

## **Current Controlling Challenges in Small and Medium-sized Companies on the Specific Example of Falling Profits and Accurate Sales Planning in a Family Business**

*Moser, Martin A.*<sup>1</sup>

**ABSTRACT:** The globalization of the markets is not only a challenge for large companies. Small and medium-sized companies are also becoming more involved in new markets more than assumed and statistically recorded. They are required to position themselves more strongly on foreign markets due to increased competitive pressure, insufficient potential on the domestic market and narrower fields of market activity. Small and medium-sized companies are only exposed to minimal obligations under commercial law. This is due to their size, the organizational form and the lack of reference to the capital market. Since the annual balance sheet is often created with the aim of tax directives, there is only limited adequate reflection on the business profitability of the organization. A detailed internal cost accounting only exists in exceptional cases and cost monitoring is only carried out on the basis of historical data and not on a planned cost basis. This paper deals with a concrete practical question from the topic of controlling and the analysis of an existing company based on the organization's financial documents. On the basis of the results and statements available, the objective of this paper is to develop recommendations for action for the supervisory board and then to discuss and evaluate them accordingly.

**KEYWORDS:** Budget planning, Controlling, Small and Medium-sized Businesses (SME)

**JEL CODES:** F60, F63, F65

### **Introduction and objectives**

In view of the current far-reaching changes, controlling is confronted with a multitude of challenges. These developments not only change the role of the controller significantly, but also have a major impact on small and medium-sized enterprises (SMEs) and family businesses, which are of central importance for economic development. The effects of digitization

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<sup>1</sup> Moser, Martin A. PhD student, University of Sopron, Alexandre Lamfalussy Faculty of Economics, Széchenyi István Doctoral School  
([martin.arnold.moser@phd.uni-sopron.hu](mailto:martin.arnold.moser@phd.uni-sopron.hu))

on controlling not only change the range of tasks and the competence profile of the controller. The increased use of business intelligence leads to serious redesigns, for example in cost management or in the use of ERP (Enterprise Resource Planning) systems (Feldbauer-Durstmüller–Mayr, 2019, p. 1).

The globalization of the markets is not only a challenge for large companies. Small and medium-sized companies are also becoming more involved in new markets more than assumed and statistically recorded. They are required to position themselves more strongly on foreign markets due to increased competitive pressure, insufficient potential on the domestic market and narrower fields of market activity (Behringer, 2018, pp. 3-5). The professionalization of a controlling toolkit in family businesses is primarily opposed to the goal of maintaining long-term control of the owner family, although controlling can make a decisive contribution to the continued existence of the company across generations. Controlling is an important factor for a successful turnaround, especially during corporate crises as described and analyzed in this paper (Feldbauer-Durstmüller–Mayr, 2019, p. 5).

Small and medium-sized companies are only exposed to minimal obligations under commercial law. This is due to their size, the organizational form and the lack of reference to the capital market. Since the annual balance sheet is often created with the aim of tax directives, there is only limited adequate reflection on the business profitability of the organization. A detailed internal cost accounting only exists in exceptional cases and cost monitoring is only carried out on the basis of historical data and not on a planned cost basis (Ihlau–Duscha, 2019, pp. 8-10).

On the methodical basis of a case study and the elaboration of future scenarios, this paper deals with a concrete practical question and example from the topic of controlling. Based on the results and statements available and described in the “practical background” chapter, the objectives of this paper are to analyze the exemplary company and develop recommendations for action for the supervisory board and then to discuss and evaluate them accordingly in the “conclusions” chapter. This serves to show, using the example of the respective company, how such and similar controlling challenges can be approached in order to solve them accordingly.

## Practical background

This paper deals with a concrete practical question from the topic of controlling. Small, autonomous snow clearing vehicles and mowing tractors in modular design are manufactured by a family company in the legal form of a Ltd. (GmbH). The products are available in a total of five different versions. The sales for 2016, as well as the list price and the number of units sold for the individual products in this year can be seen in table 1.

*Table 1: Turnover 2016*

	List price	Number of items sold 2016	Of which for winter operation	Surcharge for winter operation	Turnover 2016
Trac SW01	€ 4,990.00	115	105	€ 350.00	€ 610,600.00
Trac SW02	€ 4,390.00	95	95	€ 320.00	€ 447,450.00
Trac SW03	€ 3,890.00	150	115	€ 290.00	€ 616,850.00
Trac SW04	€ 3,590.00	160	45	€ 290.00	€ 587,450.00
Trac SW05	€ 2,990.00	210	0	€ 290.00	€ 627,900.00
					<b>€ 2,890,250.00</b>

Source: Author's table

The management recognizes the falling profits of the company and looks for an appropriate solution. The management thinks that it can find the solution in foreign business in Scandinavian countries (Norway, Sweden and Denmark), where the need for smaller vehicles for snow removal is very high. For this reason, marketing began on a trial basis in 2017. However, in order to be able to guarantee the readiness for delivery, a storage room had to be leased. Furthermore, separate commissions had to be paid for agents based in Scandinavia. Due to the need for pre-production, the use of materials was also higher.

Careful sales planning was carried out for 2018 (see *table 2*). As a result of the interest in buying, assuming readiness to deliver and product quality is given, an annual average growth of around 10% is expected over the next three years. To do this, however, a suitable, improved sales organization must be established. No growth is expected in the domestic market, which is why it is viewed as largely saturated. Rather, it is already good if the numbers can be maintained.

Table 2: Sales planning 2018

	List price	Number of items sold 2016	Of which for winter operation	Surcharge for winter operation	Turnover 2016
Trac SW01	€ 5,490.00	35	35	€ 390.00	€ 205,800.00
Trac SW02	€ 5,190.00	30	30	€ 360.00	€ 166,500.00
Trac SW03	€ 4,890.00	38	38	€ 310.00	€ 197,600.00
Trac SW04	€ 4,290.00	20	20	€ 290.00	€ 91,600.00
Trac SW05	€ 2,990.00	0	0	€ 290.00	-
					<b>€ 661,500.00</b>

Source: Author's table

As it can be seen in *table 2* for the planned sales for 2018, higher prices can be achieved in Scandinavia. In addition, the income statements for the last three years (2015 to 2017) shown in *table 3*, as well as the plan and the half-year results for the current financial year (2018) are available.

Table 3: Profit and loss accounts for 2015 to 2017

Account	Description	Var.	Actual 2015	Actual 2016	Actual 2017	Budget 2018	Actual 1 <sup>st</sup> half 2018
4000	Sales	100%	€ 2,510,900.00	€ 2,890,250.00	€ 3,125,000.00	€ 3,551,750.00	€ 2,015,600.00
4100	Sales deductions (commissions)	100%	€ 250,000.00	€ 315,000.00	€ 850,000.00	€ 700,000.00	€ 336,000.00
-	<b>Operating performance</b>	-	<b>€ 2,260,900.00</b>	<b>€ 2,575,250.00</b>	<b>€ 2,275,000.00</b>	<b>€ 2,851,750.00</b>	<b>€ 1,679,600.00</b>
5000	Use of materials	100%	€ 954,142.00	€ 1,098,295.00	€ 1,187,500.00	€ 1,295,600.00	€ 608,932.00
5100	Total auxiliary and operating materials	100%	€ 213,426.50	€ 245,671.25	€ 265,625.00	€ 285,100.00	€ 133,997.00
-	<b>Gross profit</b>	-	<b>€ 1,093,331.50</b>	<b>€ 1,231,283.75</b>	<b>€ 821,875.00</b>	<b>€ 1,271,050.00</b>	<b>€ 936,671.00</b>
6000	Wages and non-wage costs	80%	€ 652,834.00	€ 751,465.00	€ 812,500.00	€ 856,500.00	€ 393,990.00
6200	Salaries and ancillary salaries	0%	€ 251,090.00	€ 289,025.00	€ 312,500.00	€ 315,000.00	€ 156,000.00
-	<b>Contribution margin I</b>	-	<b>€ 189,407.50</b>	<b>€ 190,793.75</b>	<b>- € 303,125.00</b>	<b>€ 99,550.00</b>	<b>€ 386,681.00</b>
7010	Depreciation	0%	€ 31,250.00	€ 31,250.00	€ 31,250.00	€ 35,000.00	-
7750	Legal and advisory expenses	50%	€ 6,000.00	€ 6,500.00	€ 12,000.00	€ 15,000.00	€ 5,400.00
7380	Telephone / mail	80%	€ 10,000.00	€ 9,000.00	€ 9,500.00	€ 9,000.00	€ 4,650.00
7700	Insurance	0%	€ 32,500.00	€ 32,500.00	€ 32,500.00	€ 34,000.00	-
7400	Rent / lease	0%	€ 32,000.00	€ 35,000.00	€ 61,200.00	€ 60,000.00	-
7700	Marketing	100%	€ 25,000.00	€ 25,000.00	€ 50,000.00	€ 60,000.00	€ 32,000.00
7200	Maintenance	95%	€ 22,000.00	€ 23,500.00	€ 22,400.00	€ 40,000.00	€ 21,000.00
7300	Outbound freight	85%	€ 45,000.00	€ 48,000.00	€ 56,000.00	€ 60,000.00	€ 26,500.00
7600	Other effort	95%	€ 25,000.00	€ 24,000.00	€ 24,500.00	€ 22,000.00	€ 12,000.00
-	<b>Profit of common business operation</b>	-	<b>- € 39,342.50</b>	<b>- € 43,956.25</b>	<b>- € 602,475.00</b>	<b>- € 235,450.00</b>	<b>€ 285,131.00</b>

Source: Author's table

The task describes the inclusion of a new controller in the company. This was set up as a staff unit for the management. So far, the topic of controlling has not had a high priority in the family business. Up until now, the management had hardly any documents or figures on the course of business that had to be provided by the accounting department. The decision to serve the Scandinavian market was made by the CEO before the new controller joined the company. The operating result deteriorated enormously in 2017, so that the Supervisory Board decided to examine this accordingly. The plan for 2018 has already been drawn up by the management in cooperation with the new controller. The expected values can be endorsed by the local representatives.

