A NEW TYPE OF MANAGEMENT: FACILITY MANAGEMENT

Ana MUNTEANU¹ Gabriela MEHEDINTU²

Abstract: The paper examines several aspects of the new type of management: Facility Management, which influences an organisation's ability to act proactively and meet its requirements by optimizing its costs and performance of facility services.

The paper highlights the fact that while Facility Management organizations are part of a growing sector within the economy, Facility Management is a real contributor to the European economic development, although it entered Europe only in the mid 1980s from the USA and the first European standard was approved by the CEN and published in 2006. Based on the principles promoted at the European and international level, two important innovative factors in the FM industry are the promotion of green buildings and the offer of qualitative, modern, clean environmental and customer-oriented solutions.

Keywords: innovation, facility management, green building, services, sustainability, technological change

JEL Classification: M10, O14, O33, D80

1. Introduction

Although the concept of 'Facility or Facilities Management' (FM) has recently entered the language of business and it is still a fairly new management discipline, it proves to be more and more present in the national and international economy due to the accelerated development of

¹ Spiru Haret University, Faculty of Management, Brasov, Romania, e-mail: anamunteanu.engleza@gmail.com.

² PhD candidate in Construction Management at the Technical University of Civil Engineering Bucharest, Romania, e-mail: gabrielamehedintu@yahoo.de.

the service industry. The existence of this concept completely changes the vision on secondary services and partnerships between companies and develops strategies based on mutual interests with development potential.

During the second half of the 1970s, Herman Miller, Inc. established the Facilities Management Institute (FMI). This organization helped establish the new profession of FM and founded IFMA. In viewing the underlying model for facilities management as a profession, FMI developed a three-element model of people, process, and place. Thus, FM plays an important role in integrating employees, work processes, and workplaces into a coherent, productive, holistic system. FM serves to coordinate the interface between *what* people do and *where* they do it. Consequently, critical components of FM include planning and maintaining, and providing the assets, both large and small, that support the endeavour of people at work'. (Teicholz, 2001, p. 7).

Researchers and many economists are sure that Facility Management can contribute to the sustainable development of micro- and macroeconomic level by integrating primary and support processes within the organization, through the direct influence of the construction of a building offering innovative integrated solutions. Since minimizing the costs is the main objective of a company, especially in times of recession, companies providing FM services lay the foundation of outsourcing through their quality, integrated and efficient services with strategic implications for their customers.

Companies generally must look to the future, taking into account the social, economic and environmental aspects of their actions. The stake is to identify as early as possible the wishes and needs of the parties with whom the company interacts, to adapt to the new reality, to be innovative and open to progress. Taking into consideration these aspects, the best development is assured.

2. A Brief History of Facility Management

The origins of the FM concept are not clearly defined and the theory was introduced in the specialized language of economics about 50 years ago. Some experts argue that it emerged at the same time the IT technology outsourcing appeared (in the late '60s), others make a link with the old American railway from the mid 1800s. And then, Facilities Management entered Europe in mid 1980s from the USA. (Azman, 2014)

According to the German Facility Management Association (GFMA) the origins of FM come from the American business field, namely the Pan-American-World-Services airline (PAWS) which in the 50s had to increase the productivity of the company's management and maintenance. PAWS became the provider of facility management for the US Air Force and it is considered the first foreign FM company. (http://www.gefma.de/facility-management.html)

Since the establishment of the Facility Management Institute (FMI) in Michigan in the 70s, the scientists have been dealing with this topic. In 1980 the National Facility Management Association (NFMA) was established; in 1981 it was renamed, becoming the International Facility Management Association (IFMA), which has developed exponentially ever since. In 1992, IFMA created a certification program for Facilities professionals. The Certified Facility Manager (CFM) designation is recognized worldwide as the premier certification for Facility Managers. Nowadays, IFMA is the ultimate resource for facility management professionals as well as the leader in promoting excellence in management of the work environment. (http://www.ifma.org/about/about-ifma/history)

3. Facility Management Definition(s)

Numerous definitions of the concept of facility management have been developed due to the cultural differences of each country and to the different temporal dimensions in which people turned their attention to this area. A study by Green and Price (2000) quoted by Price (2003) proved that all the eleven definitions reflected the context and the defining activities of those moments.

