

July 12th Monday-Session1 (10.50 - 12.20)

| Room1 | Track: Simulation/Mfg/TQM | | Chair: Urs Buehlmann, Virginia Tech Department of Wood Science and Forest | |
|-----------|--|--|---|---|
| Paper ID | 1209 | 1216 | 1229 | 1236 |
| Title | Simulation Study of FMS with Alternate Routings – An Integrative Methodology | Scheduling in a multi precast concrete production sections using simulation technology | A Simulation Model for Identifying Impacts of Order and Resource Selection Rules on Precast Concrete Production Performance | Maintenance Service Improvement using Computer Simulation |
| Presenter | Dusan Sornaz, Ohio University | Hadi Hedayati, Teesside Univerisity | Hadi Hedayati, Teesside Univerisity | Stephen Clarkson, IAP World Services |

| Room3 | Track: CAD/CAM Flex Mfg | | Chair: Yi-Chi Wang, Feng Chia University | |
|-----------|--|--|---|----------------------------------|
| Paper ID | 1258 | 1015 | 1049 | 1064 |
| Title | Process Control for Cryogenic CNC machining of Soft Elastomers | A Simple Method For The Analytical Determination of The Position Loop Gain for CNC Machine Tools | Distributed Interoperable Manufacturing Platform Based on STEP-NC | Manufacturing of perfect magnets |
| Presenter | Vimal Dhokia, University of Bath | Prof. Dr. Zoran Pandilov, Faculty of Mechanical Engineering-Skopje | Xi Wang, University of Auckland, New Zealand | Kenneth Frogner, Lund University |

| Room4 | Track: Mfg Process & Tech | | Chair: Pierpaolo Caricato, Università del Salento - D.I.I. | |
|-----------|--|--|---|--|
| Paper ID | 1007 | 1032 | 1033 | 1237 |
| Title | Feature-based Decision Method for the Estimation of Technological Process Chains | Thin film silicon dioxide micro-scale parts release by Ethylenediamine-Pyrocatechol-Water solution | Incremental sheet metal forming of variable thickness sheet metals and comparison with another by a flat ended and a round ended tool | Incremental sheet metal forming of variable thickness sheet metals and comparison with another |
| Presenter | Ngoc-Anh Tran, Chemnitz University of Technology | Mary Tellers, University of Maryland | Saeed Mirian, Isfahan University of Technology | Dr. Seyed Mohsen Safavi, Isfahan University of Technology, Iran |

| Room5 | Track: Global Mfg & Supply | | Chair: Dr. Helen Zong, CSUEB | |
|-----------|--|--|---|---|
| Paper ID | 1035 | 1050 | 1055 | 1059 |
| Title | An intrinsic de-coupling in managing Supply Chain syndrome | Investigation of the Input Variables Treatment for BP NN Based Supplier Evaluation Model | Simulating the Ordering and Replenishing Policies for Short-lifecycle Products of the Retailer in a Supply Chain System | A web-based approach for dynamic scheduling in the supply chain |
| Presenter | Arnab Banerjee, Jadavpur University | Prof. M.H. Wu, University of Derby | Dr. Horng-Chyi Horng, Chaoyang University of Technology | Esther Alvarez, University of Deusto |

| Room6 | Track: Product Design/Mfg | | Chair: Mithal Albassam, San Jose State University | |
|-----------|---|--|--|--|
| Paper ID | 1128 | 1133 | 1147 | 1168 |
| Title | A Real-time Optimization Approach for Product Platform Planning: A Case Study of Pressure Vessels | Development of a sensor system for determination of an absolute pose of the 6-DOF Hexapod of the biped robot Centaurob | An Adaptive Stochastic Sectioning Algorithm for Optimization of Series Parallel System Reliability: A Case Study of Gas Turbine System | Application of 3D modeling and FE Analysis to reduce the manufacturing costs of a Landfill Compactor Tooth |
| Presenter | Mukul Tripathi, University of Texas at San Antonio | Mekonnen Tesfay Tesfu, Hamburg University of Technology | Mukul Tripathi, University of Texas at San Antonio | Martin Mckie, Teesside University |