Based on the results and statements available, the objective of this paper is to develop recommendations for action for the supervisory board and then to discuss and evaluate them accordingly. Furthermore it describes how this task is processed according to scientific criteria and which ways to solve the problem the controller will present to the supervisory board together with the management and which difficulties the family business will likely have to overcome.

## **Theoretical background**

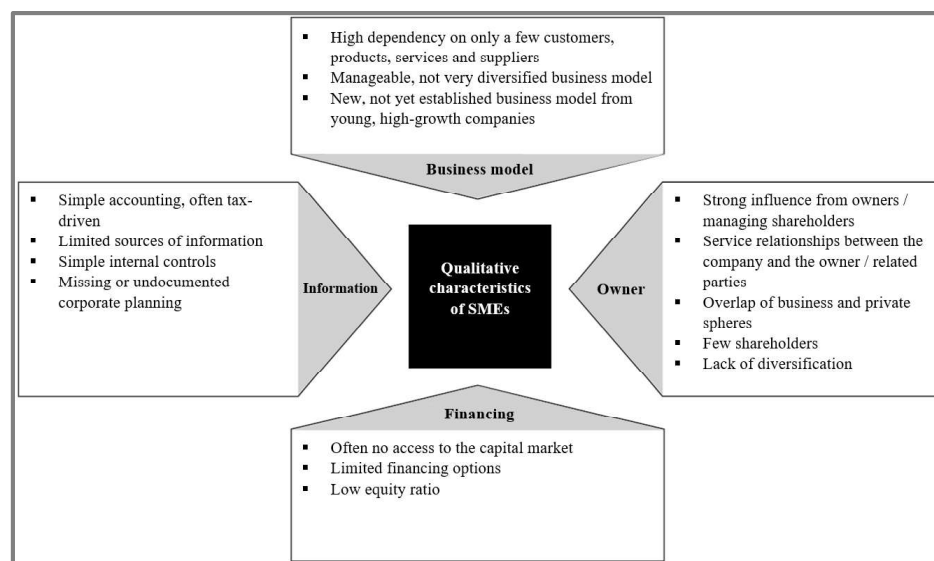
### ***Definition of terms and company description***

The task describes a family company in the organizational form of a Ltd. (GmbH), in which the controlling has not been given great importance and so far only a few figures on the course of business of the management are available. The following definitions and recommendations serve to integrate the company with regard to the subsequent consideration of the other relevant aspects and special features.

According to the Austrian Chamber of Commerce (WKO) and the recommendation of the EU Commission, micro-enterprises are companies with up to 9 employees or a turnover of up to 2 million euros per year. Small companies, on the other hand, have a number of employees of up to 49 or an annual turnover of up to 10 million euros as criteria. Medium-sized companies are companies with up to 249 employees or an annual turnover of up to 50 million euros. From 250 employees or an annual tur-

nover in excess of 50 million euros, one speaks of so-called large companies (Source: <https://www.wko.at/service/zahlen-daten-fotos/KMU-definition.html/> [retrieved on: 05/08/2020]).

In the following, the qualitative aspects of SMEs (small and medium-sized enterprises) are described, which reflect the deviations from large companies. A differentiation through the organizational form or the ownership structure is not suitable. However, the qualitative characteristics shown in figure 1 influence the value and are relevant to the assessment. There is a relationship of dependency between buyers and suppliers, and changes in buying interests and competitors have a major impact on the development of the organization. SMEs are exposed to a large operational business risk (Ihlau–Barth, 2016, pp. 1068-1069).



*Figure 1: Qualitative characteristics of SMEs*

*Source: Ihlau-Duscha, 2019, p. 5*

Small and medium-sized companies are only exposed to minimal obligations under commercial law. This is due to their size, the organizational form and the lack of reference to the capital market. Since the annual balance sheet is often created with the aim of tax directives, there is only limited adequate reflection on the business profitability of the organization (Küting–Weber, 2015, p. 226). A detailed internal cost accounting

only exists in exceptional cases and cost monitoring is only carried out on the basis of historical data and not on a planned cost basis. Furthermore, there is no planning system as well as partial and overall plans or they are implemented and documented with gaps (Zieger–Schütte–Biastoch, 2008, p. 592). Data on the intended development of the company is only available to a limited extent (Ihlau–Duscha, 2019, p. 7).

Tractor Mower Ltd. (fictitious name) is an independent family company founded in 1926 and is one of the most renowned commercial enterprises in Austria. As a quality company, it is a leading manufacturer of self-propelled snow clearing vehicles and mowing tractors. It stands for pronounced customer orientation, versatility and high quality requirements. As a reliable partner, it convinces its customers with experience, in-depth specialist knowledge, high quality in all areas and the ability to react quickly to individual requirements. Based on the existing sales figures, the company is assigned to the “small business” category. It was assumed that the number of employees is less than 50.

### ***Importance of controlling in SMEs***

The globalization of the markets is not only a challenge for large companies. Small and medium-sized companies are also becoming more involved in new markets, as in the present case in the Scandinavian region, more than assumed and statistically recorded. They are required to position themselves more strongly on foreign markets due to increased competitive pressure, insufficient potential on the domestic market (as the stagnating or deteriorating earnings from the business figures for 2015 and 2016 show) and narrower fields of market activity (Feldmeier et al., 2015, p. 5). Small industrial companies, like Tractor Mower Ltd., are forced to constantly adapt to new requirements due to global production chains, short delivery times and growing market dynamics. The measurability of production and logistics is confronted with new challenges through a process-oriented alignment of the supply chain (Gottmann, 2019, p. V).

Controlling describes a concept of control that includes various functions, with the main task of success-oriented coordination of preparation and review as well as the supply of information (Horsch, 2015, p. 20). Controlling must be a fixed element of any management, regardless of the industry and size of the company (Erk, 2018, p. VIII). The study of information for planning organizational decisions is insufficiently carried out in small businesses. This is also the case with Tractor Mower Ltd.. As mentioned in the previous chapter on the definition of terms and company

description, the focus is on the quality of the service provision. 20 to 30 years ago this was not a problem, because the company was located in a sellers' market in which there was a significantly higher demand compared to the existing offers. The increasing market saturation led to a change from sellers' markets to buyers' markets and was a driver of modern globalization (Zirkler et al., 2019, p. V).

Nowadays, controlling is absolutely necessary in a buyer's market, as customers can choose between different producers and profit margins fall as a result (Schmid-Gundram, 2020, pp. 1-2). From an economic point of view, Tractor Mower Ltd. can only be profitable, if the figures are known, the costs are under control and business plans are based on economic facts (Reichmann et al., 2017, p. 19). Until recently, this was only partially the case, as a controller was only accepted as a staff position for the management in 2017 and the management was only given very little information about the course of business. In small companies, the controller function is often performed by the management itself. In the case of medium-sized organizations and large companies, on the other hand, controlling is carried out by their own offices or departments (Horsch, 2015, p. 21). SMEs often completely avoid conventional controlling due to the sometimes complex data basis from bookkeeping, accounting and time records (Erk, 2018, p. VII).

Controlling at Tractor Mower Ltd. must provide facts and predictions that enable the managing director or supervisory board to react to company-specific developments and requirements, such as expansion into Scandinavian countries or stagnating or increasingly poor results and as a result to be able to ensure an effective and sustained development of the organization. The controller must focus on the day-to-day operations on the one hand and the strategic management of the company on the other hand and know the validity for internal decision-makers and external interest groups (Horváth et al., 2015, p. 58). The controller must contribute to ensuring the rationality of the management task by providing quantitative and management-relevant information (Taschner, 2013, p. 30).

Tractor Mower Ltd. can only be managed successfully again in the long term through secure and justified and not through indiscriminate decisions by the management. The management must ensure a meaningful and informative controlling system in the company, develop appropriate studies from it and use it as a basis for strategic decisions (Reichmann, 1997, p. 13). The decision to include a controller in the company was already the first step in this direction. A comprehensive, system-supported



management information system is not (yet) required in this specific example.

The managing director and the newly hired controller have to look through the current company situation and the falling results of normal business activities from 2015 to 2017 in order to be able to initiate essential strategic steps, which are described in the practical second part of this scientific work. A forecast or a plan for the next 12 months, i.e. the year 2018, has already been submitted. The 2018 plan is used to be able to make short- and medium-term choices (e.g. investment or personnel decisions). Another task is the expectation for the next three financial years (multi-year planning), which was also worked out in the practical part and controls the long-term strategic direction of Tractor Mower Ltd. Controlling is therefore a prerequisite for the strategic management of the company, which, on the other hand, is the basis for the efficient and effective development of the company (Preissler, 2014, p. 2).

