Global J. Environ. Sci. Manage. 5(SI): 151-159, 2019

**Global Journal of Environmental Science and Management**
(GJESM)

Homepage: https://www.gjesm.net/

SPECIAL ISSUE PUBLICATION
Presented and selected at the ICCMIT'19 in Vienna, Austria

# Sustainability as a determinant of cost management in the accounts of a manufacturing Industry

**M. Stępień**

*Częstochowa University of Technology, Faculty of Management, Poland*

**ARTICLE INFO**

***Keywords:***
Cost Management
Management Tool
Manufacturing
Sustainable Development

**ABSTRACT**

The problem taken up in the study is the management of the company in terms of costs incurred on the implementation of the concept of sustainable development. The problem is important and topical in view of the possibility of increasing the efficiency of management in companies organizing their activities in the perspective of sustainable development. As a consequence of the formulated research problem, the aim of the study was to recognize and assess the relationship between the currently binding provisions of the balance sheet law in Poland, in the area of costs incurred for sustainable development, and the social, economic and environmental strategy to be implemented. All the presented deliberations are divided into two main parts, theoretical and empirical. The considerations presented in part one characterize the elements of cost management in a company in the context of sustainable development. The second part is a presentation of the results of empirical research on the determinants of sustainable development cost management in a manufacturing company. The study contributes to the discussion on the identification, allocation and presentation of costs related to the implementation of the sustainable development strategy in the company. Conclusions from the conducted research suggest the necessity of separating analytical tools in the accounting structure of the company in order to identify and allocate costs related to the construction of the sustainable development strategy. This makes it possible to assess the extent to which the company's sustainability concept has been achieved. The research methods used to achieve the objective are literature studies, descriptive analysis and case studies.

DOI: 10.22034/gjesm.2019.SI.17

| NUMBER OF REFERENCES | NUMBER OF FIGURES | NUMBER OF TABLES |
|---|---|---|
| 20 | 0 | 2 |

*Corresponding Author:
Email: *marcin.stepien@wz.pcz.pl*
Phone: +48604 852524

Note: Discussion period for this manuscript open until October 1, 2019 on GJESM website at the "Show Article.

## INTRODUCTION

One of the key aspects of business management is to take up challenges related to the implementation of the concept of sustainable development. Implementation of the concept of sustainable development is inextricably linked to the costs incurred for this purpose, the identification, measurement and presentation of which is a research problem addressed in the article. Sustainable development is one of the expressions of corporate social responsibility (Kates *et al.*, 2005). The implementation and application of solutions related to the implementation of the sustainable development strategy in the company is intrinsically linked to the costs incurred for this purpose. By incurring costs in the areas related to sustainable development, enterprises aim at the same time to increase the effectiveness of broadly understood business management. In this context, the aim of the study is to identify and assess the relationship between the currently binding provisions of the balance sheet law in Poland in the area of costs incurred for the benefit of sustainable development, being an expression of conscious business responsibility. This study has been carried out in Poland, the study covered the years from 2015 to 2018.

*Sustainable development in company management*

The term "management"; can be defined in many ways. They depend on the field of knowledge, area or environment to which the term is referred to. Trying to broadly define the concept of enterprise management, it can be defined as an activity consisting in disposing of resources (impact on resources, or the wider environment), in order to achieve the set objectives of the enterprise in accordance with the principle of rational management. Business management is influenced by the enterprise's environment, which may be understood as the external world around it, consisting of elements that are not part of it (i. e. not influenced by the management centres of the enterprise), but affect and sometimes interact with each other on the basis of reciprocity (Chen *et al.*, 2008). One of the important elements of company management is the impact on the company's environment, which has a significant impact on the company. J. Child points to the determinism of the environment, suggesting that the direction of the impact of changes in the environment on the organisation is vector-based (organisation-environment) (Child, 1979). The segregated turbulence of the environment is an important determinant influencing the management of a modern enterprise. The dynamics and strength of impact of a changing environment, which is important in terms of sustainable development, can be considered as an antinomy of a stable or turbulent system (Andersen *et al.*, 2004; Eisenhardt *et al.*, 2010; Park *et al.*, 2005). A company may use management tools to influence the environment, which in turn affects the company (Holm *et al.*, 2012). In the management of a company related to sustainable development, basic management functions can be observed, which are divided into: 1) planning 2) organising 3) motivation 4) control (Białasiewicz *et al.*, 2008; Popov *et al.*, 2018). Planning boils down to defining objectives and methods, resources and activities necessary to achieve them. Organisation is the creation of a company structure, reacting both internally and externally, to achieve its objectives. Motivation is designed to influence the members of the company's organisation in such a way that their actions are conducive to the achievement of the company's objectives. Control is used to determine the stage of implementation of tasks aimed at achieving the company's objectives by comparing the implementation plan with what has actually been achieved (North *et al.*, 2018). The concept of sustainable development in company management, being one of the current determinants of company management, requires identification, measurement and presentation of costs incurred and related to the implementation of this concept. Management of the measured and identified costs incurred for the implementation of the concept of sustainable development is necessary due to the search for determinants and measures of evaluation of the implementation of the implemented concept.