July 12th Monday-Session2 (2.20 - 3.50)

| Room1 | Track: Simulation/Mfg/TQM | | Chair: Dusan Sormaz, Ohio University | |
|-----------|--|--|--|---|
| Paper ID | 1008 | 1018 | 1117 | 1038 |
| Title | Simulation special systems and measurement important parameters with minimal sensors using Lab VIEW software | Module Structure Production System for Demand Oriented Production System | Decision Support System (DSS) to minimize raw material procurement costs | Modelling and Analysis of Static Aspects of Job Boredom: A Bayesian Networks Approach |
| Presenter | Dr. Seyed Mohsen Safavi, Isfahan University of Technology, Iran | Yoshiro Fukuda, Hosei University | Urs Buehlmann, Virginia Tech Department of Wood Science and Forest | Ming Liang, University of Ottawa |

| Room3 | Track: Global Mfg & Supply | | Chair: Esther Alvarez, University of Deusto | |
|-----------|---|---|--|--|
| Paper ID | 1107 | 1134 | 1143 | 1155 |
| Title | Method for Analysis and Dynamism of Factory-Structure in automotive Manufacturing | Pearl Chain Management Approach Based on AHP Model | Carbon Reduction: New Criteria of Supply Chain Performance | Analytical Hierarchy Process for Selection of RFID Systems: An Application in Retail Supply Chains |
| Presenter | Carina Loffler, Universitaet Stuttgart | Melanie Mueller, University of Applied Sciences, Saxony | Paul Eric Dossou, ICAM VENDEE | Aly Owida, Arab Academy for Science and Technology |

| Room4 | Track:Mfg Process & Tech | | Chair: F. Frank Chen, The University of Texas-San Antonio | |
|-----------|---|---|--|---|
| Paper ID | 1040 | 1044 | 1211 | 1063 |
| Title | New Flexibility Tool Application in a Medium Production Company | Optimization of Multi-Task Turning Operation under Minimal Tool Waste Consideration | Optimization of Micro Metal Injection Molding for Highest Green Strength by Using TAGUCHI Method | Abrasive waterjet fine-cutting based on the injector principle Technology and processing plant for the precision cutting with the abrasive injector waterjet. |
| Presenter | Viktor Schubert, FZI Research Center for Information Technology | Yi-Chi Wang, Feng Chia University | Prof. Dr. Nor Hamidi Muhamad, Universiti Kebangsaan Malaysia | Carsten Loeser, Chemnitz University of Technology |

| Room5 | Track: Business Processes | | Chair: Munir Ahmad, Teesside University | |
|-----------|--|--|---|--|
| Paper ID | 1013 | 1071 | 1082 | 1087 |
| Title | Selecting, Scheduling, and Balancing of R&D Project Portfolio: a Genetic Algorithm | An empirical application of Six Sigma and DMAIC methodology for business process improvement | A Multi-Dimensional Model for Performance Evaluation in the Construction Industry | Continuous Improvement Tools to Improve Productivity in Manufacturing SMEs |
| Presenter | Ching Chih Tseng, Dayeh University | Dr Jose Arturo Garza-Reyes, University of Derby | Dr. Chike Oduoza, University of Wolverhampton | Paul Smith, University of Wolverhampton |

| Room6 | Track: Business Intelligence in Mfg | | Chair: Erik Johansson, University of Skövde | |
|-----------|--|---|--|--|
| Paper ID | 1053 | 1078 | 1101 | 1191 |
| Title | An application of a Rule-based system towards developing solutions for exception events within the networked business processes of a small manufacturing Virtual Organisation (VO) | Fuzzy VIKOR approach for selecting an optimum maintenance strategy | CSP in aluminum rolling firms: using customers' requirements to improve the solution algorithm | Exploring new methods for determining failure probabilities of process plant components for preventive maintenance |
| Presenter | Dr. Bishnu Das, Loughborough University | Dr Somasundaram Kumanan, National Institute of Technology Tiruchirappalli | Pierpaolo Caricato, Università del Salento - D.I.I. | Tobias Rudloff, HTWK Leipzig |