In addition to the general need for strategic management of Tractor Mower Ltd., an exclusive focus on the direct provision of services by the organization is not sufficient. Increased competition in the manufacture and sale of self-propelled snow clearing vehicles and mowing tractors, as well as high personnel and material costs, especially in the domestic market compared to the Scandinavian market, lead to reduced income and require a comprehensive economic focus in all areas. Operational controlling must enable the management to understand the structure of the costs in their area of responsibility, to determine the respective cost drivers and to identify increases in costs as early as possible. This is used to initiate essential cost saving measures (Zirkler et al., 2019, p. 24). Furthermore, the effectiveness of the service provision must be continuously assessed in order to be able to manage employees and organize the company's resources. In addition, the operational success of the organization (e.g. customer satisfaction, adherence to deadlines, etc.) must be assessed in order to be able to predict the subsequent success of the company caused by its own performance and to be able to define and introduce appropriate alternatives early enough. The management of Tractor Mower Ltd. must be familiar with the sizes required by the business through a suitable reporting system and disseminate and communicate them accordingly as operational goals. In this way, the economic impact can be assessed and active participation in the success of the company can be ensured (Schmid-Gundram, 2020, pp. 4-5).

***Requirements for controlling in SMEs***

The controller of Tractor Mower Ltd. has the task of providing information that enables the managing director and the supervisory board to make sensible decisions for a productive and effective development of the organization. It is therefore an essential goal of controlling to pass on knowledge about the organization and thereby provide a corresponding basis for strategic decisions.

The main tasks of controlling in the present case are therefore the processing of current data and documents from the accounting department so that they can be recorded quickly and easily, as well as a comparison, in particular with regard to the previous years (2015 to 2017) and the planning for 2018 so that development processes and trends can be identified (Goodman, 1975, pp. 17-20). Another task is the assessment of the future development of the company by means of a corresponding forecast, as well as the planning for the coming financial years, so that probable possibilities and dangers in strategic decisions can be considered and evaluated. This results in different requirements, such as transparency, detailing, availability, visualization, accuracy and a corresponding future orientation of the data (Fiedler, 2016, pp. 8-12).

The resource information is not required in a homogeneous form, but has to be adapted to each user and his or her individual information needs (Taschner, 2013, p. 29). An essential prerequisite is the regular revision of all data with the least possible time delay between their occurrence and the subsequent mapping by the controller. In principle, for small businesses such as Tractor Mower Ltd., a monthly revision as part of the preparation of the monthly financial statements is appropriate. In this specific example, however, the requirement must also apply to have the controlling evaluations as quickly as possible after the end of the month in order to receive at least a partial update during the month if necessary (Schmid-Gundram, 2020, p. 8).

Apart from the continuous, fast and, at best, daily provision of the controlling system, transparency and accuracy of the same also play an essential role. In this context, “transparency” means that the origin of the information must be understandable at all times and the extent of the key figures must be clearly identifiable (Nahrstedt, 2019, pp. 73-74).

The future-oriented orientation is another essential requirement of the controller. The focus must be on further business development. This is done by means of a planning calculation, which is indispensable for every

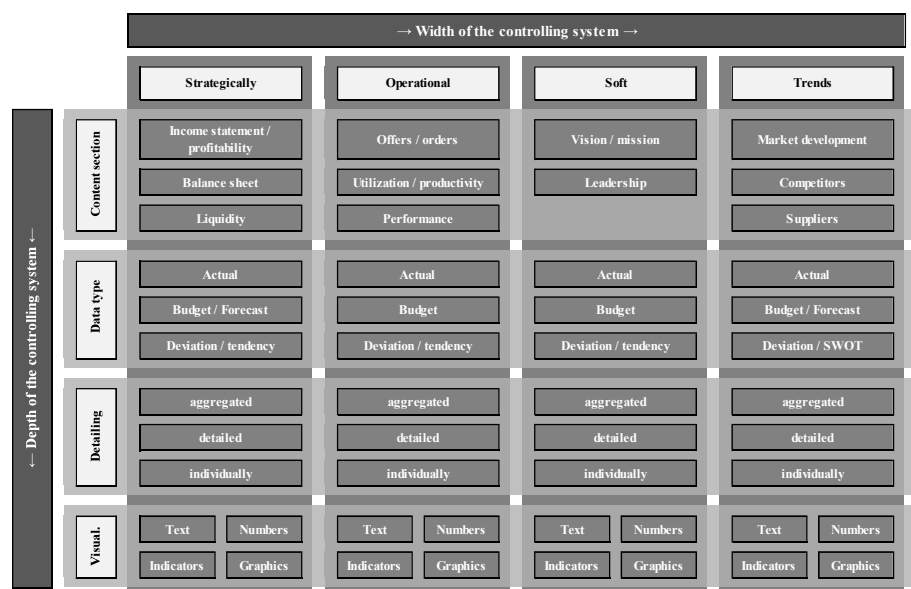
controlling, which is done by extrapolation and the constant forecast, i.e. a review of the planning calculation on the basis of the specific company development during the given planning period (Langmann, 2019, pp. 20-21).

The option of detailing certain data from the controlling system is another requirement of the controller, because understanding and analyzing figures and business developments are central tasks of controlling. However, this can only be achieved if the relevant details are assessed and, consequently, the triggers and conditions for the emergence of different values can be examined (Schmid-Gundram, 2020, p. 11).

### ***Controlling systems in SMEs***

A controlling system based on Microsoft Excel is sufficient for Tractor Mower Ltd. The scope of the controlling system is determined by the controller in relation to the size of the organization (< 50 employees), the industry (production and sale of small self-propelled snow clearing vehicles and modular mower tractors in five different variants) and the current company situation (expansion into Scandinavian countries). The dimension of the controlling system is selected in terms of depth or breadth of the information.

*Figure 2* makes it clear that the depth of information determines the extent to which the requirements for the controller can be met. The breadth of the information, on the other hand, determines how coordinated the system is and consequently does justice to its forward-looking and operational character (Schmid-Gundram, 2020, p. 13).



**Figure 2: Scope of controlling systems**

Source: Schmid-Gundram, 2020, p. 14

The representation of pure business figures as the scope of the controlling system is not sufficient regardless of the size of the company. Every company must at least implement a simplified controlling system with planning calculations and deviation analysis. For small businesses, a minimum amount of information is sufficient (selected base values and key figures including budget figures and monthly variance analysis) and information breadth (income statement, balance sheet, liquidity, data on offers or orders, information on productivity and capacity utilization, market development, etc.). The reporting system must be kept brief and clear (Schmid-Gundram, 2020, pp. 14-15).

For small companies like Tractor Mower Ltd., the usually necessary dimension of a controlling system increases. This is visualized in *figure 3*.

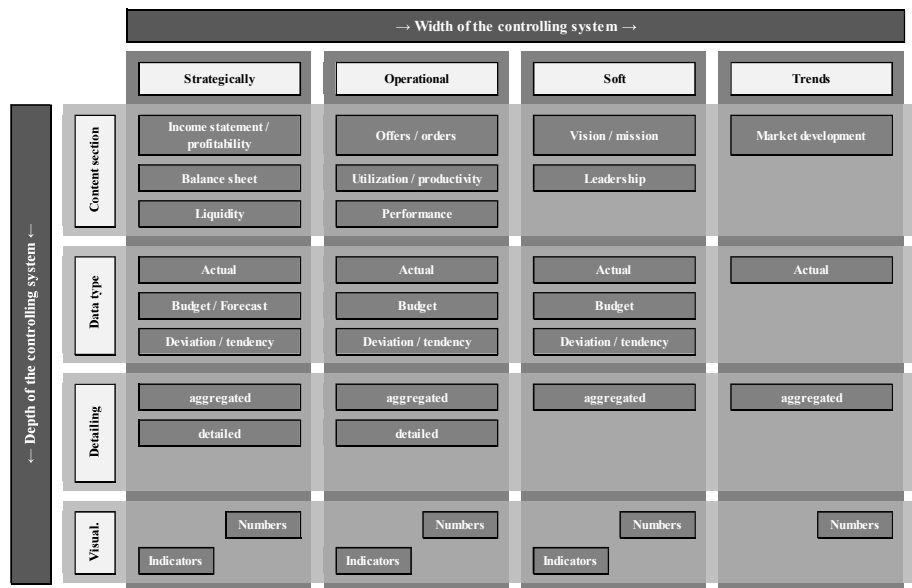


Figure 3: Scope of a controlling system for small businesses

Source: Schmid-Gundram, 2020, p. 16

The reporting system contains an overview of the most relevant data, trends and further developments with different types of presentation and is expanded accordingly by means of detailed studies in terms of productivity, results and solvency (Nagl, 2018, p. 122). In addition to what is already necessary for small organizations, medium-sized companies must also observe the requirements for accuracy, presentation and orientation towards the future (Schmid-Gundram, 2020, p. 16).

The main task of reporting is to depict the available data clearly and in different variants and to offer refinements, such as a concentrated illustration as a balanced scorecard (BSC) as well as detailed reports on differences and trends (Nagl, 2018, p. 48).

In the manufacturing industry in which Tractor Mower Ltd. is located, key figures for production and organizational processes must be given exceptional attention in the controlling system. This includes, for example, the acquisition and evaluation of machine data. In a manufacturing organization, certain tactical values and key figures, operational data with a focus on sales and production, soft influences (e.g. fluctuation, management of employees) and tendencies are equally relevant and must

therefore also be mapped with the same contributions in reporting (Schmid-Gundram, 2020, p. 19).