*The concept of sustainable development and cost management in company accounts*

Cost management is an immanent element of company management, which serves the search for market advantages. They influence the operational and strategic elements of company management. The measurement, valuation and presentation of economic operations, including costs incurred for environmental activities, are one of the basic

tasks of the accounting system. S. Skrzywan, when defining the notion of accounting, pointed out that accounting is a special type of unitary business records. It is a continuous system at the time of recognition, aggregation, presentation and interpretation of general and specific monetary and balancing figures on the economic activity and financial position of the enterprise (Hendriksen *et al.*, 1992) According to B. Micherda, the main purpose of accounting is to measure the performance of an economic entity that determines the multiplication of capital. Therefore, accounting is a universal and flexible information and control system reflecting the course and results of business operations (Micherda, 2004). The accounting system measures, records and classifies the costs incurred by the economic entity, providing reliable information on the costs incurred for ecological activity. Observation, quantification, valuation, recording and presentation of costs in terms of ecology and accounting system is the reason for dilemmas concerning management. Following the discussed problem, the author of the study posed a research question - are the current legal solutions in the field of identification, classification, valuation and presentation of costs incurred in the sphere of sustainable development a tool supporting the effective management of the company? Regulations of the Polish balance sheet law define the concept of cost as a probable decrease in the reporting period of economic benefits of a reliably defined value, in the form of a decrease in the value of assets, or an increase in the value of liabilities and provisions that will lead to a decrease in equity or an increase in its deficiency. In a manner other than withdrawal of funds by shareholders or owners (Accounting Act, 1994). The regulations of the Polish balance sheet law include an equity definition of cost, which determines the effect of incurred costs and not their essence, especially when information on incurred costs should be a tool for managing an economic entity. Another presentation of costs incurred are the means of production and manpower consumed, expressed in money, which are necessary to obtain a given good, i. e. production or service (Jaruga *et al.*, 2007). Generally speaking, the above definition of cost can be defined as any decrease in the economic unit's resource needed to bring a product (service or good) to the condition, form and place where it can be sold (Kiziukiewicz, 2004). Costs incurred by entities may be classified according to different criteria. Table no. 1 presents selected criteria for the classification of costs.

In the table above, the author has attempted to quantify the costs related to the identification and measurement of costs related to the implementation of the sustainable development concept. The lack of direct levels of allocation of costs incurred for the implementation of the sustainable development strategy is a cognitive gap, which was proposed by the author in the above concept. Costs related to the implementation of the sustainable development concept can be observed in all cost classification criteria. They are cost elements, creating e. g. operating costs (purchase costs, costs of fuel consumption, energy, etc.) or production costs (through the costs of using ecological solutions). They are most precisely identifiable in the costs by type of business units (Table 1). They are classified into:

- Costs of depreciation of environmentally-friendly machinery and equipment immanently linked to sustainable development,
- The costs of materials and energy consumption, from which we can distinguish the costs associated with the implementation of the company's sustainable development strategy,
- Costs of external services as part of the sustainable development strategy,
- Costs of remuneration of persons responsible for the application of sustainable development solutions in the company.

What is more, in the accounting system, the presentation of activities related to sustainable development in the company is significantly expanded, which is related to pro-ecological activities and broadly understood corporate social responsibility. Yenostks of public interest quantify sustainable development activities by presenting them in reports on corporate social responsibility. The Responsible Business Forum quantified the benefits of the corporate responsibility strategy. These are:

- Increased interest of investors - Lenders are more interested in cooperation with responsible companies, which, apart from good financial results, are managed in a transparent manner and build their image and good relations with the environment. For many investors, the financial credibility of a company depends on its social credibility.

