



NAME : **A.X.AMAL REBIN**

ROLL NUMBER : 412909051

GUIDE : Dr. S.KUMARAN

BATCH : JANUARY 2010

RESEARCH AREA : MAGNESIUM ALLOY DEVELOPMENT

JOURNAL PAPERS PUBLISHED:

- A.X.Amal Rebin and S.Kumaran, Influence of Scandium on Magnesium and its structure-property correlation ,Materials Science Forum Vol. 710 (2012),Pg 132-136
- A.X.Amal Rebin and S.Kumaran, Some studies on extruded ZM21-x Scandium magnesium alloy, OPJIT International Journal of Innovation and Research(2014), Vol 3, No1,Pg 40-43
- R.Venkateswaran, A.X.Amal Rebin, S. Kumaran, Simulation of the Magnesium cast using ProCAST -Accepted for publication in Journal of Manufacturing Engineering

Data collated by Dept. MME, mid – January 2014



NAME : **V.S.BALAJI**
ROLL NUMBER : 412110001
GUIDE : Dr. S.KUMARAN
BATCH : JULY-2010
RESEARCH TITLE : MECHANICAL AND TRIBOLOGICAL BEHAVIOR
OF TI / TIB+TIC HYBRID *IN-SITU* COMPOSITES BY
SPARK PLASMA SINTERING

PUBLICATIONS:

- V.S.Balaji., S.Kumaran., Synthesis and Characterization of Ti / (TiB+TiC) Hybrid *in-situ* Composites by Spark Plasma Sintering., *Trans. Ind. Inst. Metals.*, 66(2013), 339-341.



NAME : **ILAYARAJA.M**
ROLL NO : 412110002
RESEARCH GUIDE : Prof S. RAMAN SANKARANARAYANAN
External Guide: Dr. John L Berchmans, CSIR - CECRI, Karaikudi
BATCH : 2010
AREA OF RESEARCH : PROCESS METALLURGY

RECENT PUBLICATION:

“PREPARATION OF RARE EARTH - TRANSITION METAL (RE: Y, TM: Co) INTERMETALLIC COMPOUNDS BY CALCIO THERMIC REDUCTION DIFFUSION PROCESS” accepted for publication in the Journal of Metallurgical and Materials Engineering



NAME OF THE SCHOLAR :**M. SANDHYA RANI**
ROLL NUMBER :412110051
DATE OF REGISTRATION :FEBRUARY -2011
RESEARCH SUPERVISOR :Dr. N. RAMESH BABU
TOPIC OF RESEARCH :SURFACE MODIFICATION OF
ZIRCONIUM BY PLASMA
ELECTROLYTIC OXIDATION FOR
BIOMEDICAL IMPLANT
APPLICATIONS

RECENT RESEARCH PUBLICATIONS:

1. Sandhyarani M., Rameshbabu N., Venkateswarlu K. and Rama Krishna L. Fabrication, characterization and in-vitro evaluation of nanostructured zirconia/hydroxyapatite composite film on zirconium. **Surface and Coatings Technology** 238 (2014) 58-67.
2. Sandhyarani M., N. Rameshbabu, K. Venkateswarlu, D. Sreekanth and Ch. Subrahmanyam. Surface morphology, corrosion resistance and in vitro bioactivity of P containing ZrO₂ films on Zr by plasma electrolytic oxidation. **J. of Alloys and Compounds** 553 (2013) 324-332.
3. Sandhyarani M., N. Rameshbabu, K. Venkateswarlu, K.V. Ravisankar, M. Ashok and S. Anandan. Photocatalytic and antibacterial activity of titanium, fluorine and silver co-substituted hydroxyapatite. **International Journal of Modern Physics: Conference Series** 22 (2013) 268-277.



NAME OF THE SCHOLAR :**S.VENUKUMAR**

ROLL NUMBER :412110052

DATE OF REGISTRATION :FEBRUARY 2011

NAME OF THE RESEARCH SUPERVISOR :Dr. S. MUTHUKUMARAN

TOPIC OF RESEARCH :FRICTION STIR SPOT WELDING OF ALUMINUM ALLOYS BY USING REFILLING TECHNIQUE

RECENT RESEARCH PUBLICATIONS:

1. S.Venukumar, Swaroop Yalagi and S.Muthukumaran. Comparison of Microstructure and Mechanical Properties of Conventional and Refilled Friction Stir Spot Welds in AA 6061-T6 using Filler Plate. **Transactions of Nonferrous Metals Society of China** 23(2013) 2833-2842.
2. S. Venukumar, S. Muthukumaran, Swaroop Yalagi, and Satish V. Kailas. Failure modes and Fatigue behavior of conventional and Refilled Friction Stir Spot welds in AA 6061-T6 sheets. **International Journal of Fatigue** 61 (2014) 93-100.