The prevailing organizational situation also sets standards for the extent and focus of the controlling system. In this specific case, the company is expanding into Scandinavia. The focus of growth is, for example, on investments, on the one hand in additional employees and on the other hand in machines. Therefore, in this case, exact control of costs and detailed planning are equally relevant. In addition, the focus must also be on a targeted view of the operational data and parameters, so that the availability of resources and consequently the ability to deliver as well as customer satisfaction can be ensured. If the result is temporarily insufficient and acceptable or if there is no increase, as was largely the case at Tractor Mower Ltd. in the years 2015 to 2017, additional focal points can be defined in the reporting at any time. In any case, the controlling system has to be adapted in a crisis, which in the present case was done by adding a controller to the company, since there was no controlling system before. The focus must be on the tactical and operational reasons for the crisis situation (Behringer, 2018, pp. 14-15).

In contrast to the size of the organization, the economic sector and the situation, the users are not assigned any significant importance with regard to the extent and orientation of the controlling system. This is only relevant with regard to the adjustment or the focus of the reporting. A user-specific adaptation of the reporting system is, however, absolutely necessary in order to take into account and cover the various statements for the respective users or their requirements. For executives and the management, the essence of the reporting system must be an overview of around one sheet, which combines various forms of presentation and visually does justice to the balance of the controlling system and its information features. In addition to a general overview, the reporting system must contain detailed reports based on the respective focus. The report for the advisory board or the shareholders must be created as running text with the inclusion of certain selected key figures and images. This enables explanations and interpretations regarding the focus of the report (Funk–Rossmann, 2017, pp. 282-283).

### ***Controlling instruments in SMEs***

The use of the instruments and tools of controlling is interrelated to the extent of the controlling system. Direct figures from the organization as well as key figures derived therefrom serve exclusively as a basis for the

controlling system. A minimum of depth of information is only generated using plan values or a corresponding planning calculation and deviation analysis. If this is missing, current data and indicators are not suitable for strategic and operational management of the organization (Schmid-Gundram, 2020, p. 25).

A large number of small and medium-sized companies believe that it is sufficient to check the company figures once a month. Often the data has been generated by tax consultants and primarily contains information on the productivity of the company. In the ideal case, however, this means that only information can be given on whether the company has made profits or losses in the current financial year. However, this is not enough for a very small company either. Often only data from accounting or bookkeeping are available as current key figures for the organization. It must be ensured that in addition to a monthly profit and loss account, a balance sheet is also available. The data from inventory and success accounts alone are not sufficient information for the controlling system. They must be expanded or supplemented by means of current liquidity figures, operational figures, information on soft aspects and external figures and forecasts (Funk–Rossmann, 2017, pp. 285-293).

The most important tool of the controller and the basis of the controlling system, in addition to the availability of current business data as an information basis, is the definition of so-called target values. Without this as a comparative value, no analysis of the deviations with regard to the expected development of the business and consequently no evaluation of the success can be carried out (Schmidt, 2016, pp. 27-28).

The planning calculation is an annual survey of the planned figures for the coming financial year as well as in the course of the so-called multi-year plan for another three years. The figures for the past financial year, which are adapted on the basis of operational expectations and the strategic target, serve as the basis for planning (Becker–Ulrich, 2016, p. 542).

The forecast is a planning update during the year based on the use of current company figures for the planning year and a corresponding update of the planning figures. The initial plan is adapted to the knowledge about the expectation of the business and the tactical objectives in the current financial year that has been added since the creation of this plan (Arnold et al., 2020, p. 31).

A deviation analysis enables essential insights for strategic and operational decisions for the effective and sustainable development of the organization. For this reason, it is an essential tool of the controller and has the task of checking and assessing the effect of current company figures, determining the causes of differences, developing suitable contrast programs and consequently providing a basis for company decisions (Nyhuis–Wiendahl, 2003, p. 180).

### **Practical implementation**

#### ***Adapted income statement for 2018***

As a first step in working through the practical example explained in the introductory chapter, the existing income statement for the first half of 2018 was adapted accordingly in *table 4* and supplemented with the missing items for which corresponding assumptions have been made.

For the position of depreciation (account 7010), insurance (account 7700) and rent / lease (account 7400), half of the budgeted value for 2018 was assumed for the 1<sup>st</sup> half of 2018.



Table 4: Adapted income statement 2018

Account	Description	Var.	Budget 2018	Actual 1 <sup>st</sup> half 2018	Actual 1 <sup>st</sup> half 2018 (adapted)
4000	Sales	100%	€ 3,551,750.00	€ 2,015,600.00	€ 2,015,600.00
4100	Sales deductions (commissions)	100%	€ 700,000.00	€ 336,000.00	€ 336,000.00
-	<b>Operating performance</b>	-	<b>€ 2,851,750.00</b>	<b>€ 1,679,600.00</b>	<b>€ 1,679,600.00</b>
5000	Use of materials	100%	€ 1,295,600.00	€ 608,932.00	€ 608,932.00
5100	Total auxiliary and operating materials	100%	€ 285,100.00	€ 133,997.00	€ 133,997.00
-	<b>Gross profit</b>	-	<b>€ 1,271,050.00</b>	<b>€ 936,671.00</b>	<b>€ 936,671.00</b>
6000	Wages and non-wage costs	80%	€ 856,500.00	€ 393,990.00	€ 393,990.00
6200	Salaries and ancillary salaries	0%	€ 315,000.00	€ 156,000.00	€ 156,000.00
-	<b>Contribution margin I</b>	-	<b>€ 99,550.00</b>	<b>€ 386,681.00</b>	<b>€ 386,681.00</b>
7010	Depreciation	0%	€ 35,000.00	-	€ 17,500.00
7750	Legal and advisory expenses	50%	€ 15,000.00	€ 5,400.00	€ 5,400.00
7380	Telephone / mail	80%	€ 9,000.00	€ 4,650.00	€ 4,650.00
7700	Insurance	0%	€ 34,000.00	-	€ 17,000.00
7400	Rent / lease	0%	€ 60,000.00	-	€ 30,000.00
7700	Marketing	100%	€ 60,000.00	€ 32,000.00	€ 32,000.00
7200	Maintenance	95%	€ 40,000.00	€ 21,000.00	€ 21,000.00
7300	Outbound freight	85%	€ 60,000.00	€ 26,500.00	€ 26,500.00
7600	Other effort	95%	€ 22,000.00	€ 12,000.00	€ 12,000.00
-	<b>Profit of common business operation</b>	-	<b>- € 235,450.00</b>	<b>€ 285,131.00</b>	<b>€ 220,631.00</b>

Source: Author's table

In the next step, the first half of 2018 was calculated back to the “old” business model (domestic market) on the basis of the 2016 profit and loss account, which represents the last year before the start of exports to Scandinavian countries. As a result, the first half of 2018 was divided into the original business in the domestic market and the export business in Scandinavian countries. This division can be seen in *table 5*.

**Table 5: Separation between domestic market and Scandinavia**

Account	Description	Var.	Actual 2016	1 <sup>st</sup> half 2018 (domestic market)	1 <sup>st</sup> half 2018 (Scandinavia)
4000	Sales	100%	€ 2,890,250.00	€ 1,445,125.00	€ 570,475.00
4100	Sales deductions (commissions)	100%	€ 315,000.00	€ 157,500.00	€ 178,500.00
-	<b>Operating performance</b>	-	<b>€ 2,575,250.00</b>	<b>€ 1,287,625.00</b>	<b>€ 391,975.00</b>
5000	Use of materials	100%	€ 1,098,295.00	€ 549,147.50	€ 59,784.50
5100	Total auxiliary and operating materials	100%	€ 245,671.25	€ 122,835.63	€ 11,161.38
-	<b>Gross profit</b>	-	<b>€ 1,231,283.75</b>	<b>€ 615,641.88</b>	<b>€ 321,029.13</b>
6000	Wages and non-wage costs	80%	€ 751,465.00	€ 375,732.50	€ 18,257.50
6200	Salaries and ancillary salaries	0%	€ 289,025.00	€ 144,512.50	€ 11,487.50
-	<b>Contribution margin I</b>	-	<b>€ 190,793.75</b>	<b>€ 95,396.88</b>	<b>€ 291,284.13</b>
7010	Depreciation	0%	€ 31,250.00	€ 15,625.00	€ 1,875.00
7750	Legal and advisory expenses	50%	€ 6,500.00	€ 3,250.00	€ 2,150.00
7380	Telephone / mail	80%	€ 9,000.00	€ 4,500.00	€ 150.00
7700	Insurance	0%	€ 32,500.00	€ 16,250.00	€ 750.00
7400	Rent / lease	0%	€ 35,000.00	€ 17,500.00	€ 12,500.00
7700	Marketing	100%	€ 25,000.00	€ 12,500.00	€ 19,500.00
7200	Maintenance	95%	€ 23,500.00	€ 11,750.00	€ 9,250.00
7300	Outbound freight	85%	€ 48,000.00	€ 24,000.00	€ 2,500.00
7600	Other effort	95%	€ 24,000.00	€ 12,000.00	€ 0.00
-	<b>Profit of common business operation</b>	-	<b>- € 43,956.25</b>	<b>- € 21,978.13</b>	<b>€ 242,609.13</b>

Source: Author's table

### **Assessment of the 2018 budget**

To assess the budget, the deviation for further assessment was calculated from the plan for 2018 and the adapted first half of 2018 (or the forecast for the whole year 2018) and visualized in *table 6*.