Table 1: Classification of costs for accounting purposes (Czubakowska *et al.,* 2008)

| Cost classification criterion | Cost items |
|---|---|
| Type of activity of the company:<br>▪ manufacturing<br>▪ trading<br>▪ service activities | ▪ operating expenses,<br>▪ costs of financial activity,<br>▪ costs related to the construction of fixed assets,<br>▪ costs related to special funds, |
| Sphere of activity (purpose):<br>▪ the sphere of purchase,<br>▪ the sphere of production,<br>▪ the field of sales | ▪ purchase costs,<br>▪ production costs,<br>▪ management costs,<br>▪ selling expenses |
| Economic activity: | ▪ costs of normal operating activities,<br>▪ other operating costs,<br>▪ financial costs |
| Type of costs (type of factors of production used): | ▪ depreciation,<br>▪ consumption of materials and energy,<br>▪ third party services,<br>▪ taxes and charges,<br>▪ wages and salaries,<br>▪ insurance and other benefits, including pensions,<br>▪ other costs by type |
| Places where costs arise: | ▪ costs of basic departments,<br>▪ costs of support departments,<br>▪ management costs,<br>▪ purchase costs,<br>▪ selling expenses |
| Way of relating costs to products (possibility of assigning costs to a calculation unit): | ▪ direct costs,<br>▪ indirect costs |
| Costs of implementing the concept of sustainable development | ▪ costs of social activities<br>▪ costs of ecological activities<br>▪ costs of environmental activities |

- Increasing consumers' and stakeholders' loyalty - Increasing consumers' social awareness causes that in their choices they are also guided by trust in a given company and its image. A growing group of consumers pay attention to the principles of social responsibility in the process of its production and the general reputation of the company.
- Improvement of relations with the community and local authorities
- Participation of the company in the life of the local community, undertaking long-term and measurable social investments, facilitates its efficient and non-conflicting functioning. Social responsibility enables it to become permanently rooted in the community and win the favor of its inhabitants, as well as gaining the trust of local authorities.
- Increased competitiveness - Introducing the principles of responsible business is one of the advantages thanks to which companies gain competitive advantage. For Polish companies, a transparent CSR policy may be one of the ways of building their position on the global markets, where the expectations of meeting the standards of responsible business are more obvious.
- Raising the level of the company's organizational culture - by taking up the challenges of social responsibility, the company raises its standards of conduct towards its stakeholders (employees, contractors, customers) and thus avoids the costs of "bad partnership".

These changes shape the company's organizational

culture based on trust, responsibility and transparency for all concerned.

- Shaping a positive image of the company among employees - Sustainable development is one of the elements of non-financial motivation of employees. Thanks to codes of ethics, social programs, care for the environment, also in the aspect of future generations, the image of the company in the eyes of the employee is improved. Employees are more appreciative of the functioning of the company, seeing that part of its activity is directed at solving social problems that are important to them as well.
- Attracting and retaining the best employees - As the company's image improves and trust among employees increases through the application of a sustainable development strategy, the company's attractiveness on the labour market also increases, which allows it to attract new employees and retain the best ones.

To sum up, it may be assumed that the identification and measurement of costs incurred in connection with the implementation of the sustainable development strategy requires the identification of costs in the accounting system through their identification, valuation and presentation. The outlined measures should allow to assess the degree of implementation of the implemented sustainable development concept on the basis of identified and quantified costs related to the implementation of the strategy. The research problem posed can be expressed by the hypothesis that the identification and measurement of costs incurred on ecological activity enables the assessment of the degree to which the assumptions of the concept of sustainable development in the company have been achieved.

