

# Marketing principles for Industry 4.0 – improving connections to customers

1.9.2020

Industry 4.0 changes also the way how we carry out marketing activities. There is an ongoing activity to define those elements of marketing where changes are most evident. Katarzyna Nosalska and Grzegorz Mazurek have written an article 'Marketing Principles for Industry 4.0 – a Conceptual Framework' in 'Engineering Management in Production and Services' magazine about the key areas of the marketing mix where changes might be needed.

In this article Nosalska and Mazurek discuss both B-to-B marketing and marketing (B-to-C marketing) in general. In this article author concentrates on the B-to-B Marketing area. As a comment from the author, some of the key areas where changes might be needed based on the article already exist in B-to-B marketing. Of course digital environment provides new opportunities in some of these key areas discussed above.

In industry 4.0 we are discussing about deep digital transformation of value chains, business models, products and services. We move in production processes from mass production to personalized production. Through personalized production you can satisfy the individual needs of customers more effectively.

Digital technologies influencing this whole process discussed above are e.g.: Virtual Reality, Augmented Reality, Big Data Analytics, Cyber-physical Infrastructure, Internet of Things, Additive Manufacturing, Cloud Computing, Smart Sensors, Artificial Intelligence, Mobile Technologies and Autonomous Robots & Systems.

A key concept in understanding Industry 4.0 from business perspective is digital business ecosystem. Digital business ecosystem refers to connectivity of the stakeholders which enables cooperation, communication as well as co-creation. Customers, all business partners and suppliers should be treated as stakeholders in the digital business ecosystem.

Nosalska and Mazurek proposed in their article five main principles to be taken into consideration in Industry 4.0 marketing. These principles are: cooperation, conversation, co-creation, cognitivity and connectivity.

Co-creation refers to customer involvement in the creation of the product. Nosalska and Mazurek refer to the co-creation of the products through active involvement of the customers. In this kind of process we can already speak of the customer as a co-designer, co-marketer, co-brander and co-producer of the product.

In Industry 4.0 operational environment you can customize products and engage in tailor made communication with individual customers (Conversation). In B-to-B environment you can tailor make communication even more in internet environment. This phenomenon is strengthened through real-time customer data usage which could lead to application of real-time marketing.

Cooperation could mean for example smart supply chains where technology makes it possible for all chain partners to use a transparent data system which can be used to benefit all supply chain participants.

Cognitivty might be visible e.g. in the pricing of the product. Customers could be profiled based on their previous activity. Cognitivty might be actually more usable concept in B-to-C marketing area because in many consumer products e.g. time of the purchase might be influencing pricing (more than in B-to-B products). Customers operating system might influence the price etc.

Internet forms the platform for connectivity. Internet forms the basis for digital ecosystem which makes everything discussed above possible and more operational than in a brick and mortar world.

**Ville-Pekka Mäkeläinen**

Principal lecturer (International Marketing)

Seinäjoki University of Applied Sciences

School of Business and Culture