2002) organized by the Department of Metallurgical Engineering, P.S.G. College of Technology	Corrosion and surface Engg.	Coimbatore	2002
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