

Scientific Bulletin of Politehnica University of Timisoara, Romania

Transactions on ENGINEERING AND MANAGEMENT

Vol. 2, Issue 1, 2016

Editorial

Anca DRAGHICI¹

This new journal series has started to be published in 2015 and it is the new face of two former journals that were join together in order to increase the quality of the scientific publication dissemination action and to reduce fragmentation in the field. The former prestigious journals were:

- The Scientific Bulletin of Politehnica University Timisoara, Transaction on Economics and Social Sciences (ranked according to CNCIS classification in Romania: D class);
- The Scientific Bulletin of Politehnica University Timisoara, Transaction on Management. Economics Engineering. Transportation Engineering (ranked according to CNCIS classification in Romania: C class).

The 2016 years Scientific Bulletin issue presents a collection of papers that explore a range of topics across the spectrum of Engineering and Management interdisciplinary domain (according to the Bulletin mission).

The Editorial Board has considered a new idea of publishing, by taking into consideration different group of researchers' contributions. The aim was to encourage young researchers (as the contributions of the PhD students are) and complex studies delivered by groups of different universities' researchers. Started from this issue there have been considered valuable and with highly practical relevance, the contribution articles developed my groups of researchers from the universities and companies. By accepting for publication of such type of articles, more practical oriented, we expect a better knowledge and wisdom transfer of the research results into company's practice (demonstrating the positive impact and implications).

Started from the 2016 issue, we propose the following categories of papers:

1. Debutant researchers' articles;
2. Extended researches;
3. Articles developed in common by researchers from universities and industry.

The implementation of this new publication strategy will be strongly supported by the careful and professional review process, done manly by the *Associated Editors*. The final approval and publishing decision of the articles will be the *Editorial Office* task.

The current issue presents a collection of articles reflecting actual topics and research thematic in the field of: manufacturing and transportation management, entrepreneurship education, complexity management and eCommerce business.

The first two papers are focus on presenting preliminary research results of young PhD Students (both from the Politehnica University of Timisoara, Romania).

- The contribution of PhD Students Andra BADEA and Prof. Gabriela PROSTEAN explains and argues on how to choose the solution of a decision making problem associated to the Alternative Manufacturing Process for wind turbine assembly;

- The article of PhD Students Marian Constantin VASILE and Prof. Marian MOCAN represent a started point for defining the Smart City concept, based on actual and general accepted

references (based on different points of view).

Following on these papers, the next two articles in this issue, focus on relevant aspect of the entrepreneurship education and on how complexity management approach could be design.

1. Using the development context and the financial support of the CNCS – UEFISCDI, project number PN-II-RU-TE-2014-4-1760, a comparative study of the entrepreneurship education in Romania and Greece have been



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elaborated. The presented research explains the results of a survey developed with the support of Romanian students from Politehnica University of Timisoara, faculty of Management in Production and Transportation and the Greek students from Technological Educational Institute of Thessaloniki, Business Administration and Economics and Informatics Departments. This research's conclusions were valorized by both universities teaching staff in order to optimize the entrepreneurship education by taking into consideration the country context, also. We are thanks for this contribution to the Romanian-Greece team of researches consists of: Prof. Kerstin SIAKAS (from Alexander Technological Educational Institute of Thessaloniki, Greece), Associate Prof. habil. Claudiu Tiberiu ALBULESCU and Associate Prof. Matei TAMASILA (both from Politehnica University of Timisoara);

2. PhD. Frank RENNUNG (from T-System Frankfurt, Germany) together with Prof. George Gustav SAVII and Prof. Anca DRAGHICI (from Politehnica University of Timisoara) have been demonstrate in their article which is the scientific to develop an approach for managing complexity. Based on an extended reference study on different scientific areas connected to complexity

management, there have been defined the main knowledge sources that have to be considered for a future model design, providing solid arguments.

The final article bring together the research ideas of two contributors: PhD student Adelin TRUSCULESCU from Politehnica University of Timisoara and Christian MUTHLER from goetzpartners Corporate Finance GmbH, Munich, Germany. The presented research has been developed during an Erasmus+ training programme in 2016. This final article provides a complete study of the size and development of the eCommerce industry by analyzing the main actors and their dynamics. To fully understand the actual size and importance of the eCommerce industry, a comparison with the overall size of the total retail industry is made. In addition, an overview of the number of digital buyers that are purchasing online is presented. The study demonstrates the industry's maturity level and explains the adopted business model.