The development of standards in FM dates back to the beginning of the XXIst century, more precisely, 2003, when the British Institute of Facilities Management and the European Committee for Standardization wanted to regulate Facility Management, with the aim of involving various European countries and develop facility management as a professional recognized discipline. Thus, the European Standard was approved by CEN several years later in three official versions (English, French, and German). Its main purpose was to define the terms in the area of Facility Management in order to:

- improve the communication between stakeholders;

- improve the effectiveness of the primary activities and Facility Management processes of an organization;
- improve an organization's quality of the output;
- develop systems. (European Committee For Standardization, 2006)

In 2006 the first two standards in Facilities Management 'BS EN 15221-1 Terms and Definitions' and 'BS EN 15221-2 Guidance on How to prepare Facility Management Agreements' were published and accepted by 30 participating countries across Europe. They were followed by four additional standards (Quality in Facilities Management, Taxonomy of Facilities Management, Facilities Management Processes, Facilities Management Space Measurement) that were published in 2011 and were designed as a prerequisite to the development of a benchmark standard. (http://www.bifm.org.uk/bifm/knowledge/research/Standard)

According to the European Committee for Standardization (2006), facility management is defined as the 'integration of processes within an organization to maintain and develop the agreed services which support and improve the effectiveness of its primary activities'.

Within an organization, through the coordination of assets and services, responsibility, technical and economic knowledge, using managerial skills and being responsive to new, respectively to continuously adapt the organizational environment, the facility management function as an integrated process influences positively the organization's ability to act proactively, to optimize the capacity and the runtimes of the assets, to provide added value to them and to the buildings, to improve the processes within the organization, and reduce long-term operating and management costs, to flex the fixed costs, to develop the entire business.

The following figure presents the Facility Management model which provides a framework describing how Facility Management supports the primary activities of an organisation. It deals with the demand and supply relationship and presents the different levels of possible Facility Management interaction.

As Holger Knuf (2007) notices, the secondary processes are related to the five production factors (resources): human (employees or their activities which are not directly related to the main process); equipment (additional equipment, building property, infrastructure), materials (supply media, energy, consumer goods), time (relevant both for the primary and secondary processes), monetary (material costs, capital expenditure, value of machinery). The secondary processes fall into two categories:

- Corporate Real Estate Management (CREM) Property
- Management, Asset Management (investment strategy, acquisition)
- Service Management Facility Services (maintenance, logistics, marketing, HR, legal, etc.)



Figure 1. Facility Management Model Source: European Committee for Standardization, 2006

Facility Management contributes to the economic sustainable development in two ways. On the one hand, it is responsible for the improvement of the main activities within organizations; on the other hand, it supplies services in the areas "space and infrastructure" and "people and organization". (European Committee for Standardization, 2006) Thus, as professor dr.-ing. Antje Junghans (2011) has already stated FM contributes





Figure 2. Basic structure of Sustainable Facility Management (SFM) Source: Junghans, A., 2011.

It is well-known that the primary processes depend on the size and structure of a company. The development of SFM strategies should take into consideration the companies' various sizes and ways of operation due to different frameworks and targets. The category 'space and infrastructure' is related to following real-estate basic processes: workplace, technical infrastructure, cleaning. The category 'people and organization' supports a company's organizational main processes and includes services, such as: office and welcome desk services, help desk, catering and vending machine services, organization of conferences, meetings and special events. Antje Junghans (2011, p. 559) really believes that the targets for SFM are connected to the three dimensions of sustainability:

- society; hence two social targets: supply of adequate buildings for work and life and compliance with health, safety and security requirements;
- the economy; therefore she thinks of some economic targets: building space optimization for a most efficient usage, optimization of building life-cycle costs and facilitating the most efficient management methods;

Review of General Management Volume 22, Issue 2, Year 2015

the environment; so some ecological targets are: reduction of resources, usage of recyclable building material, reduction of energy consumption and usage of renewable energy sources, reduction of space requirements and soil sealing, safeguarding the ability to maintain and de-construct buildings, preventing the usage of material causing excessive emissions.