## MATERIALS AND METHODS

In order to achieve the intended research goal, the method of analysis and criticism of literature and the method of descriptive analysis were applied. The method of analysis and criticism of literature was used as the first part of scientific cognition. The essence of the method of analysis and criticism of literature is to indicate the accuracy, novelty and new approach to the indicated aim of the study. Using this research method, the author presented the current achievements of science in the field in question, indicating equally the free research presentation existing in the area under study. The method of analysis and criticism of literature allowed to present the complexity and the essence of the described problem (Coombs *at al.*,2009). The research method used also allows to indicate the timeliness and innovativeness of the approach to the problem in relation to the current state of knowledge in the area under study. The applied research method allowed to signal both the differences, as well as the existing dependencies and important features in previous scientific inquiries. The second method used in the study is a descriptive analysis, which boiled down to a description of the research methodology used in the conducted scientific research. The descriptive function was used as a premise for the characteristics of the applied methodology. The descriptive analysis method was used to characterize the consequences of actions, norms and rigors, which contributed to the formulation of conclusions. Analytical research in management sciences serves to identify the structure and its dependencies. Hence, in the article a descriptive analysis was used to solve the research problem. Application of the descriptive analysis method to achieve the research objective allowed to formulate conclusions from the conducted research. The formulation of conclusions was carried out on the basis of observations, abstraction and generalization of the observed relationships. This method was able to detect both dependencies and gaps in the perception of the problem studied so far. The applied research methods are burdened with a limitation consisting in the lack of empirical verification. However, in the case of the research objective, which is to identify and measure the costs incurred for ecological activities, which makes it possible to assess the degree of implementation of the concept of sustainable development in the enterprise, it should be pointed out that this is an area with a low degree of expansion. Therefore, empirical verification requires time connected with observation, measurement and consequently with the application of proposed solutions by the company. Therefore, at a later stage of the research procedure, the case study method was applied, which allows to present a detailed description of the studied phenomena and relations (Gibbert *et al.*, 2008) however, its important advantage in the research process is to strive for identification, quantification, and consequently to develop the concept of the studied phenomenon and deepened interpretation.

*Characteristics of the tested entity*

The results of the research presented in the article are based on the production company, which is located in Poland and is classified to the sector of medium-sized enterprises. The study covered the years 2015-2018. The company's area of activity covers the whole Poland, as well as Lithuania, Latvia, Russia, Hungary, Czech Republic, Romania and Germany to a large extent. The company employs 94 people in 2018. The company produces a wide range of accessories for window decor such as curtain rails, roller blinds, pleats. In 2004, the company obtained the ISO 9001:2001 certificate, and in 2009 and 2010, by the votes of consumers, it was awarded the Customer's Laurel. In 2009, the organizational and legal form of the enterprise was changed from a general partnership to a limited partnership, which reflected in the organizational structure the scope of duties performed by separate units. The company mainly supplies chain customers, cooperating with many smaller business entities that sell finishing materials as well as provide services in the field of interior design. The company is managed by a management board of which it is a part:

- President of the Management Board with a subordinate administrative department,
- Vice President responsible for sales, marketing and advertising,
- Member of the Management Board for Production, Logistics and Procurement,
- Member of the Management Board for Finance and Administration.

A member of the management board for production, procurement and logistics is responsible for the production and logistics areas. Through his subordinate department managers, the member supervises 74 production workers responsible for the direct production, assembly and packaging of products. The sales, marketing and product management department is made up of 12 people, primarily responsible for servicing sales to customers by preparing orders for execution and their after-sales invoicing. Each employee of this department has a permanently assigned group of customers, with whom they are in constant contact. In addition, the sales department consists of 4 sales representatives who, having the assigned areas of activity in Poland, provide services for stands maintained by customers, familiarizing customers with the current offer of the company. The export department, separated in the structure, is responsible for the sale of products outside the country, all kinds of documentation, international transport configurations and the circulation of customs documents. Marketing department employees prepare leaflets and advertising brochures, work on visualization of stands maintained by contractors and are responsible for updating the company's website. The financial and accounting department, together with the human resources and administration department consists of 8 persons. Employees of the financial and accounting department are responsible for keeping records of business operations carried out in the company, and also perform a control function in relation to persons entrusted with the custody of the company's property. The administration department is responsible for the proper maintenance of the company's assets while ensuring their efficiency

*Range of costs incurred for sustainable development - case study*

The aim of the study is to identify and assess the relationships between the current balance sheet regulations in Poland in the area of costs incurred for the benefit of sustainable development, which are an expression of conscious business responsibility. In the surveyed company, generic costs were distinguished by dividing them analytically into titles characterizing the incurred generic costs and calculation costs characterizing the places where costs arise in the company, based on the criterion of their identification used to improve the management of key areas of the company's operations.