NAME : **C.SAJITH BABU**
ROLL NUMBER : 412111001
GUIDE NAME : Dr. K.SIVAPRASAD
BATCH : JULY 2011
RESEARCH AREA : NANOCRYSTALLINE HIGH ENTROPY ALLOYS

JOURNALS DETAILS:

1. Phase Evolution and Thermal Analysis of Nanocrystalline AlCrCuFeNiZn High Entropy Alloy Produced by Mechanical Alloying. Journal of Materials Engineering and Performance. N.T.B.N.Koundinya, C. SajithBabu, K. Sivaprasad, P. Susila, N. Kishore Babu, and J. Baburao DOI: 10.1007/s11665-013-0580-5
2. Nanocrystalline AlCrFeNiZn High Entropy Alloy Produced by Mechanical Alloying., OPJIT International Journal of Innovation and Research., C.SajithBabu, N.T.B.N. Koundinya, K.Sivaprasad (paper accepted)



NAME : **A.VENKATESWARI**
ROLL NUMBER : 412111006
GUIDE NAME : Dr. S.KUMARAN
BATCH : JULY-2011
RESEARCH AREA : POWDER METALLURGY
JOURNALS DETAILS :

Paper Titled: Impact of Amorphous Structure on $Mg_{67}Ni_{(33-x)}Nb_1Al_x$ Alloy Synthesised by Mechanical Alloying for Hydrogen Storage Application, published in International Journal of Innovation & Research.



NAME : **M. ADAM KHAN**
ROLL NO : 412111002
BATCH : AUGUST 2011
RESEARCH GUIDE : Prof. S.SUNDARRAJAN
RESEARCH CO-GUIDE : PROF.S.NATARAJAN
RESEARCH AREA : HOT CORROSION & SURFACE ENGINEERING

Publication Details:

1. M Yaswanth, Mathan Kumaran V, L Vairavan Gowtham, S Natarajan, Adam Khan M and Edward Anand “**Evaluation of mechanical properties of basalt fiber reinforced metal laminates**” National Conference on Corrosion, Surface Engineering & Tribology (*CST2013*), 22nd – 23rd April 2013, at National Institute of Technology, Tiruchirapalli, Tamil Nadu.
2. M. Adam Khan, S. Sundarrajan, S. Natarajan, P.Parameswaran & E.Mohandas, **Oxidation and hot corrosion behaviour of Inconel 617 at 900° and 1000°C**, National Symposium on Electrochemical Science and Technology (NSEST 2013), August 23 – 24, 2013, at Indian Institute of Science (IISc), Bangalore.

NAME : **L.ARULMANI**

ROLL NO : 412111003

BATCH : AUGUST-2011

AREA OF RESERCH: Hot Deformation Behaviour Studies of Iron
And Sintered Forged AISI87xx P/M Steels Through Elemental Powders

RESEARCH SUPERVISOR: Dr. K.S .PANDEY

JOURNAL PUBLICATION : INTERNATINAL JOURNALS – 2 Nos.

1. IJERT-DENSIFICATION MECHANISM OF IRON AND IRON OXIDE COMPOSITES OF SINTERED HOT FORGING (UNDER REVIEW)
2. IJMME- DENSIFICATION BEHAVIOUR AND MECHANICAL PRPERTIES EVOLUATION OF SINTERED FORGED AISI 8720 PM STEELS (UNDER REVIEW)

CONFERECE: 1 INTERNATIONAL CONFERENCE ATTENDED (RAMPT'13-NEC-KOVILPATTI)



NAME : **E. EDWARD ANAND**

ROLL NO : 412111004

BATCH : AUGUST 2011

RESEARCH GUIDE : Prof.S.NATARAJAN

RESEARCH AREA : CORROSION, TRIBOLOGY & SURFACE ENGINEERING

Publication Details:

1. M Yaswanth, Mathan Kumaran V, L Vairavan Gowtham, S Natarajan, Adam Khan M and Edward Anand, **Evaluation of mechanical properties of basalt fiber reinforced metal laminates**, National Conference on Corrosion, Surface Engineering & Tribology (*CST2013*), 22nd – 23rd April 2013, at National Institute of Technology, Tiruchirapalli, Tamil Nadu.
2. M. Adam Khan, S. Sundarrajan, S. Natarajan, E. Edward Anand, **Hot Corrosion behaviour of Super 304H under marine environment with Na₂SO₄ / NaCl / V₂O₅ salt mixture**, National Conference on Corrosion, Surface Engineering & Tribology (*CST2013*), 22nd – 23rd April 2013, at National Institute of Technology, Tiruchirapalli, Tamil Nadu.