4. The Overall Benefits Provided by the Facility Management – e.g. FM Market in Germany

Being a growth engine for organizations, Facility Management is also contributing to the development of its industry, to the real estate sector and the development of the whole economy, through the specialization and creation of synergies within a company.

According to a study conducted by the ISS company, it is estimated a growth of the worldwide facility management outsourcing market up to \$ 1.314 trillion in 2018. (Hodge, 2014)

Customer expectations include getting value-added services through outsourcing, making FM providers assume risk transfer and FM suppliers evolve from service providers to strategic partners. These demands lead to a new way of thinking about the FM outsourcing services which provide their customers with integrated services, reducing costs, offering flexibility, adaptability and sustainability.

A representative reflection of the evolution of the importance of the FM companies is the German market, the economic engine of the European Union. According to the data from GEFMA (2014), the FM market was a stable economic factor with a gross value added of 130 billion Euros in 2012. Facility Management is one of the key industries, supporting the German economy, a thing which the experts did not believe possible four years ago. Especially in recent years, difficult from the economic point of view, dynamic and not transparent, the FM industry has proven to be a stable one, resilient to the crisis; moreover, it showed an increase.

Prof. Dr. Markus Thomzik from IAI (Institut für angewandte Innovationsforschung) notes that in 2012 this sector had 130 billion Euro gross value-added compared to 2008 when this figure stood at 112 billion Euros. (GEFMA, 2014) According to the report, about 62.1 billion Euros are generated by foreign companies providing services related to FM (47.7% outsourcing) and by external service companies, and 6.81 billion

Euros by domestic organizations. The total share of FM in the GDP was 5.42%. Unlike many other sectors, the industry can boast an average annual growth rate of approximately 4% over the last four years, and the forecast for 2015 stands at 4.8%.

The German FM industry also proved to be an engine for jobs because it offers a wide range of professional fields and career opportunities. The number of the employees from the FM sector increased by nearly 10% over the last four years, and in 2014 reached about 4.5 millions.

A study by Roland Berger Strategy Consultants predicts a market growth by 6.5% per year up to 2020, due to the increased demand and at the same time it claims the optimization of the efficiency. (Batzing, 2012).

Regarding the German FM market structure, after looking at the Lünendonk-Liste 2015, we can draw the conclusion that it is dominated by the top 10 facility services companies which in 2014 represented 6.2% of the domestic market (compared to 4.04% in 2013) due to the increased turnover and the mergers and acquisitions. The Bilfinger and Strabag companies are market leaders, with a turnover of over 1,000 billion Euros due to the exclusive organizational growth for the former, and for the latter, the Strabag company, due to the overtaking of DIW (C.A. + 16.5%). The third place is occupied by Wisag, with an increase in turnover of 4%. Upward trends are expected for the coming years, due to the variety of the demands and the complexity of the offered services.

Nr. crt.	Company	Turnover (Mil. Euro)	
		2014	2013
1	Bilfinger SE Facility Service, Neu-Isenburg	1241,0	1187,0
2	Strabag Property and Facility Services GmbH, Frankfurt a.M. 1)	1015,0	871,0
3	Wisag Facility Service Holding GmbH & Co. KG, Frankfurt a.M.	852,0	819,0
4	Dussmann Service Deutschland GmbH, Berlin *)	830,0	785,0
5	Spie GmbH, Essen *)	690,0	650,0

Table 1 - The 5 leading facility services companiesin Germany in 2014

*) partial approximated turnover

1) including the turnover of the DIW Instandhaltung Ltd. & Co. KG Own representation using the data from Lünendonk-Liste 2015 Based on the growing trend of outsourcing and cost awareness, there were some companies that have managed to strengthen their market leading position on the German market due to the FM.