July 12th Monday-Session3 (4.10 - 5.20)

| Room 1 | Track: Simulation/Mfg/TQM | | Chair: Xun Xu, University of Auckland | |
|-----------|---|--|--|---|
| Paper ID | 1056 | 1058 | 1065 | - |
| Title | Simulation modelling to support life cycle Engineering of Manufacturing systems | A Hybrid Approach of a Individual-Genetic Algorithm and Threshold Accepting for Solving Job Shop Scheduling Problems | Multi-level modelling of manufacturing systems | - |
| Presenter | Zihua Cui, Loughborough University | Sascha Lemke, Chemnitz University of Technology | Oratai Vacharaphol, Loughborough University | - |

| Room 3 | Track: Global Mfg & Supply | | Chair: Horng-Chyi Horng, Chaoyang University of Technology | |
|-----------|--|--|---|---|
| Paper ID | 1072 | 1081 | 1106 | - |
| Title | A Cost Optimisation Approach for the Storage of Spare Parts Within an Industrial Environment | Multi Objective Optimization for Supply Chain Management based on an Agent Based Framework | Supply chain performance evaluation using DEA/TOPSIS model | - |
| Presenter | Dr. Jean Khalil, The Higher Technological Institute | Tehseen Aslam, University of Skövde | Dr Somasundaram Kumanan, National Institute of Technology Tiruchirappalli | - |

| Room 4 | Track: Mfg Process & Tech | | Chair: Mukul Tripathi, University of Texas at San Antonio | |
|-----------|--|------|--|---|
| Paper ID | 1174 | 1179 | 1181 | - |
| Title | Using a PVA Separator to improve Screen Printed Electric Cells | - | Reduction of Heat Affected Zone during Electroslag Welding by heat transfer analysis | - |
| Presenter | Sonya Quinn, University of Limerick | - | Jasjeet Singh Seehra, BITS Pilani | - |

| Room 5 | Track: Engr for Sustainability | | Chair: Dr. Helen Zong, CSUEB | |
|-----------|--|---|---|---|
| Paper ID | 1100 | 1103 | 1121 | - |
| Title | Investigating the Recyclability of Liquid Crystal Display TV's | Life Cycle Cost Analysis for Automotive Component Reuse | Energy Management in the Healthcare Sector: Current Status and Research Perspectives. | - |
| Presenter | Alan Ryan, University of Limerick | Dzuraidah Abd Wahab, National University of Malaysia | Marzia Trevez, University of Salerno | - |

| Room 6 | Track: Business Intelligence in Mfg | | Chair: Bishnu Das, Loughborough University | |
|-----------|---|--|--|---|
| Paper ID | 1222 | 1255 | 1260 | - |
| Title | Implementation of Remote Maintenance Support Services: A Case Study | Activity-based Cost Estimation with Consideration of Learning Effects in Product Family Design | Managing Manufacturing Performance for Competitiveness | - |
| Presenter | Erik Johansson, University of Skövde | Janis Terpenney, Virginia Tech | Prof. M. Munir Ahmad, Teesside University | - |

July 13th Tuesday-Session1 (10.20 - 11.50)

| Room 1 | Track: Simulation/Mfg/TQM/Product Design | | Chair: Janis Terpenny, Virginia Tech | |
|-----------|---|--|---|---|
| Paper ID | 1085 | 1108 | 1256 | 1263 |
| Title | Service Oriented Architecture for automatic planning and programming of industrial robots | Scheduling in a multi precast concrete production sections using simulation technology | A Simulation Model for Identifying Impacts of Order and Resource Selection Rules on Precast Concrete Production Performance | Maintenance Service Improvement using Computer Simulation |
| Presenter | Gunnar Bolmsjo, Lund University | Mathias Jonsson, Lund University | Bo Hyun Kim, Korea Institute of Industrial Technology | Mithal Albassam, San Jose State University |