NAME : **S.MOORTHY RAM**
ROLL NO : 412111005
RESEARCH GUIDE : Prof. S.RAMAN SANKARANARAYANAN
BATCH : AUGUST 2011
AREA OF RESEARCH : PROCESS METALLURGY



NAME : **S.SURESHKUMAR**
ROLL NUMBER : 412111055
BATCH : DECEMBER 2011
RESEARCH GUIDE : Dr.B.RAVISANKAR
RESEARCH AREA : EVALUATION OF DIFFUSION BONDED JOINTS.
PUBLICATION DETAILS :

‘Methodology to evaluate the quality of diffusion bonded joints by ultrasonic method’ S.sureshkumar, J. Krishnamoorthy, B. Ravisankar, P.C. Angelo, Indian journal of Engineering and materials sciences, Vol 16, pp 331-334,(2009).



NAME : S MANIVANNAN
ROLL NUMBER : 412111054
GUIDE NAME : Dr. S.P.KUMARESH BABU
CO-GUIDE :Dr.S.SUNDARRAJAN
BATCH : JANUARY 2012
RESEARCH AREA : DEVELOPMENT OF NEW MG-AL-ZN-RE ALLOYS
FOR AUTOMOBILE APPLICATION.



NAME : **KG. THIRUGNANASAMBANTHAM**
ROLL NO : 412111051
BATCH : JANUARY 2012
RESEARCH GUIDE : Prof..S.NATARAJAN
RESEARCH AREA : EROSION, WEAR & SURFACE ENGINEERING.



NAME : **Y.G.BALA**

ROLL. NO : 412111053

BATCH : JANUARY 2012

AREA OF RESEARCH: POWDER PREFORM FORGING

RESEARCH SUPERVISOR: Dr.K.S.PANDEY /PROFESSOR/ DEPTT. OF MME

CO-RESEARCH SUPERVISOR: Dr. S.RAMANSANKARANARAYANAN

International conference: 1

1. “Some Aspects of Barrelling in Sintered Hypo And Hypereutectoid P/M Steels During Hot Forging of P/M Preforms” in RAMPT’13 at National Engineering College , Kovilpatti



NAME : **K.TEJONADHA BABU**

ROLL NUMBER : 412112002

GUIDE NAME : Dr.S.MUTHUKUMARAN

BATCH : JULY 2012

RESEARCH AREA : FRICTION STIR WELDING



NAME : **KONDAIAH GUDIMETLA**

ROLL NO : 412112007

GUIDE NAME : Dr. B. RAVISANKAR

BATCH : JULY 2012

RESEARCH AREA : EQUAL CHANNEL ANGULAR PRESSING (ECAP)



NAME

:M.MURALI

ROLL NUMBER

:412112005

BATCH

: SEPTEMBER 2012

RESEARCH GUIDE

:Dr.S.P.KUMARESH BABU

RESEARCH AREA&
AREA OF INTEREST

:HIGH ENTROPY ALLOY, COMPOSITE
MATERIALS CORROSION & SURFACE
ENGINEERING



NAME : **G.VENKATESAN**
ROLL NUMBER : 412112003
BATCH : SEPTEMBER 2012
RESEARCH GUIDE :Dr.V.MUTHUPANDI
RESEARCH AREA : ACTIVATED TIG WELDING
PUBLICATION DETAILS :

1. Effect of Single Component Fluxes and Ternary Fluxes on Depth of Penetration in A-TIG Welding of AISI 409 Ferritic Stainless Steel. (International Conference on Engineering Materials and Process- 2013 23rd and 24th May 2013 organised by Tagore Engineering college, Chennai)
2. Effect of Single Component Fluxes on Depth of Penetration in FB-TIG Welding of AISI 304L Austenitic Stainless Steel. (International Conference on Engineering Materials and Process- 2013 23rd and 24th May 2013 organised by Tagore Engineering college, Chennai)



NAME : **VINOADH KUMAR K**
ROLL NUMBER : 412112004
GUIDE NAME : Dr. S.KUMARAN
BATCH : OCTOBER 2012
RESEARCH AREA : POWDER METALLURGY

PUBLICATION/CONFERENCE DETAILS:

- 1) ¹K Vinoadh Kumar, ²S Manimozhi, Experimental investigation to predict and map springback in hot formed boiler grade steel pipes using Response Surface Methodology, Proceedings of Third International Conference on Materials for future, ICMF 2013, GCE Thrissur, India.
- 2) K Vinoadh Kumar^{1*}, S Kumaran¹, Arun Raphel², TM Manjunath², Synthesis of nanostructured oxide dispersion strengthened ferritic stainless steels by spark plasma sintering, Proceedings in Research scholars day, IIST Tiruvananthapuram, Kerala, India.
- 3) K Vinoadh Kumar^{*1}, S Kumaran¹, Arun Raphel², T M Manjunath², Development of bulk vanadium compacts from pure vanadium powders: a study using mechanical alloying and spark plasma sintering, International journal of Innovation and Research, Issn 2319-4340, Vol. 03



NAME : **VENKATA KONDAIAH .E**

ROLL NO : 412111052

BATCH : JANUARY 2013

AREA OF RESEARCH : POWDER PREFORM FORGING

RESEARCH SUPERVISORS: Dr. K.S.PANDEY

Dr. SRINIVASAN SUNDARRAJAN

International conference: 1

“Evaluation of Mechanical Properties of Ultra-High Strength AISI 4130 and AISI 4140 Sintered Hot Forged P/M Steels” in RAMPT’13 at National Engineering College, Kovilpatti, TN, INDIA.