Although the FM industry got through the economic crisis, there also were some challenges for the German companies. Thus, A. Schäfer (2010) mentions the high pressure put on prices: the economic crisis made the companies be very attentive to the acquired services guiding thus the prices, giving up the innovative solutions, although they could have brought financial benefits on the medium to long term. In general, FM is responsible for the safekeeping of the assets of a company. By the economical use of resources, FM can reduce the lifetime costs of a building. A building must be constantly maintained, regardless of the economic situation of the client company, which presents an advantage of the FM companies providing services in times of crisis.

For an optimum position on the market and to overcome any obstacle on this constantly changing, complex and nontransparent market, it is necessary to implement clear strategies and good action tactics.

5. Growth factors of the FM industry. Innovation

The technological and economic developments and the raised attention for a minimum cost require new perspectives on the demand which asks, on the one hand, strict specialization of the subfields of each company, reflecting the increased interest in outsourcing and on the other hand, the need for integrated services tailored unconditionally to the customer needs. The FM service providers must evolve to keep up with these demands. (Hodge, 2014) Thus, the FM industry develops on the following factors: economic and legal factors, clients' high interest in outsourcing, service integration, demand for value-added services. Customers expect from FM service providers to act in accordance with the company's needs, regulations and values, particularly on three major areas: social (for staff, business partners. community), economic (ensure shareholder value). and environmental. Also, the providers must demonstrate effective behavior (for example, to adapt quickly to any contingency), mobility (i.e. to be available for all locations where the customer operates) and professionalism.

We agree with the researchers who believe that innovation is a key factor in FM. Innovation can be viewed as the application of better solutions that meet new requirements or needs. (Maranville, 1992) This is

accomplished through more effective products, processes, services, technologies, or ideas that are readily available to markets.

The term innovation can be defined as something original and more effective and, as a consequence, new, that 'breaks into' the market or society. (Frankelius, 2009)

The European Commission defines innovation as 'the successful production, assimilation and exploitation of novelty in the economic and social spheres. It offers new solutions to problems and thus makes it possible to meet the needs of both the individual and society'. (European Commission, 1995, p. 1)

In the organizational context, Salge (2012) says that innovation may be linked to positive changes in efficiency, productivity, quality, competitiveness, and market share.

Innovation is nowadays essential for facing the market pressure, for the company's profit, market share and for surviving in the rapidly changing business environment.

Because in the FM industry there is a close relationship with the client, the service providers must be in a continuous process of adaptation and improvement in order to meet their customers' needs, to enhance their experience, or even to provide visionary solutions to produce their customer companies' development and progress.

An innovative solution based on the principles promoted at the European and international levels is related to a clean environment. Through the 'Europe 2020' strategy, the European Commission (2010) promotes the initiative 'Resource efficient Europe' and requires its Member States 'to use regulation, building performance standards and market-based instruments such as taxation, subsidies and procurement to reduce energy and resource use and use structural funds to invest in energy efficiency in public buildings and in more efficient recycling'.

One possible course of action for the FM service companies is to focus on the concept of Green Building, which is the key to energy and resource efficiency, to develop the business portfolio, to supply the customers' desire to develop an eco-friendly environment for gaining market shares, for economic progress.

'Green building is the practice of increasing the efficiency with which buildings use resources — energy, water, and materials — while reducing building impacts on human health and the environment during the

Review of General Management Volume 22, Issue 2, Year 2015

building's lifecycle, through better sitting, design, construction, operation, maintenance, and removal.' (Frej, 2005)

Green building strategies are at the beginning, but they quickly evolve towards a sustainable future through innovation, technology, modern infrastructure and partnerships.

