

# Chapter 3

## Conceptualizing Digital Transformation: Base Dimensions for Building a Framework

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### ABSTRACT

*We live in an undeniably digitalized world where understanding and implementing a Digital Transformation process have become critical factors for most organizations. Due to its relevance and topicality, this topic has emerged as a theme of great interest, where academia points out the need for more understanding of its requirements and strategic guidelines. This study was developed to define the basic dimensions for implementing Digital Transformation, considering a set of technologies that adhere to the concept of Industry 4.0. The methodological approach chosen was procedural research, where the method selected for its progress was descriptive and impact research. Were identified three drivers and nine dimensions that can serve as a basis for the digital transformation process in an organization. With this study, it was possible to build a preliminary model that can serve as a basis for mapping the*

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*process of implementing Digital Transformation 4.0 in future studies and can help organizations improve their processes and actions towards this era of innovation.*

## **1. INTRODUCTION**

Today's world is undeniably digital and understanding and implementing a Digital Transformation (DT) process have become critical for most organizations. Due to its relevance and contemporaneity, Digital Transformation emerges as a topic of great interest, where academia lacks a comprehensive portrait of its requirements and strategic guidelines. In this context, researchers have warned about the need to build an approach to digitally transform business models and define which facilitators, phases, and instruments can be considered.

Due to its relevance and topicality, DT is a topic of great academic interest (Mahraz et al., 2019; Brown & Brown, 2019; Morakanyane et al., 2017; Vaska et al., 2021). However, research has shown that it is a concept whose definition still requires more in-depth construction, which needs a better understanding of its requirements and a strategic orientation in a long-term perspective (Mahraz et al., 2019; Schallmo et al., 2017; Brown & Brown, 2019; Morakanyane et al., 2017). In addition, researchers point out that it is also necessary to build an approach to digitally transforming business models and define which enablers, phases, and instruments can be considered (Schallmo et al., 2017; Ziyadin et al., 2019).

The topic of Digital Transformation (DT) in society is not new. It began in the 1960s and 1970s with basic transactional systems. In the 1980s and 1990s, DT experienced its first significant boost in organizations with the advent of computer systems, when the use of PCs, online systems and communication via email was adopted (Westerman, Bonnet & McAfee, 2014).

In the 1990s and 2000s, the idea of digital products, services and media was already widespread and well-understood (Schallmo, Williams & Boardman, 2017). From the 2000s onwards, DT leaped forward with the spread of cell phone use, the ubiquity of the internet and cheaper global communications (Westerman et al., 2014). From the 2000s to 2015, devices and social media platforms emerged that drastically changed the communication channels between companies and customers; in addition, customers also changed their expectations regarding response time and multichannel availability. Companies realized that they could communicate digitally in an individualized way and in real-time (Schallmo et al., 2017).

Currently living in a post-pandemic world, TD has impacted large, medium and small companies, particularly the retail market, through its implementation in commercial relationships. Examples include delivery activities, autonomous service, the use of chatbots powered by artificial intelligence, subscription clubs, live com-

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