Table 6: Assessment of the budget 2018

Account	Description	Var.	Budget 2018	Actual 1 <sup>st</sup> half 2018 (adapted)	Forecast 2018	Difference Δ
4000	Sales	100%	€ 3,551,750.00	€ 2,015,600.00	€ 4,031,200.00	€ 479,450.00
4100	Sales deductions (commissions)	100%	€ 700,000.00	€ 336,000.00	€ 672,000.00	- € 28,000.00
-	<b>Operating performance</b>	-	<b>€ 2,851,750.00</b>	<b>€ 1,679,600.00</b>	<b>€ 3,359,200.00</b>	<b>€ 507,450.00</b>
5000	Use of materials	100%	€ 1,295,600.00	€ 608,932.00	€ 1,217,864.00	- € 77,736.00
5100	Total auxiliary and operating materials	100%	€ 285,100.00	€ 133,997.00	€ 267,994.00	- € 17,106.00
-	<b>Gross profit</b>	-	<b>€ 1,271,050.00</b>	<b>€ 936,671.00</b>	<b>€ 1,873,342.00</b>	<b>€ 602,292.00</b>
6000	Wages and non- wage costs	80%	€ 856,500.00	€ 393,990.00	€ 787,980.00	- € 68,520.00
6200	Salaries and ancil- lary salaries	0%	€ 315,000.00	€ 156,000.00	€ 312,000.00	- € 3,000.00
-	<b>Contribution mar- gin I</b>	-	<b>€ 99,550.00</b>	<b>€ 386,681.00</b>	<b>€ 773,362.00</b>	<b>€ 673,812.00</b>
7010	Depreciation	0%	€ 35,000.00	€ 17,500.00	€ 35,000.00	€ 0.00
7750	Legal and advisory expenses	50%	€ 15,000.00	€ 5,400.00	€ 10,800.00	- € 4,200.00
7380	Telephone / mail	80%	€ 9,000.00	€ 4,650.00	€ 9,300.00	€ 300.00
7700	Insurance	0%	€ 34,000.00	€ 17,000.00	€ 34,000.00	€ 0.00
7400	Rent / lease	0%	€ 60,000.00	€ 30,000.00	€ 60,000.00	€ 0.00
7700	Marketing	100%	€ 60,000.00	€ 32,000.00	€ 64,000.00	€ 4,000.00
7200	Maintenance	95%	€ 40,000.00	€ 21,000.00	€ 42,000.00	€ 2,000.00
7300	Outbound freight	85%	€ 60,000.00	€ 26,500.00	€ 53,000.00	- € 7,000.00
7600	Other effort	95%	€ 22,000.00	€ 12,000.00	€ 24,000.00	€ 2,000.00
-	<b>Profit of common business operation</b>	-	<b>- € 235,450.00</b>	<b>€ 220,631.00</b>	<b>€ 441,262.00</b>	<b>€ 676,712.00</b>

Source: Author's table

The deviation analysis shows that the market growth in the Scandinavian region is greater than originally assumed. Due to the strong growth in Scandinavia, there is a positive deviation in the use of materials and the share of wages and salaries, which is shown in *table 7*. The promising tendency announced by the management is thus endorsed.

**Table 7: Comparative analysis of material input, wages and salaries**

Account	Description	Var.	1 <sup>st</sup> half 2018 (domestic market)	Quantity	1 <sup>st</sup> half 2018 (Scandinavia)	Quantity
4000	Sales	100%	€ 1,445,125.00	-	€ 570,475.00	-
4100	Sales deductions (commissions)	100%	€ 157,500.00	-	€ 178,500.00	-
-	<b>Operating performance</b>	-	<b>€ 1,287,625.00</b>	<b>100%</b>	<b>€ 391,975.00</b>	<b>100%</b>
5000	Use of materials	100%	€ 549,147.50	43%	€ 59,784.50	15%
5100	Total auxiliary and operating materials	100%	€ 122,835.63	-	€ 11,161.38	-
-	<b>Gross profit</b>	-	<b>€ 615,641.88</b>	-	<b>€ 321,029.13</b>	-
6000	Wages and non-wage costs	80%	€ 375,732.50	29%	€ 18,257.50	5%
6200	Salaries and ancillary salaries	0%	€ 144,512.50	11%	€ 11,487.50	3%
-	<b>Contribution margin I</b>	-	<b>€ 95,396.88</b>	-	<b>€ 291,284.13</b>	-

Source: Author's table

The use of materials in relation to the operating performance in the first half of 2018 in the domestic market (based on the 2016 financial year) is 43%. In comparison, the use of materials in the Scandinavian market is only 15%. The share of wages and salaries in the Scandinavian market is also significantly lower than in the domestic market. The wage share in the domestic market is 29%, in Scandinavia only 5%. The proportion of salaries is similar. Here, 11% in the domestic market are compared to only 3% in the Scandinavian market.

### **Future scenarios**

This chapter presents future scenarios, which are used for solution approaches and advice for the advisory board, which form the conclusion of this paper. Initially, for the presentation and assessment of future scenarios, there is a breakdown into fixed and variable costs for the domestic market and the Scandinavian market for 2018 (see *table 8*). Furthermore, it was assumed that the fixed costs on the domestic market cannot be reduced in the short term. This is due, among other things, to the many years of existence and the family management of Tractor Mower Ltd., which does not provide for the rapid termination of employment relationships, long-term rental contracts, etc. Furthermore, fixed costs remain unchanged and no inflation adjustment is made.

Table 8: Breakdown into fixed costs and variable costs

Account	Description	Var.	Forecast 2018	Forecast 2018 (domestic market)		Forecast 2018 (Scandinavia)	
				Fixed costs	Variable costs	Fixed costs	Variable costs
4000	Sales	100%	€ 4,031,200.00	€ 0.00	€ 2,890,250.00	€ 0.00	€ 1,140,950.00
4100	Sales deductions (commissions)	100%	€ 672,000.00	€ 0.00	€ 315,000.00	€ 0.00	€ 357,000.00
-	<b>Operating performance</b>	-	<b>€ 3,359,200.00</b>	<b>€ 0.00</b>	<b>€ 2,575,250.00</b>	<b>€ 0.00</b>	<b>€ 783,950.00</b>
5000	Use of materials	100%	€ 1,217,864.00	€ 0.00	€ 1,098,295.00	€ 0.00	€ 119,569.00
5100	Total auxiliary and operating materials	100%	€ 267,994.00	€ 0.00	€ 245,671.25	€ 0.00	€ 22,322.75
-	<b>Gross profit</b>	-	<b>€ 1,873,342.00</b>	<b>€ 0.00</b>	<b>€ 1,231,283.75</b>	<b>€ 0.00</b>	<b>€ 642,058.25</b>
6000	Wages and non-wage costs	80%	€ 787,980.00	€ 150,293.00	€ 601,172.00	€ 7,303.00	€ 29,212.00
6200	Salaries and ancillary salaries	0%	€ 312,000.00	€ 289,025.00	€ 0.00	€ 22,975.00	€ 0.00
-	<b>Contribution margin I</b>	-	<b>€ 773,362.00</b>	<b>- € 439,318.00</b>	<b>€ 630,111.75</b>	<b>- € 30,278.00</b>	<b>€ 612,846.25</b>
7010	Depreciation	0%	€ 35,000.00	€ 31,250.00	€ 0.00	€ 3,750.00	€ 0.00
7750	Legal and advisory expenses	50%	€ 10,800.00	€ 3,250.00	€ 3,250.00	€ 2,150.00	€ 2,150.00
7380	Telephone / mail	80%	€ 9,300.00	€ 1,800.00	€ 7,200.00	€ 60.00	€ 240.00
7700	Insurance	0%	€ 34,000.00	€ 32,500.00	€ 0.00	€ 1,500.00	€ 0.00
7400	Rent / lease	0%	€ 60,000.00	€ 35,000.00	€ 0.00	€ 25,000.00	€ 0.00
7700	Marketing	100%	€ 64,000.00	€ 0.00	€ 25,000.00	€ 0.00	€ 39,000.00
7200	Maintenance	95%	€ 42,000.00	€ 1,175.00	€ 22,325.00	€ 925.00	€ 17,575.00
7300	Outbound freight	85%	€ 53,000.00	€ 7,200.00	€ 40,800.00	€ 750.00	€ 4,250.00
7600	Other effort	95%	€ 24,000.00	€ 1,200.00	€ 22,800.00	€ 0.00	€ 0.00
-	<b>Profit of common business operation</b>	-	<b>€ 441,262.00</b>	<b>- € 552,693.00</b>	<b>€ 508,736.75</b>	<b>- € 64,413.00</b>	<b>€ 549,631.25</b>

Source: Author's table

Scenario A (see table 9) describes a conservative approach for the budget for 2019, which continues the previous strategy as described in the introduction and assumes an average annual growth of 10% in Scandinavia. The domestic market is largely saturated and no growth is expected. Any increases in costs, such as collective bargaining increases, were not taken into account. These would have to be included in all scenarios and would consequently have no relevance in the subsequent comparison and selection.