| Room 3 | Track: CAD/CAM Flex Mfg | | Chair: Sandra Klute, TU Dortmund | |
|-----------|---|---|---|---|
| Paper ID | 1113 | 1127 | 1142 | 1146 |
| Title | Automated process planning with geometric dependencies derived from a feature-based CAD drawing | FMS Loading Models for Handling Alternative Process Plans and Synchronization with Shop Floor | 3D models share and reuse for product development | Linear Programming Formulation of Form Tolerances using Data Envelopment Analysis |
| Presenter | Jorg Militzer, WHZ | Umit Bilge, Bogazici University, Turkey | Qingjin Peng, University of Manitoba | Sohyung Cho, Southern Illinois University Edwardsville |

| Room 4 | Track: Mfg Process&Tech | | Chair: Skawinski Piotr, Warsaw University of Technology | |
|-----------|---|---|---|---|
| Paper ID | 1144 | 1074 | 1079 | 1083 |
| Title | Effects of Cell Layout and Cell Control Strategies on Multi-Machine Manufacturing Cells with CMM Feedback | Design and operation of a reflection transmission vision system for fruit imaging and grading | Real-Time Order Progress Kanban Services | Line assembly downsizing and recovery in mid-size production unit |
| Presenter | Tom Bering, McMaster University | Hossein Gohnabi, Sharif University of Technology | Zhi Li, University of Hong Kong | Pekka Syvanen, Aalto / TKK |

| Room 5 | Track: Engr For Sustainability | | Chair: Dzuraidah Abd Wahab, National University of Malaysia | |
|-----------|---|--|---|---|
| Paper ID | 1057 | 1070 | 1091 | 1131 |
| Title | Framework and toolset for developing and realising sustainable production systems | Design of Reconfigurable Disassembly Systems | The Determination of Upgrade Level and Warranty Length for Reused Products sold with warranty | Competitiveness by integrating the green perspective in production – A review presenting challenges for research and industry |
| Presenter | Hasse Nylund, TUT | Ignacio Eguia, University of Seville | Rouh- Yun Yu, Tamkang University | Karin Romvall, Mälardalen University |

| Room 6 | Track: Enterprise Knowledge Mgmt | | Chair: Farzad Shahbodaghlou, CSUEB | |
|-----------|--|--|--|--|
| Paper ID | 1149 | 1105 | 1114 | 1119 |
| Title | Contributions towards Energy Assessments in Manufacturing Plants | Knowledge-based Product Configuration through Product Life Cycle Oriented Feedback-Driven Requirements Engineering | Analysis of the knowledge sources and flows in a company for supporting the development of new intelligent systems | FMECA a Knowledge Management approach and case study |
| Presenter | Sebastian Horbach, Chemnitz University of Technology | Viktor Schubert, FZI Research Center for Information Technology | Eeva Jarvenpaa, Tampere University of Technology | Stephen Eldridge, University of Manchester |

July 13th Tuesday-Session2 (2.15 - 3.45)

| Room 1 | Track: Simulation/Mfg/TQM | | Chair: Gunnar Bolmsjo, Lund University | |
|-----------|--|---|---|---|
| Paper ID | 1116 | 1123 | 1125 | 1129 |
| Title | Simulation-based Innovization for the Analysis of a Machining Line | A scheduling system for real-time decision making support using simulation-based optimization | Robust dispatch strategies for highly variant process times | Set-up and first steps on capturing of realistic resource characteristics of an intelligent manufacturing environment |
| Presenter | Catarina Dudas, University of Skövde, Virtual Systems | Marcus Frantzen, University of Skövde | Jan Lange, Dresden University of Technology | Hasse Nylund, TUT |

| Room 3 | Track: Global Mfg&Supply | | Chair: Jens Schütze, Chemnitz University of Technology | |
|-----------|--|---|---|--|
| Paper ID | 1172 | 1177 | 1208 | 1220 |
| Title | An Analytical Hierarchy Process Approach to supplier selection issues of fractal manufacturing partnership | Coordinating demand and supply chain management | A network model to manage pharmaceutical supplies requirements in healthcare structures | A Framework for Risk Assessment and Mitigation in the Supply Chain |
| Presenter | Sameh Saad, Sheffield Hallam University | Per Hilletoft, University of Skövde | Falivene Mario, University of Salerno, Italy | Suraj M. Alexander, University of Louisville |