As far as the costs incurred for sustainable development are concerned, the costs characterising the activities undertaken are specified:

- Depreciation of cars - the car park was replaced with vehicles with significantly reduced exhaust emissions,
- Energy consumption has been reduced by using (replacing) lighting with LED lighting,
- Significant reduction of expenditure related to the purchase of fuels,
- In the field of external services, the effectiveness of cooperation with waste disposal service providers has been improved,
- The management of packaging was rationalised by organising the selection of packaging for cardboard

Table 2: The percentage share of selected cost items in the total costs of the enterprise

| | Years | | | |
|---|---|---|---|---|
| Contents | 2015 | 2016 | 2017 | 2018 |
| Share of % of costs incurred for sustainable development | 11,93% | 11,15% | 10,20% | 9,30% |
| Including costs: | | | | |
| - car depreciation, | 0,96% | 0,88% | 0,84% | 0,72% |
| - electric energy usage, | 0,56% | 0,47% | 0,50% | 0,48% |
| - fuel consumption, | 0,98% | 0,82% | 0,86% | 0,94% |
| - waste management costs, | 0,06% | 0,05% | 0,07% | 0,11% |
| - costs of used packaging, | 9,34% | 8,89% | 7,89% | 7,01% |
| - training costs for employees. | 0,03% | 0,04% | 0,05% | 0,06% |

and foil, which is then sold to recycling companies,

- Air-conditioning equipment and ventilation ducts were overhauled in order to reduce energy consumption while increasing their efficiency,
- Funds were spent on education of employees responsible for organizing pro-environmental activities as works immanently connected with the construction of the sustainable development strategy, including activities related to reporting in the examined area.

## RESULTS AND DISCUSSION

The company audited identified general costs, dividing them into costs identified as part of the costs incurred for sustainable development.

According to the presented data, the costs incurred for the benefit of sustainable development are an element of costs by type of enterprise. The author came to the following conclusions:

- the company shows a significant share of the costs of benefits incurred in the construction of a sustainable development strategy, so their identification, recording and observation is an important instrument for managing the company's costs, from 11,93% costs in 2015 to 9,30% of costs in 2018,
- It is worth noting the significant decrease in packaging costs, from 9,34% costs in 2015 to 7,01% of costs in 2018, and costs of electricity consumption, from 0,56% costs in 2015 to 0,48% of costs in 2018 which is the result of applying the sustainable development strategy,
- there are no evidential solutions in the scope of uniform identification of costs incurred for solutions implementing the sustainable development strategy in the company,
- the company bears the burden of waste management as well as information obligations related to the development of a sustainable development strategy, from 0,06% costs in 2015 to 0,11% of costs in 2018,
- the entity incurs expenditure on solutions for building a sustainable development strategy (see Table No. 2),
- There is no solution for the unit to study the costs not incurred in relation to sustainable development expenditure.

## CONCLUSION

The aim of the study was to learn and assess the relationships between the current balance sheet regulations in the area of costs incurred for the benefit of sustainable development, which are an expression of conscious business responsibility. In the light of the considerations presented in the study, it can be answered that balance sheet regulations do not constitute an incentive for a comprehensive observation and recording of behaviours related to the development of a sustainable development strategy in the company. The implication of the conducted research is the concept of identification, measurement and quantification of costs related to the implementation of the sustainable development strategy at the level of the accounting system. This implication is all the more important as the accounting system strives to broaden disclosures in the area of corporate social responsibility, in which sustainable development occupies an important place. The analysis of the balance sheet regulations shows that there is a need for more and more detailed identification of analytical cost items related to activities related to the development of the

sustainable development strategy. This is a result of reporting obligations to the broadly understood environment of the company about the solutions applied in relation to sustainable development, especially in the scope of pro-ecological solutions. The case study was based on the production company, indicating significant elements of costs incurred on the strategy of sustainable development in the structure of costs by type of the company, in order to identify measures used to assess the degree of implementation of the adopted strategy. The presented considerations are important and timely, as the growing role of corporate social responsibility in relation to the broadly understood social environment is visible. Contribution to the management sciences is the concept of identifying and measuring the costs associated with the implementation of the sustainable development strategy, in order to seek market advantages of the company. One of the important areas of creating a competitive advantage may be the implementation of the sustainable development strategy, and the costs incurred on it, identified, quantified and verified, are an expression of effective management of the company

## ACKNOWLEDGEMENT

The author would like to acknowledge University of Technology in Częstochowa for its assistance and supports.

## CONFLICT OF INTEREST

The author declares that there is no conflict of interests regarding the publication of this manuscript. In addition, the ethical issues, including plagiarism, informed consent, misconduct, data fabrication and/or falsification, double publication and/or submission, and redundancy have been completely observed by the authors.

## REFERENCES

Accounting Act, (1994). Accounting Act of 29 september 1994 r. (c.t. Dz. U. z 2018r., poz. 395, with lat. chang.), Article 3, paragraph 1, point 31.