Table 9: Scenario A

Account	Description	Forecast 2019 (domestic market)		Forecast 2019 (Scandinavia)		Budget 2019
		Fixed costs	Variable costs	Fixed costs	Variable costs	
4000	Sales	€ 0.00	€ 2,890,250.00	€ 0.00	€ 1,255,045.00	€ 4,145,295.00
4100	Sales deductions (commissions)	€ 0.00	€ 315,000.00	€ 0.00	€ 392,700.00	€ 707,700.00
-	<b>Operating performance</b>	<b>€ 0.00</b>	<b>€ 2,575,250.00</b>	<b>€ 0.00</b>	<b>€ 862,345.00</b>	<b>€ 3,437,595.00</b>
5000	Use of materials	€ 0.00	€ 1,098,295.00	€ 0.00	€ 131,525.90	€ 1,229,820.90
5100	Total auxiliary and operating materials	€ 0.00	€ 245,671.25	€ 0.00	€ 24,555.03	€ 270,226.28
-	<b>Gross profit</b>	<b>€ 0.00</b>	<b>€ 1,231,283.75</b>	<b>€ 0.00</b>	<b>€ 706,264.08</b>	<b>€ 1,937,547.83</b>
6000	Wages and non-wage costs	€ 150,293.00	€ 601,172.00	€ 7,303.00	€ 32,133.20	€ 790,901.20
6200	Salaries and ancillary salaries	€ 289,025.00	€ 0.00	€ 22,975.00	€ 0.00	€ 312,000.00
-	<b>Contribution margin I</b>	<b>- € 439,318.00</b>	<b>€ 630,111.75</b>	<b>- € 30,278.00</b>	<b>€ 674,130.88</b>	<b>€ 834,646.63</b>
7010	Depreciation	€ 31,250.00	€ 0.00	€ 3,750.00	€ 0.00	€ 35,000.00
7750	Legal and advisory expenses	€ 3,250.00	€ 3,250.00	€ 2,150.00	€ 2,365.00	€ 11,015.00
7380	Telephone / mail	€ 1,800.00	€ 7,200.00	€ 60.00	€ 264.00	€ 9,324.00
7700	Insurance	€ 32,500.00	€ 0.00	€ 1,500.00	€ 0.00	€ 34,000.00
7400	Rent / lease	€ 35,000.00	€ 0.00	€ 25,000.00	€ 0.00	€ 60,000.00
7700	Marketing	€ 0.00	€ 25,000.00	€ 0.00	€ 42,900.00	€ 67,900.00
7200	Maintenance	€ 1,175.00	€ 22,325.00	€ 925.00	€ 19,332.50	€ 43,757.50
7300	Outbound freight	€ 7,200.00	€ 40,800.00	€ 750.00	€ 4,675.00	€ 53,425.00
7600	Other effort	€ 1,200.00	€ 22,800.00	€ 0.00	€ 0.00	€ 24,000.00
-	<b>Profit of common business operation</b>	<b>- € 552,693.00</b>	<b>€ 508,736.75</b>	<b>- € 64,413.00</b>	<b>€ 604,594.38</b>	<b>€ 496,225.13</b>

Source: Author's table

In order to represent the profitability of this scenario with a key figure, the result was calculated in relation to the operating performance, which in the present case results in a value of 14.4%. With a realistic growth of 10% in the Scandinavian market, the minus on the domestic market will be compensated.

Scenario B (see table 10) describes an optimistic approach for the budget for 2019, which continues the previous strategy, as described in the introduction, but assumes an above-average annual growth of 50% in Scandinavia. The domestic market is still largely saturated and no growth is expected. Any increases in costs, such as collective bargaining increases, were not taken into account.

Table 10: Scenario B

Account	Description	Forecast 2019 (domestic market)		Forecast 2019 (Scandinavia)		Budget 2019
		Fixed costs	Variable costs	Fixed costs	Variable costs	
4000	Sales	€ 0.00	€ 2,890,250.00	€ 0.00	€ 1,711,425.00	€ 4,601,675.00
4100	Sales deductions (commissions)	€ 0.00	€ 315,000.00	€ 0.00	€ 535,500.00	€ 850,500.00
-	<b>Operating performance</b>	<b>€ 0.00</b>	<b>€ 2,575,250.00</b>	<b>€ 0.00</b>	<b>€ 1,175,925.00</b>	<b>€ 3,751,175.00</b>
5000	Use of materials	€ 0.00	€ 1,098,295.00	€ 0.00	€ 179,353.50	€ 1,277,648.50
5100	Total auxiliary and operating materials	€ 0.00	€ 245,671.25	€ 0.00	€ 33,484.13	€ 279,155.38
-	<b>Gross profit</b>	<b>€ 0.00</b>	<b>€ 1,231,283.75</b>	<b>€ 0.00</b>	<b>€ 963,057.38</b>	<b>€ 2,194,371.13</b>
6000	Wages and non-wage costs	€ 150,293.00	€ 601,172.00	€ 7,303.00	€ 43,818.00	€ 802,586.00
6200	Salaries and ancillary salaries	€ 289,025.00	€ 0.00	€ 22,975.00	€ 0.00	€ 312,000.00
-	<b>Contribution margin I</b>	<b>- € 439,318.00</b>	<b>€ 630,111.75</b>	<b>- € 30,278.00</b>	<b>€ 919,269.38</b>	<b>€ 1,079,785.13</b>
7010	Depreciation	€ 31,250.00	€ 0.00	€ 3,750.00	€ 0.00	€ 35,000.00
7750	Legal and advisory expenses	€ 3,250.00	€ 3,250.00	€ 2,150.00	€ 3,225.00	€ 11,875.00
7380	Telephone / mail	€ 1,800.00	€ 7,200.00	€ 60.00	€ 360.00	€ 9,420.00
7700	Insurance	€ 32,500.00	€ 0.00	€ 1,500.00	€ 0.00	€ 34,000.00
7400	Rent / lease	€ 35,000.00	€ 0.00	€ 25,000.00	€ 0.00	€ 60,000.00
7700	Marketing	€ 0.00	€ 25,000.00	€ 0.00	€ 58,500.00	€ 83,500.00
7200	Maintenance	€ 1,175.00	€ 22,325.00	€ 925.00	€ 26,362.50	€ 50,787.50
7300	Outbound freight	€ 7,200.00	€ 40,800.00	€ 750.00	€ 6,375.00	€ 55,125.00
7600	Other effort	€ 1,200.00	€ 22,800.00	€ 0.00	€ 0.00	€ 24,000.00
-	<b>Profit of common business operation</b>	<b>- € 552,693.00</b>	<b>€ 508,736.75</b>	<b>- € 64,413.00</b>	<b>€ 824,446.88</b>	<b>€ 716,077.63</b>

Source: Author's table

In order to represent the profitability of this scenario with a key figure, the result was calculated in relation to the operating performance, which in this case results in a value of 19.1%.

Scenario C (see table 11) describes the closure of the domestic market and exclusive distribution in the Scandinavian countries. An average annual growth of 10% was assumed in Scandinavia in the next three financial years. Any increases in costs, such as collective bargaining increases, were not taken into account.

Table 11: Scenario C

Account	Description	Forecast 2019 (domestic market)		Forecast 2019 (Scandinavia)		Budget 2019
		Fixed costs	Variable costs	Fixed costs	Variable costs	
4000	Sales	€ 0.00	€ 0.00	€ 0.00	€ 1,255,045.00	€ 1,255,045.00
4100	Sales deductions (commissions)	€ 0.00	€ 0.00	€ 0.00	€ 392,700.00	€ 392,700.00
-	<b>Operating performance</b>	<b>€ 0.00</b>	<b>€ 0.00</b>	<b>€ 0.00</b>	<b>€ 862,345.00</b>	<b>€ 862,345.00</b>
5000	Use of materials	€ 0.00	€ 0.00	€ 0.00	€ 131,525.90	€ 131,525.90
5100	Total auxiliary and operating materials	€ 0.00	€ 0.00	€ 0.00	€ 24,555.03	€ 24,555.03
-	<b>Gross profit</b>	<b>€ 0.00</b>	<b>€ 0.00</b>	<b>€ 0.00</b>	<b>€ 706,264.08</b>	<b>€ 706,264.08</b>
6000	Wages and non-wage costs	€ 0.00	€ 0.00	€ 7,303.00	€ 32,133.20	€ 39,436.20
6200	Salaries and ancillary salaries	€ 0.00	€ 0.00	€ 22,975.00	€ 0.00	€ 22,975.00
-	<b>Contribution margin I</b>	<b>€ 0.00</b>	<b>€ 0.00</b>	<b>- € 30,278.00</b>	<b>€ 674,130.88</b>	<b>€ 643,852.88</b>
7010	Depreciation	€ 0.00	€ 0.00	€ 3,750.00	€ 0.00	€ 3,750.00
7750	Legal and advisory expenses	€ 0.00	€ 0.00	€ 2,150.00	€ 2,365.00	€ 4,515.00
7380	Telephone / mail	€ 0.00	€ 0.00	€ 60.00	€ 264.00	€ 324.00
7700	Insurance	€ 0.00	€ 0.00	€ 1,500.00	€ 0.00	€ 1,500.00
7400	Rent / lease	€ 0.00	€ 0.00	€ 25,000.00	€ 0.00	€ 25,000.00
7700	Marketing	€ 0.00	€ 0.00	€ 0.00	€ 42,900.00	€ 42,900.00
7200	Maintenance	€ 0.00	€ 0.00	€ 925.00	€ 19,332.50	€ 20,257.50
7300	Outbound freight	€ 0.00	€ 0.00	€ 750.00	€ 4,675.00	€ 5,425.00
7600	Other effort	€ 0.00	€ 0.00	€ 0.00	€ 0.00	€ 0.00
-	<b>Profit of common business operation</b>	<b>€ 0.00</b>	<b>€ 0.00</b>	<b>- € 64,413.00</b>	<b>€ 604,594.38</b>	<b>€ 540,181.38</b>

Source: Author's table

In order to show the profitability of this scenario with a key figure, the result was calculated in relation to the operating performance, which in the case of scenario C results in a value of 62.6%. Closing the domestic market completely from 2019, so that both fixed and variable costs of the domestic market are eliminated, is in reality not feasible or only feasible in the long term, as in this case the entire business activity would have to be relocated to Scandinavia. Therefore, the assumption mentioned at the beginning was made that the fixed costs on the home market cannot be reduced in the short term.