NAME : **R.MAHENDRAN**

ROLL NO : 412112051

BATCH : FEBRUARY 2013

RESEARCH GUIDE : Dr.S.P.KUMARESHBABU,ASSOCIATE

RESEARCH AREA : SURFACE ENGINEERING.



NAME : **G.ARUN**

ROLL NO : 412112052

BATCH : FEBRUARY 2013

RESEARCH GUIDE : Dr.S.P.KUMARESHBABU,

RESEARCH AREA : FLOW MODELLING IN PIPELINES

NAME : **JOBY JOSEPH.I**

ROLL NO : 412112001

BATCH : JULY 2013

AREA OF RESERCH: Weldability Characteristics of Hot Sintered Hot Forged High
Density Performs of Low Alloy High Strength Steels

RESEARCH SUPERVISOR: Dr.K.S .PANDEY

CONFERECE:

1 INTERNATIONAL CONFERENCE ATTENDED (RAMPT'13-NEC-KOVILPATTI)

“WELDABILITY CHARACTERISTICS OF SINTERED HOT FORGED PLATES OF
SA387GR22 STEEL PRODUCED THROUGH P/M ROUTE”



NAME	: MAHADEVA SWAMY
ROLL NUMBER	:412113001
GUIDE NAME	: Dr.S.MUTHU KUMARAN
BATCH	:JULY-2013
RESEARCH AREA	: FRICION WELDING



NAME	:MAXWELL REJIL.C
ROLL NUMBER	:412113002
GUIDE NAME	:Dr. S. MUTHUKUMARAN
BATCH	:JULY-2013
RESEARCH AREA	:SOLID STATE WELDING



NAME	: K.CHANDRA SEKHAR
ROLL NUMBER	:412113003
GUIDE NAME	: Dr. B. RAVISANKAR
BATCH	: JULY-2013
RESEARCH AREA	:SEVERE PLASTIC DEFORMATION



NAME	: N. THIYANESHWARAN
ROLL NUMBER	:412113004
GUIDE NAME	:Dr. K. SIVA PRASAD
BATCH	:JULY - 2013
RESEARCH AREA	:DIFFUSION BONDING



NAME : **M.P SHANKAR**
ROLL NUMBER :412113005
GUIDE NAME :Dr. K.SIVA PRASAD
BATCH: :JULY-2013
RESEARCH AREA: :DISSIMILAR ALUMINIUM JOINING PROCESSES



NAME : **P. BHAGAT SINGH**
ROLL NUMBER :412113006
GUIDE NAME :Dr. S. KUMARAN
BATCH :JULY-2013
RESEARCH AREA :Casting, Extrusion, Rolling, ECAP, Corrosion

JOURNAL DETAILS :

“MICROSTRUCTURAL EVOLUTION AND MECHANICAL PROPERTIES OF α -MAGNESIUM-LITHIUM ALLOY” selected and published in the International Conference on Metallurgical and Materials Processes, Products and Applications,



NAME : **P.RAJESH KANNAN**

ROLL NUMBER : 412113007

GUIDE NAME : Dr. V.MUTHUPANDI

BATCH : JULY 2013

RESEARCH AREA : DISSIMILAR WELDING



NAME	: T.ARUN NELLAIAPPAN
ROLL NUMBER	:412113008
GUIDE NAME	:Dr.N.RAMESH BABU
BATCH	:JULY-2013
RESEARCH AREA	:PEO COATING ON Mg-ALLOYS



NAME	: MUTHU KUMAR.P
ROLL NUMBER	:412113009
GUIDE NAME	:Dr.S.JEROME
BATCH	:JULY-2013
RESEARCH AREA	:FRICITION STIR PROCESSING



NAME : **V.V. RAVI KUMAR**
ROLL NUMBER : 412113010
GUIDE NAME : Dr.S.KUMARAN
BATCH : JULY-2013
RESEARCH AREA : Development Of High Strength Aluminium Alloys



NAME : **K.ANANTHAKUMAR**
ROLL NUMBER :412113051
GUIDE NAME :Dr. S.KUMARAN
BATCH :2014
RESEARCH AREA : SPARK PLASMA SINTERING

Data collated by Dept. MME, mid – January 2014