

## Implementation of Industry 4.0 in Enterprises

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### Abstract

**Purpose of the article** The purpose of this article is to evaluate the challenges, benefits, and pitfalls in companies implementing industry 4.0 to the strategic management of the company. The aim of the article is to reveal what changes industry 4.0 will bring in the area of organization, management or the supply chain. This article, mapping the fourth industrial revolution, discusses the challenges, benefits, and pitfalls of implementing the industry 4.0 to the functioning of companies. Secondary data, derived from scientific studies by foreign authors publishing mainly in the Emeraldinsight electronic database, were used to identify them. These scientific studies have dealt with industry issues of 4.0 in various areas such as management, human resource management, supply chain management, but also comparing myths about industry 4.0 with reality (e.g. article – “Challenges and benefits of Industry 4.0“ by Mamad Mohamed, “Reconceptualising value Innovation for Industry 4.0 and the Industrial Internet of Things“ by Paul Matthysens etc.). Industrial Revolution 4.0 is proof of continued development, which reduces the life cycle of industrial development and requires businesses to harness their full potential for Innovation that will lead to a competitive advantage. The article describes the course of implementation, where the first key element of success is the understanding of existing processes in the company. Identifying how they are implemented, assigning responsibilities and related standards. Integration of IOT device and big data. Emphasis is placed on the use of data analyzes, both in predicting possible adverse events and in creating added value, minimizing risk, saving costs and increasing profits. A long with identifying the benefits and contributions, issues and problems will also be described. Another important part is the assessment of strategic management challenges, including managerial and organizational challenges, supply chain management and human resources management. Human resources management is assessed from the point of view of recruiting and retaining new employees within the development not only of technological areas but also of generational development with the emerging generation Y and Z. The new era of industrial revolution also requires more developed capabilities to enable companies to develop and sell future values including combinations of products, applications, systems and services. This requires building a platform and integrating the various features and skills of the company.

**Methodology/methods** From a methodological point of view, the article deals with the theme of the implementation of the Fourth Industrial revolution in companies. An analysis of scientific articles has been carried out, dealing with various aspects of the impact of industry 4.0 on the business environment. This methodology was chosen, purpose to get a full understanding of the area and the current developments described in the various expert studies (e.g. Organizational and managerial challenges in the path toward Industry 4.0 by Agostini and Filippini).

**Scientific aim** The aim of this article is to map the process of the implementation of industry 4.0 to the business environment and its impacts on the companies.

**Findings** The article investigated the process of the implementation of industry 4.0 to the companies' environment and the upcoming challenges and benefits, but also the problems in the future development of the business. The limit of the research is the analysis of secondary data and the absence of primary data analysis in the form of extensive research in selected enterprises mainly manufacturing.

**Conclusions** The article describes five advanced integrative capabilities to create the future value of innovation in the era of the Fourth Industrial Revolution. The article also includes assessment of reality and myths about industry aspects 4.0.

**Keywords:** industry 4.0, implementation, benefits, smart HR, innovation

**JEL Classification:** M15, M21

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