The Scientific Bulletin issue in 2016 bring together research reflecting a variety of subjects or domains related to different socio-economic systems and having a high practical implication. Furthermore, the articles provide a valuable knowledge base resource in order to support the decision-making process of other researchers, educators, managers or stakeholders.

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**Alternative Manufacturing Processes (AMP) for Wind
Turbine Blade Material, in Isolated Regime
Based on AHP**

Andra BADEA¹, Gabriela PROȘTEAN²

Abstract:

The newest cutting-edge technologies in Renewable Energy Sources (RES) projects provides economic benefits for project developers, especially when installing a wind power in isolated regime. The research was focused on finding technological alternatives, using an optimal composite material for wind blades structure. In this sense, the research team made a decision based on critical analysis of today existing technologies that can provide feasible solutions. The Analytic Hierarchy Process (AHP) method provides results for choosing alternative manufacturing processes, suitable for blades structure, in isolated regime.

Keywords: Collaboration, wind turbine, blade, energy, AHP, environmental.

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**Some Considerations on the Smart City concept.
From Necessity to Implementation Challenges**

Marian-Constantin VASILE¹, Marian MOCAN²

Abstract:

Today, urbanization phenomenon is a reality. Cities are urged to find new solutions for managing their assets in order to prosper, otherwise face decline. This state of facts and necessities require new technologies, new legislation, new managerial approaches and a good understanding of mass psychology. Simultaneously, in the actual era of globalization and scarce resources management, cities must collaborate through efficient information and communication platforms in order to specialize themselves, on the basis of a common strategy. All these challenges have to be studied and addressed for each city, separately and contextually, in order to create the smart cities of 21st century. The aim of the article is to make an overview of the smart city concept development and to underline important aspects, statistics and points of view for its implementation.

Keywords: urbanization, globalization, scarce resources, collaboration, smart specialization, smart cities.

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**Students' entrepreneurial potential and the role of
entrepreneurial education - A Comparative study between
Romania and Greece**

Kerstin SIAKAS¹, Claudiu Tiberiu ALBULESCU², Anca DRAGHICI³, Matei TAMASILA⁴

Abstract:

The purpose of this paper is twofold. On the one hand, the paper draws a comparison between the national entrepreneurial potential and characteristics in Romania and Greece, using the Global Entrepreneurship Monitor (GEM) statistics. On the other hand, the paper aims to investigate the students' entrepreneurial potential and the role of education, considering the case of two technical universities, one from Greece and one from Romania. While at national level the latest GEM data indicates a higher entrepreneurial potential for Romania, the institutional comparison made, and the statistical data processing, underline the gap of entrepreneurial education in both universities. More precisely, using the questionnaire approach, we show that students hardly perceive the role of courses related to entrepreneurship. Thus, the courses taught at the analyzed universities fail in highlighting and developing entrepreneurial skills, although their structure and topics are related to entrepreneurship. These results have practical implications and they serve to find solutions for improving the entrepreneurial education in both institutions.

Keywords: entrepreneurial potential, entrepreneurship education, survey, Greece, Romania.

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State of the Art on Relevant Research Areas Connected to Complexity Management

Frank RENNUNG¹, Anca DRAGHICI², George Gustav SAVII³

Abstract:

The article is focus on describing the connected or associated concepts and disciplines for managing complexity. The approach will follow: (1) the holistic perspective; (2) the specific approach of complexity management (service-related); (3) the special (nonservice-oriented) research areas of complexity management; (4) characteristics of complexity in outsourcing projects. In the final chapter, relevant conclusions related to the state of the art will be made. The aim of the article is to emphasize the necessity of viewing complexity management as a new organizational challenge and initiatives. The main finding of the research consists of the identification of different knowledge sources related to complexity management connected disciplines that have to be considered by managers in order to define successful strategy, methodologies and processes.

Keywords: Complexity, management, outsourcing, project management, Industry 4.0

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A Study on identifying the eCommerce Players and Business Model

Adelin TRUSCULESCU¹, Christian MUTHLER²

Abstract:

The aim of the paper is to analyze the eCommerce industry development in order to create the theoretical base for the business valuation process, in the case of the eCommerce industry (particularly refer to the online retail industry). Considering this research approach, the most important part of a valuation base and drivers analysis is to identify the relevant companies and by a detailed understanding of their business model, to recognize which companies can be compared to each other. The presented study's conclusions will underline important issues for the companies' valuation process.

Keywords: eCommerce, industry, analysis, drivers, business model, retail, marketplace.

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