| Room 4 | Track: Mfg Process&Tech | | Chair: Joerg Militzer, WHZ | |
|-----------|---|---|---|---|
| Paper ID | 1126 | 1132 | 1135 | 1141 |
| Title | Modeling of heat transfer from a billet in transit surrounded by reradiating duct to improve energy efficiency in rolling mills | Increasing the Operational Efficiency of a Commercial Laundry: Layout Optimization and Process Automation | The Application of an Intersectoral Reconfigurable Manufacturing Automation Testbed to provide an Automation Solution to Industry | Modeling of Density Variation in Green Compacts |
| Presenter | Hardik Kabaria, Birla Institute of Technology & Science, Pilani | Michael A. Saliba, University of Malta | Michael A. Saliba, University of Malta | Ahmad Ghasempoor, Ryerson University |

| Room 5 | Track: Product Design/Mfg | | Chair: Temilade Ladokun, University of Teesside | |
|-----------|--|--|--|---|
| Paper ID | 1060 | 1061 | 1076 | 1094 |
| Title | A holistic approach for Structuring Stakeholder Requirements considering the requirements' degree of performance | Advancement of Kano's Theory enables integrated customer orientation | The Design of Material Allocation Mechanism under a MTS Environment for the TFT-LCD Module Factory | Integrative Development of Product and Production System for Mechatronic Products |
| Presenter | Sandra Klute, TU Dortmund | Christian Kern, TU Dortmund | Chung Shu-Hsing, National Chiao Tung University | Sascha Kahl, Heinz Nixdorf Institute |

| Room 6 | Track: BusProcess/Int | | Chair: Kunal Desai, Timmons Design Engineers Inc | |
|-----------|--|--|---|---|
| Paper ID | 1109 | 1262 | 1192 | - |
| Title | Support System of Collaborative Business Process Execution | A Portfolio approach to management procurement risks in a two-echelon supply chain | A Space Allocation Algorithm for Minimal Early and Tardy Costs in Space Scheduling Problems | - |
| Presenter | Hyun Woo Kim, Korea Institute of Industrial Technology | Yuan Shi, The University of Hong Kong | Chyuan Perng, Tunghai University | - |

July 13th Tuesday-Session3 (4.05 - 5.15)

| Room 1 | Track: Simulation/Mfg/TQM | | Chair: Tom Bering, McMaster University | |
|-----------|---|---|--|---|
| Paper ID | 1153 | 1156 | 1176 | - |
| Title | Data modeling for online simulation-requirements and architecture | The use and impact of Business Excellence Models on Organizations: The case of the Mexican Quality Award” | Barriers of TQM Implementation in Libyan Manufacturing Companies | - |
| Presenter | Daniel Noack, Dresden University of Technology | Dr Jose Arturo Garza-Reyes, University of Derby | Dzuraidah Abd Wahab, National University of Malaysia | - |

| Room 3 | Track: CAD/CAM FlexMfg | | Chair: Erinç Albey, Bogaziçi University | |
|-----------|--|---|---|---|
| Paper ID | 1219 | 1247 | 1248 | - |
| Title | Mitigating Stresses in Pressure Vessels: Finite element modelling of cylindrical shell | Implementing ISO standard 10303 application protocol 224 for automated process planning | CT based Manufacturing System for Dental Restorations | - |
| Presenter | Mrs Temilade Ladokun, University of Teesside | Tim Neumann, WHZ | Jae Yong Baek, Korea Institute of Industrial Technology | - |

| Room 4 | Track: Mfg Process&Tech | | Chair:Seppo Torvinen, Tampere University of Technology | |
|-----------|---|---|---|---|
| Paper ID | 1151 | 1154 | 1157 | - |
| Title | The artificial intelligence methods in tooth contact development of spiral and hypoid bevel gears | Multiobjective optimization in process planning | Hybrid Flowshop Scheduling with Multi-stage Family Setup Time Using Genetic Algorithm | - |
| Presenter | Piotr Skawinski, Warsaw University of Technology | Predrag Cosic, FAMENA-Zagreb | Hao Luo, The University of Hong Kong | - |