Andersen, T.J., (2004). Integrating Decentralized Strategy Making and Strategic Planning Processes in Dynamic Environments. J. Manage. Stud., 41(8): 1271-1299 **(29 pages).**

Białasiewicz, M.; Czerniachowicz, B., (2008). Współczesne problemy zarządzania przedsiębiorstwem. (in): Podstawy nauki o organizacji. Przedsiębiorstwo jako organizacja gospodarcza. Red. nauk. Marek S. Białasiewicz M. PWE. Warszawa, 301 (**444 pages**).

Chen, C., (2008). Linking the Knowledge Creation Proces to Organizational Theories – a Macro View of Organization – Environment Change. J. Organ. Change Manage., 21(3): 259-279 (**21 pages**).

Childm, J.M., (1972). Organizations and Enviroments. Prentice-Hall. Englewood Cliffs.

Czubakowskam, K.; Gabrusewiczm W.; Nowak E.m (2008). Podstawy rachunkowości zarządczej. PWE. Warszawa, 40 (**352 pages**).

Eisenhardt, K.M.; Furr, N.R.; Bingham, C.B., (2010). Microfoundations of Performance: Balancing Efficiency and Flexibility in Dynamic Environments. Organ. Sci., 21(6): 1263-1273 (**11 pages**).

Gibbert, M.; Ruigrok, W.; Wicki, B., (2008). What passes as a rigorous case study? Strategic Manage. J., 29(13): 1465-1474 **(10 pages).**

Hendriksen, E.A.; Breda M.F., (1992). Accounting Theory. Irwin. Homewood. Boston.

Holm, M.; Kumar, V.; Rohde, C., (2012). Measuring Customer Profitability in Complex Environments: An Interdisciplinary Contingency Framework. J. Acad. Marketing Sci., 40(3): 387-401 (**15 pages**).

Jaruga, A.; Fijałkowska, J.; Jaruga-Baranowska, M.; Frendzel, M., (2007). The Impact of IAS/IFRS on Polish Accounting Regulations and their Practical Implementation in Poland. Accounting in Europe. 4(1): 67-78 (**12 pages**).

Kates, R.W.; Parris, T.M.; Leiserowitz, A.A., (2005). What is sustainable development? Sci. Policy Sustainable Develop., 47(3): 8-21 **(14 pages).**

Kiziukiewicz, T., (2012). Mierniki oceny działalności jednostki gospodarczej. Ekspert. Wrocław, 40-61 **(23 pages**).

Liebl, F.; Schwarz, J.O., (2010). Normality of the Future: Trend Diagnosis for Strategic Foresight. Futures, 42(4): 313-327 (**15 pages**).

McGahan, A.M.; Porter, M.E., (1997). How Much Does Industry Matter, Really? Strategic Manage. J. Special Issue: 18: 15-30 (**16 pages**).

Micherda, B., (2004). Współczesna rachunkowość w kreowaniu wiarygodnego obrazu jednostki gospodarczej. Wydawnictwo Akademii Ekonomicznej w Krakowie. Kraków., 19 (**245 pages**).

North, K.; Kumta, G.; (2018). Knowledge Management. Knowledge Management: Value creation through organizational learning. Second Edition. Springer, 28-39 (**12 pages**).

Park, N.K.; Mezias, J.M., (2005). Before and After the Technology Sector Crash: The Effect of Environmental Munificence on Stock Market Response to Alliance of E-Commerce Firms. Strategic Manage. J, 26(11): 987-1007 (**21 pages**).

**AUTHOR (S) BIOSKETCHES**

**Stępień M.,** Dr., Head of the Accounting Department, Częstochowa University of Technology, Faculty of Management, Poland.
Email: *marcin.stepien@wz.pcz.pl*

**COPYRIGHTS**

Copyright for this article is retained by the author(s), with publication rights granted to the GJESM Journal. This is an open-access article distributed under the terms and conditions of the Creative Commons Attribution License (http://creativecommons.org/licenses/by/4.0/).

**HOW TO CITE THIS ARTICLE**

*Stępień, M., (2019). Sustainability as a determinant of cost management in the accounts of a manufacturing Industry. Global. J. Environ. Sci. Manage., 5(SI): 151-159.*

**DOI:** 10.22034/gjesm.2019.SI.17

**url:** https://www.gjesm.net/article_35472.html