Scenario D (see *table 12*) describes an optimistic approach for the budget for 2019, with the closure of the domestic market, exclusive distribution in the Scandinavian countries and an annual above-average increase of 50% in Scandinavia. Since the domestic market is largely saturated, no growth is expected. Any increases in costs, such as collective bargaining increases, were not taken into account.



Table 12: Scenario D

Account	Description	Forecast 2019 (domestic market)		Forecast 2019 (Scandinavia)		Budget 2019
		Fixed costs	Variable costs	Fixed costs	Variable costs	
4000	Sales	€ 0.00	€ 0.00	€ 0.00	€ 1,711,425.00	€ 1,711,425.00
4100	Sales deductions (commissions)	€ 0.00	€ 0.00	€ 0.00	€ 535,500.00	€ 535,500.00
-	<b>Operating performance</b>	<b>€ 0.00</b>	<b>€ 0.00</b>	<b>€ 0.00</b>	<b>€ 1,175,925.00</b>	<b>€ 1,175,925.00</b>
5000	Use of materials	€ 0.00	€ 0.00	€ 0.00	€ 179,353.50	€ 179,353.50
5100	Total auxiliary and operating materials	€ 0.00	€ 0.00	€ 0.00	€ 33,484.13	€ 33,484.13
-	<b>Gross profit</b>	<b>€ 0.00</b>	<b>€ 0.00</b>	<b>€ 0.00</b>	<b>€ 963,087.38</b>	<b>€ 963,087.38</b>
6000	Wages and non-wage costs	€ 0.00	€ 0.00	€ 7,303.00	€ 43,818.00	€ 51,121.00
6200	Salaries and ancillary salaries	€ 0.00	€ 0.00	€ 22,975.00	€ 0.00	€ 22,975.00
-	<b>Contribution margin I</b>	<b>€ 0.00</b>	<b>€ 0.00</b>	<b>- € 30,278.00</b>	<b>€ 919,269.38</b>	<b>€ 888,991.38</b>
7010	Depreciation	€ 0.00	€ 0.00	€ 3,750.00	€ 0.00	€ 3,750.00
7750	Legal and advisory expenses	€ 0.00	€ 0.00	€ 2,150.00	€ 3,225.00	€ 5,375.00
7380	Telephone / mail	€ 0.00	€ 0.00	€ 60.00	€ 360.00	€ 420.00
7700	Insurance	€ 0.00	€ 0.00	€ 1,500.00	€ 0.00	€ 1,500.00
7400	Rent / lease	€ 0.00	€ 0.00	€ 25,000.00	€ 0.00	€ 25,000.00
7700	Marketing	€ 0.00	€ 0.00	€ 0.00	€ 58,500.00	€ 58,500.00
7200	Maintenance	€ 0.00	€ 0.00	€ 925.00	€ 26,362.50	€ 27,287.50
7300	Outbound freight	€ 0.00	€ 0.00	€ 750.00	€ 6,375.00	€ 7,125.00
7600	Other effort	€ 0.00	€ 0.00	€ 0.00	€ 0.00	€ 0.00
-	<b>Profit of common business operation</b>	<b>€ 0.00</b>	<b>€ 0.00</b>	<b>- € 64,413.00</b>	<b>€ 824,446.88</b>	<b>€ 760,033.88</b>

Source: Author's table

In order to show the profitability of this scenario with a key figure, the result in relation to the operating performance was calculated again, which in this case results in a value of 64.6%. Closing the domestic market completely from 2019, so that both fixed and variable costs of the domestic market are eliminated, is in reality not feasible or only feasible in the long term, as in this case the entire business activity would have to be relocated to Scandinavia. Therefore, the assumption mentioned at the beginning was made that the fixed costs on the domestic market cannot be reduced in the short term. Otherwise this would be the preferred scenario.

Scenario E (see table 13) describes the closure of the domestic market under the assumption that the fixed costs remain and that sales take place exclusively in the Scandinavian countries. Average annual growth of 10% was assumed in Scandinavia for the next three financial years. Any increases in costs, such as collective bargaining increases, were not taken into account.

Table 13: Scenario E

Account	Description	Forecast 2019 (domestic market)		Forecast 2019 (Scandinavia)		Budget 2019
		Fixed costs	Variable costs	Fixed costs	Variable costs	
4000	Sales	€ 0.00	€ 0.00	€ 0.00	€ 1,255,045.00	€ 1,255,045.00
4100	Sales deductions (commissions)	€ 0.00	€ 0.00	€ 0.00	€ 392,700.00	€ 392,700.00
-	<b>Operating performance</b>	<b>€ 0.00</b>	<b>€ 0.00</b>	<b>€ 0.00</b>	<b>€ 862,345.00</b>	<b>€ 862,345.00</b>
5000	Use of materials	€ 0.00	€ 0.00	€ 0.00	€ 131,525.90	€ 131,525.90
5100	Total auxiliary and operating materials	€ 0.00	€ 0.00	€ 0.00	€ 24,555.03	€ 24,555.03
-	<b>Gross profit</b>	<b>€ 0.00</b>	<b>€ 0.00</b>	<b>€ 0.00</b>	<b>€ 706,264.08</b>	<b>€ 706,264.08</b>
6000	Wages and non-wage costs	€ 150,293.00	€ 0.00	€ 7,303.00	€ 32,133.00	€ 189,729.20
6200	Salaries and ancillary salaries	€ 289,025.00	€ 0.00	€ 22,975.00	€ 0.00	€ 312,000.00
-	<b>Contribution margin I</b>	<b>- € 439,318.00</b>	<b>€ 0.00</b>	<b>- € 30,278.00</b>	<b>€ 674,130.88</b>	<b>€ 204,534.88</b>
7010	Depreciation	€ 31,250.00	€ 0.00	€ 3,750.00	€ 0.00	€ 35,000.00
7750	Legal and advisory expenses	€ 3,250.00	€ 0.00	€ 2,150.00	€ 2,365.00	€ 7,765.00
7380	Telephone / mail	€ 1,800.00	€ 0.00	€ 60.00	€ 264.00	€ 2,124.00
7700	Insurance	€ 32,500.00	€ 0.00	€ 1,500.00	€ 0.00	€ 34,000.00
7400	Rent / lease	€ 35,000.00	€ 0.00	€ 25,000.00	€ 0.00	€ 60,000.00
7700	Marketing	€ 0.00	€ 0.00	€ 0.00	€ 42,900.00	€ 42,900.00
7200	Maintenance	€ 1,175.00	€ 0.00	€ 925.00	€ 19,332.50	€ 21,432.50
7300	Outbound freight	€ 7,200.00	€ 0.00	€ 750.00	€ 4,675.00	€ 12,625.00
7600	Other effort	€ 1,200.00	€ 0.00	€ 0.00	€ 0.00	€ 1,200.00
-	<b>Profit of common business operation</b>	<b>- € 552,693.00</b>	<b>€ 0.00</b>	<b>- € 64,413.00</b>	<b>€ 604,594.38</b>	<b>- € 12,511.63</b>

Source: Author's table

To represent the profitability of this scenario with a key figure, the result was calculated in relation to the operating performance, which in this case results in a value of - 1.5%.

Scenario F (see *table 14*) describes an optimistic approach for the budget for 2019, with the closure of the domestic market, assuming that the fixed costs will remain, an exclusive distribution in the Scandinavian countries and an annual above-average increase of 50% in Scandinavia. Since the domestic market is largely saturated, no growth is expected. Any increases in costs, such as collective bargaining increases, were not taken into account.

Table 14: Scenario F

Account	Description	Forecast 2019 (domestic market)		Forecast 2019 (Scandinavia)		Budget 2019
		Fixed costs	Variable costs	Fixed costs	Variable costs	
4000	Sales	€ 0.00	€ 0.00	€ 0.00	1,711,425.00	€ 1,711,425.00
4100	Sales deductions (commissions)	€ 0.00	€ 0.00	€ 0.00	€ 535,500.00	€ 535,500.00
-	<b>Operating performance</b>	<b>€ 0.00</b>	<b>€ 0.00</b>	<b>€ 0.00</b>	<b>€ 1,175,925.00</b>	<b>€ 1,175,925.00</b>
5000	Use of materials	€ 0.00	€ 0.00	€ 0.00	€ 179,353.50	€ 179,353.50
5100	Total auxiliary and operating materials	€ 0.00	€ 0.00	€ 0.00	€ 33,484.13	€ 33,484.13
-	<b>Gross profit</b>	<b>€ 0.00</b>	<b>€ 0.00</b>	<b>€ 0.00</b>	<b>€ 963,087.38</b>	<b>€ 963,087.38</b>
6000	Wages and non-wage costs	€ 150,293.00	€ 0.00	€ 7,303.00	€ 43,818.00	€ 201,414.00
6200	Salaries and ancillary salaries	€ 289,025.00	€ 0.00	€ 22,975.00	€ 0.00	€ 312,000.00
-	<b>Contribution margin I</b>	<b>- € 439,318.00</b>	<b>€ 0.00</b>	<b>- € 30,278.00</b>	<b>€ 919,269.38</b>	<b>€ 449,673.38</b>
7010	Depreciation	€ 31,250.00	€ 0.00	€ 3,750.00	€ 0.00	€ 35,000.00
7750	Legal and advisory expenses	€ 3,250.00	€ 0.00	€ 2,150.00	€ 3,225.00	€ 8,625.00
7380	Telephone / mail	€ 1,800.00	€ 0.00	€ 60.00	€ 360.00	€ 2,220.00
7700	Insurance	€ 32,500.00	€ 0.00	€ 1,500.00	€ 0.00	€ 34,000.00
7400	Rent / lease	€ 35,000.00	€ 0.00	€ 25,000.00	€ 0.00	€ 60,000.00
7700	Marketing	€ 0.00	€ 0.00	€ 0.00	€ 58,500.00	€ 58,500.00
7200	Maintenance	€ 1,175.00	€ 0.00	€ 925.00	€ 26,362.50	€ 28,462.50
7300	Outbound freight	€ 7,200.00	€ 0.00	€ 750.00	€ 6,375.00	€ 14,325.00
7600	Other effort	€ 1,200.00	€ 0.00	€ 0.00	€ 0.00	€ 1,200.00
-	<b>Profit of common business operation</b>	<b>- € 552,693.00</b>	<b>€ 0.00</b>	<b>- € 64,413.00</b>	<b>€ 824,446.88</b>	<b>€ 207,340.88</b>