| Room 5 | Track: Engr For Sustainability | | Chair: Hasse Nylund, TUT | |
|-----------|--|--|---|---|
| Paper ID | 1164 | 1166 | 1253 | - |
| Title | Lighting the Environmental Sustainability Candle | Flexibility Strategies in Small and Medium Enterprises – Discussion of Research Perspectives | Engineering Concepts for Sustainability | - |
| Presenter | William Gaughran, University of Limerick | Jens Schutze, Chemnitz University of Technology | Kunal Desai, Timmons Design Engineers Inc | - |

| Room 6 | Track: Allied Topics/Nano tech | | Chair: Mikko Koho, TUT | |
|-----------|--|--|---|---|
| Paper ID | 1051 | 1054 | 1124 | - |
| Title | Coverage analysis of RFID Indoor Localization System for refrigerated warehouses based on 2D-Ray tracing | Experimental analysis of shelf life based inventory management policies for RIFD enabled supply chains | RFID and its Link with ERP in a Manufacturing SME | - |
| Presenter | Giada La Scalia, University of Palermo, Italy | Rosa Micale, University of Palermo, Italy | Sara Zarei, Teesside University | - |

July 14th Wednesday-Session1 (10.20 - 11.30)

| Room 1 | Track: Mfg Process&Tech | | Chair: Nebojsa Jaksic, Colorado State University - Pueblo | |
|-----------|---|---|--|---|
| Paper ID | 1201 | 1202 | 1243 | - |
| Title | Neural Network-Based Parameters Identification of Dynamic Systems with Time Delay | Adaptive Control for Nonlinear Dynamic System Using Recurrent Neural Networks | A Systematic Approach to Iranian Industry Challenges in Oil and Gas Projects Using the DEMATEL Technique | - |
| Presenter | Jin Zhu Peng, University of New Brunswick | Jin Zhu Peng, University of New Brunswick | Farzad Shahbodaghlou, CSUEB | - |

| Room 3 | Track: CAD/CAM FlexMfg | | Chair: Qingjin Peng, University of Manitoba | |
|-----------|---|--|--|---|
| Paper ID | 1148 | 1161 | 1169 | - |
| Title | STEP-NC Code Generator system for intelligent CNC | Rule-Based Assembly Planning Method Applied in Sequence Optimization | High speed pocket milling planning considering machining area partitioning | - |
| Presenter | Yusri Yusof, Universiti Tun Hussein Onn Malaysia (UTHM) | Lihui Wang, University of Skövde | Dong-Won Kim, Chonbuk National University | - |

| Room 4 | Track: Simulation/Mfg/TQM | | Chair: William Sullivan | |
|-----------|--|---|---|---|
| Paper ID | 1244 | 1250 | 1251 | - |
| Title | The Fundamental Research of Structure Thermal Deformation on Machine Tool Feeding System | The development of factory templates for the integrated virtual factory framework | Overall Measurement of Production Equipment Effectiveness for Performance Monitoring and Decision Making Assess | - |
| Presenter | Pai-Chung Tseng, National Chung Hsing University | Américo Azevedo, INESC Porto / FEUP | Fabio Fruggiero, University of Basilicata - D.I.F.A. - Italy | - |

| Room 5 | Track: Global Mfg&Supply/Eng Sust | | Chair: Sebastian Horbach, Chemnitz University of Technology | |
|-----------|---|--|---|---|
| Paper ID | 1252 | 1259 | 1019 | - |
| Title | Applying 'Exponential Growth Models' to Determine OEM Warehouse Capacity Requirements | Analytical Target Cascading For Distributed Supply Chain Configuration | Energy Efficiency Optimisation in Production Planning and Control | - |
| Presenter | Steve Davies, Buckinghamshire New University | Qu Ting, University of Hong Kong | Anton Dietmair, ISW University of Stuttgart | - |

