International Journal of Information Management 36 (2016) 240–244

Contents lists available at ScienceDirect

International Journal of Information Management

journal homepage: www.elsevier.com/locate/ijinfomgt

A case analysis of a product lifecycle information management framework for SMEs

Pedro Soto-Acosta [a,*], Emilio Placer-Maruri [b], Daniel Perez-Gonzalez [b]

[a] Department of Management & Finance, Universidad de Murcia, Campus de Espinardo, 30100, Espinardo, Murcia, Spain
[b] Department of Business Administration, University of Cantabria, Avda. de Los Castros S/N, 39005 Santander, Cantabria, Spain

ARTICLE INFO

Article history:
Received 3 November 2015
Accepted 3 December 2015

Keywords:
Product Lifecycle Management
Information management
Internal processes
SMEs

ABSTRACT

Information management during the product lifecycle has received a great deal of attention over the last few years, mainly because firms work in a complex business environment characterized by information overload, high levels of competitiveness and the acceleration of technological change. In this context, Product Lifecycle Management (PLM) software has been evolving rapidly and, today, powerful tools in the market enable high levels of information to be managed. However, commercial PLM software is mostly oriented towards large-sized firms, which poses a big challenge for small and mid-sized enterprises (SMEs). To address this issue, SMEs can develop their own Product Lifecycle Information Management (PLIM) Frameworks for managing data and information throughout the product lifecycle processes. This article presents a successful example of a PLIM Framework: the case of Pladomin's PLIM Framework.

1. Introduction

Changes in the current global economic scenario are inevitable. As a consequence, managing all the information during lifecycle of the product represents a major challenge for small and mid-sized enterprises (SMEs), which must nowadays compete in a global market (Soto-Acosta, Popa, & Palacios-Marqués, 2015). The process of managing the whole lifecycle of a product from the inception, through design and manufacturing, until it is disposed of, is referred to as Product Lifecycle Management (PLM). PLM is a new approach for managing information along the product lifecycle that enables firms to reduce products' time-to-market as well as to respond to a growing demand of quality and customization of products. From the point of view of knowledge management, companies may benefit from PLM through fast and easy exchange of documents and expertise, simultaneous dissemination, real-time control, improved communication and accessibility of product-related information. At the same time, PLM is a collaborative platform that can improve information access and sharing inside the company and between the company and its stakeholders (Palacios-Marqués, Soto-Acosta, & Merigó, 2015; Palacios-Marqués, Merigó, & Soto-Acosta, 2015).

Although there is a wide offer of PLM software available on the market, the lack of interconnectivity with other enterprise information systems is still a common issue that firms must deal with. Another important challenge has to do with the limited financial resources of SMEs, which limits their access to this costly software (Vezzetti, Violante, & Marcolin, 2014). In addition, adopting commercial PLM software may introduce significant changes in companies' routines and processes. In this sense, a self-developed PLIM Framework might be a good alternative. Nevertheless, planning and managing the process of change is fundamental for the success of the PLM system. The main objective of this case study is to present an example of a successful implementation of a self-developed PLIM Framework in a SME from the manufacturing industry.

2. Company background

Pladomin is a Spanish SME with over 80 employees and an annual turnover of approximately 10.6 million Euros. Initially, the company specialized in manufacturing household products, but in 1980 some of its activities were reoriented to attend to the demands of industrial customers in the telecommunications sector. In 1990, after obtaining the ISO 9002 norm, Pladomin started to collaborate with some of the most important domestic appliance manufacturers, such as Fagor, Bosch, Siemens or Teka, among others. Over the last decade Pladomin has obtained the ISO 9001-200 and the ISO TS16949:200 certifications and made an important push to enter

* Corresponding author. Fax: +34 868887537.
E-mail addresses: psoto@um.es (P. Soto-Acosta), placer@unican.es (E. Placer-Maruri), daniel.perez@unican.es (D. Perez-Gonzalez).

http://dx.doi.org/10.1016/j.ijinfomgt.2015.12.001
0268-4012/