Source: Author's table

In order to represent the profitability of this scenario with a key figure, the result was calculated in relation to the operating performance, which in this case results in a value of 17.6%.

Table 15: Overview of scenarios

Scenario	Growth Scandinavia	Operating performance Budget 2019	Profit of common business operation Budget 2019	Profitability
Scenario A	+ 10%	€ 3,437,595.00	€ 496,225.13	14.4%
Scenario B	+ 50%	€ 3,751,175.00	€ 716,077.63	19.1%
Scenario C	+ 10%	€ 862,345.00	€ 540,181.38	62.6%
Scenario D	+ 50%	€ 1,175,925.00	€ 760,033.88	64.6%
Scenario E	+ 10%	€ 862,345.00	- € 12,511.63	- 1.5%
Scenario F	+ 50%	€ 1,175,925.00	€ 207,340.88	17.6%

Source: Author's table

Table 15 summarizes the scenarios described above as an overview and explanatory basis for the CEO and the advisory board. It served as the starting point for the recommendation for a scenario, on the basis of which the budget for the next three years (period 2019 to 2021) was then drawn up.

Scenario A was selected for the recommendation to the advisory board and the preparation of the budget planning for the next three years, as the fixed costs on the domestic market cannot be reduced immediately (exclusion of scenarios C and D) and the growth in the Scandinavian market with an average of 10% per year is realistic (exclusion of scenarios B and F). Scenario E is also excluded for 2019 due to the negative profitability.

### Budget planning 2019 to 2021

Table 16: Budget planning 2019 to 2021

Account	Description	Budget 2019	Use of materials	Budget 2020	Use of materials	Budget 2021	Use of materials
4000	Sales	€ 4,145,295.00	-	€ 4,259,390.00	-	€ 4,373,485.00	-
4100	Sales deductions (commissions)	€ 707,700.00	-	€ 743,400.00	-	€ 779,100.00	-
-	<b>Operating performance</b>	<b>€ 3,437,595.00</b>	-	<b>€ 3,515,990.00</b>	-	<b>€ 3,594,385.00</b>	-
5000	Use of materials	€ 1,229,820.90	<b>35.8%</b>	€ 1,241,777.80	<b>35.3%</b>	€ 1,253,734.70	<b>34.9%</b>
5100	Total auxiliary and operating materials	€ 270,226.28	-	€ 272,458.55	-	€ 274,690.83	-
-	<b>Gross profit</b>	<b>€ 1,937,547.83</b>	-	<b>€ 2,001,753.65</b>	-	<b>€ 2,065,959.48</b>	-
6000	Wages and non-wage costs	€ 790,901.20	-	€ 793,822.40	-	€ 796,743.60	-
6200	Salaries and ancillary salaries	€ 312,000.00	-	€ 312,000.00	-	€ 312,000.00	-
-	<b>Contribution margin I</b>	<b>€ 834,646.63</b>	-	<b>€ 895,931.25</b>	-	<b>€ 957,215.88</b>	-
7010	Depreciation	€ 35,000.00	-	€ 35,000.00	-	€ 35,000.00	-
7750	Legal and advisory expenses	€ 11,015.00	-	€ 11,230.00	-	€ 11,445.00	-
7380	Telephone / mail	€ 9,324.00	-	€ 9,348.00	-	€ 9,372.00	-
7700	Insurance	€ 34,000.00	-	€ 34,000.00	-	€ 34,000.00	-
7400	Rent / lease	€ 60,000.00	-	€ 60,000.00	-	€ 60,000.00	-
7700	Marketing	€ 67,900.00	-	€ 71,800.00	-	€ 75,700.00	-
7200	Maintenance	€ 43,757.50	-	€ 45,515.00	-	€ 47,272.50	-
7300	Outbound freight	€ 53,425.00	-	€ 53,850.00	-	€ 54,275.00	-
7600	Other effort	€ 24,000.00	-	€ 24,000.00	-	€ 24,000.00	-
-	<b>Profit of common business operation</b>	<b>€ 496,225.13</b>	-	<b>€ 551,188.25</b>	-	<b>€ 606,151.38</b>	-

Source: Author's table

For the budget planning for 2019 to 2021 (see *table 16*), the variable costs of the Scandinavian business were increased by 10% per year based on the assumptions for scenario A (growth). The domestic market was viewed as saturated and no growth was taken into account. The numbers were kept. The use of materials improved only slightly in the three years under review, as the majority is determined by the high percentage of the domestic market.

### ***Solution approaches and problem areas***

The significantly poorer result in 2017 is associated with the trial marketing and export to Scandinavian countries, which required the rental of a warehouse, additional high sales commissions for local dealers and a high level of material input due to the need for pre-production.

The planning for 2018 was too conservative after the results for the first half of 2018 were available and analyzed. The Scandinavian market is more profitable than the domestic market due to lower wage and salary costs and lower use of materials, which is why the focus for the next few years must be on the development and expansion of this market as well as an optimized and efficient sales organization. At the same time, the fixed costs on the domestic market must be reduced so that it is no longer in deficit.

A long-term strategy consists in closing the domestic market and relocating the business to Scandinavia, whereby an identified problem area in this case would be any remaining fixed costs in the home market (e.g. overheads).

## **Conclusions**

The analysis of the exemplary organization Tractor Mower Ltd. has been carried out on the company's financial documents. The organization was assigned to the "small business" category based on the existing sales figures. It was and is required to position itself more strongly on foreign markets due to insufficient potential on the domestic market.

Several controlling challenges, like i.e. the investigation of information for planning organizational decisions, were neglected at Tractor Mower Ltd. Controlling had to provide data and forecasts that enable the managing director or supervisory board to react to the expansion into Scandinavian countries and stagnating or increasingly poor results and, as a

result, to ensure sustainable, successful corporate development. A forecast or plan for the next 12 months has been submitted. The professionalization of a controlling toolkit in family businesses like this is primarily opposed to the goal of maintaining long-term control of the owner family, although controlling makes a decisive contribution to the continued existence of the company across generations. It is an important factor for a successful turnaround, especially during corporate crises as described and analyzed before (Feldbauer-Durstmüller–Mayr, 2019, p. 5).

The existing income statement for the first half of 2018 was initially adapted accordingly and the missing items were added. The first half of 2018 was then calculated back to the domestic market on the basis of the 2016 profit and loss account, thus dividing the first half of 2018 into the original business in the domestic market and the export business to Scandinavian countries. For the assessment of the budget, the deviation for further assessment and assessment was calculated from the plan for 2018 and the adapted first half of 2018 or the forecast for 2018.

The deviation analysis showed that the market growth in the Scandinavian region is greater than assumed. Due to the considerable deviations between the 2018 plan and the first half of 2018, the planning was too conservative. Due to the strong growth in Scandinavia, there is a positive deviation in the use of materials and the share of wages and salaries.

For the presentation and assessment of the future scenarios, there was a breakdown into fixed and variable costs of the domestic market and the Scandinavian market. The fixed costs on the domestic market cannot be reduced in the short term. In order to meet the controlling challenge of showing the profitability of the future scenarios with a key figure, the result was calculated in relation to the operating performance.

The identified scenarios were summarized as an overview and explanatory basis for the CEO and advisory board. It served as the starting point for the specific recommendation, on the basis of which the budget for the next three years was then drawn up. A conservative approach was chosen for the budget for 2019, which continues the previous strategy and assumes an average annual growth of 10% in Scandinavia. The scenario was chosen because the fixed costs on the domestic market cannot be reduced immediately and the growth in the Scandinavian market with an average of 10% per year is realistic.

For the budget planning for 2019 to 2021, the variable costs of the Scandinavian business were increased by 10% per year based on the assumptions for the selected scenario. The domestic market was viewed as

saturated and no growth was taken into account. The use of materials improved only slightly in the three years under review, as the majority is determined by the high percentage of the domestic market.

The Scandinavian market is more profitable than the domestic market due to lower wage and salary costs and lower use of materials, which is why the focus for the next few years must be on the development and expansion of this market as well as an optimized and efficient sales organization. At the same time, the fixed costs on the domestic market must be reduced so that it is no longer in deficit.

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