| Room 6 | Track: Re-Eng/Lean Mfg | | Chair: Munir Ahmad, Teesside University | |
|-----------|---|--|---|---|
| Paper ID | 1084 | 1233 | 1231 | - |
| Title | Component Based Modeling and Simulation of Value Stream Mapping for Lean Production Systems | Safer Efficacious Chemotherapy Against Community Infectious Agents | An analysis for the reduction of rejections using TRIZ problem solving tool | - |
| Presenter | Mohamed A. Shararah, AAST | Shahzad Connolly, Teesside University | Dr. V.Ramesh, Sri Jayachamarajendra College of Engineering | - |

July 14th Wednesday-Session2 (12.45 - 1.45)

| Room 1 | Track: Mfg Process&Tech | | Chair: Fabio Fruggiero, University of Basilicata - D.I.F.A. - Italy | |
|-----------|---|---|---|---|
| Paper ID | 1249 | 1045 | 1261 | - |
| Title | A Capability Study of a Wetting Balance Machine using 0.9mm Diameter Copper Wires | Current Status of 3D Data Acquisition and Processing Technologies | A Critical Event Processing Framework over RFID-Enabled Manufacturing Environment | - |
| Presenter | Bobby Woods, University of Limerick | Lihui Wang, University of Skövde | Ji Fang, The University of Hong Kong | - |

| Room 3 | Track: Mfg Mobile/Mfg Process | | Chair: Saeid Motavalli, CSUEB | |
|-----------|--|---|---|---|
| Paper ID | 1095 | 1241 | 1162 | - |
| Title | Building Blocks for a Mutable Factory System | Robotic Manipulator and Artificial Vision System for Picking Cork Pieces in a Conveyor Belt | Automated Production of Nano-Composites with Carbon Nanotubes | - |
| Presenter | Sebastian Horbach, Chemnitz University of Technology | Miguel Pinto, FEUP INESC | Nebojsa Jaksic, Colorado State University - Pueblo | - |

| Room 4 | Track: Simulation/Mfg/TQM/Engr Sust | | Chair: Américo Azevedo, INESC Porto / FEUP | |
|-----------|--|--|---|---|
| Paper ID | 1238 | 1240 | 1020 | - |
| Title | Failure Variation Effects on Production Lead-Times | Tracking of the Position of a Marker for Use in Industrial Processes | Using Machine Signals for Condition Based Maintenance | - |
| Presenter | Dr. Helen Zong, CSUEB | Bruno Ferreira, FEUP INESC | Anton Dietmair, ISW University of Stuttgart | - |

| Room 5 | Track: CAD/CAM FlexMfg/EH&S | | Chair: Prof. V. Ramesh, Sri Jayachamarajendra College of Engineering | |
|-----------|---|---|---|---|
| Paper ID | 1012 | 1242 | 1234 | - |
| Title | 3D CAD-Based Robot Programming for the SME Shop-Floor | Highly Flexible Robotized Cells: application to small series painting | A health & safety perspective on environmental niches of community acquired infectious agents | - |
| Presenter | Pedro Neto, FCTUC - 502971142 | Marcos Ferreira, FEUP INESC | Shahzad connolly, Teesside University | - |

| Room 6 | Track: Allied Topics | | Chair: Dr Somasundaram Kumanan, National Institute of Technology Tiruchirappalli | |
|-----------|--|--|---|---|
| Paper ID | 1173 | 1195 | 1196 | - |
| Title | Rheological Investigation of Gas Atomized Titanium Powder for Metal Injection Molding Using Palm Stearin Binder System | A Comparison Between the Denavit-Hartenberg and the Screw-Based Methods Used in Kinematic Modeling of Robot Manipulators | An applied screw theory to compute the kinematics of multi-robots system in cooperative tasks | - |
| Presenter | Norhamidi Muhamad, Universiti Kebangsaan Malaysia | Altamir Dias, EMC-CTC-UFSC | Altamir Dias, EMC-CTC-UFSC | - |