6. Conclusions

Facility Management, this modern and comprehensive concept, is proving to be of great interest due to its complexity and uniqueness. It is also an engine of the macroeconomic development, with unusual potential if integrated efficiently.

The companies from the FM industry that prove to be reliable partners with integrated and customized service offerings reach the primary economic goal: making a profit. A company providing FM services should have an open and customer-oriented strategy, easily adapting to the clients' needs, proposing innovative solutions leading towards progress. The success is achieved through: efficient and effective use of resources, protecting the environment, adapting to new technologies, focusing on minimizing the costs.

Based on the principles promoted at the European and international level, an innovative solution is related to a clean environment. Thus, the promotion of green buildings and the offer to the client of qualitative, modern and clean environmental oriented solutions are the key towards success.

References:

- Azman, N.M.N., Hakim, A.M., Buang. A., (2014). Facility Management History and Evolution, International Journal of Facility Management, 5(1), 34-53.
- Batzing, J. (2012). Facility Management kann sich über Energieeffizienz profilieren EFMC, EUROFORUM DEUTSCHLAND SE, at http://www.presseportal.de/pm/6625/2188289, accessed in July 2015.
- European Commission (1995) Green Paper on Innovation. Brussels: European Commission.
- European Commission, (2010) Europe 2020. A strategy for smart, sustainable and inclusive growth, Brussels, Euro 2020_EN6.pdf.
- European Committee For Standardization, (2006). Facility Management part 1: Terms and definitions, Brussels.

- Frankelius, P. (2009), *Questioning two myths in innovation literature*, in *Journal of High Technology Management Research*, 20 (1), 40 51.
- Frej, A. B., editor. (2005) *Green Office Buildings: A Practical Guide to Development*. Washington, D.C.: ULI--The Urban Land Institute, 4 8.
- German Facility Management Association (GEFMA), (2014). *FM Branchenreport 2014*, at http://www.gefma.de/branchenreport.html, accessed in July 2015.
- Hodge, G., Poglitsch, R., Ankerstjerne, P., (2014). *Perspectives on the FM market development*, ISS White Paper.
- Junghans, A., (2011). State of the Art in Sustainable Facility Management.
 I: Proceedings of the 6th Nordic Conference on Construction Economics and Organisation – Shaping the Construction/Society Nexus. Volume 2: Transforming Practices.: SBi Danish Building Research Institute, Aalborg University, CIB Publication, 553-563.
- Knuf, H., (2007). Alles wird gut! Die aktuellen Entwicklungen im Facility Management, in Facility Management, 3, 28-30.
- Lünendonk-Liste 2015: *Die 25 führenden Facility-Service-Unternehmen in Deutschland 2014*, at http://luenendonk-shop.de/out/pictures/0/lue_liste_fs_2015_f080615_fl.pdf.
- Maranville, S., (1992). Entrepreneurship in the Business Curriculum, in Journal of Education for Business, 68 (1), 27-31.
- Price, I., (2003). Workplace Strategies and Facilities Management, Butterworth-Heinemann.
- Salge, T. O., Vera, A., (2012). Benefiting from Public Sector Innovation: The Moderating Role of Customer and Learning Orientation, in Public Administration Review, 72 (4), 550-560.
- Schäfer, A, (2010). Strategien in Zeiten des Wandels, Facility-Management-Dienstleistungen in Deutschland, 11, OC&C Strategy Consultants, at:
- http://www.facility-management.de/download/291368/OC_C_Facility-Management.pdf
- Teicholz, E., (2001). *Facility Design and Management Handbook*, McGraw-Hill Professional.
- http://www.bifm.org.uk/bifm/knowledge/research/ Standard, accessed in July 2015.
- http://www.gefma.de/facility-management.html, accessed in July 2015.
- http://www.ifma.org/about/about-ifma/history, accessed in July 2015.

Review of General Management Volume 22, Issue 2, Year 2015