

**MENDEL UNIVERSITY IN BRNO**



**Analysis of Financial Performance of a Selected Enterprise  
DIPLOMA THESIS**

**Supervisor:**

**Ing. Ivana Blažková, Ph.D.**

**Author:**

**Bc. Renata Chlupová**

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## **Abstract**

*Chlupová, R. Analysis of financial performance of a selected enterprise. Brno. 2014*

The main topic of the diploma thesis is the financial analysis of the chosen company. The first part consists of a theoretical basis of the issue involving these areas - region, business environment and economic analysis. The second part is focused on the practical implications with formation of the economic analysis of the chosen company, characteristics of the region and the industry in which the company operates as well as suggestions of improvements.

## **Key words**

region, company, economic analysis, business environment, financial analysis, differential analysis, indicators, competition.

## **Abstrakt**

*Chlupová, R. Analýza finanční výkonnosti vybraného podniku. Brno. 2014*

Hlavním předmětem diplomové práce je zpracování finanční analýzy podniku. První část práce je tvořena teoretickou základnou dané problematiky zahrnující tyto okruhy - region, prostředí podniku a ekonomickou analýzu. Druhá část je sestavena z praktického pohledu a je tvořena finanční analýzou a analýzou prostředí podniku vybraného podniku, charakteristikou regionu a charakteristikou odvětví, ve kterém podnik působí. V závěru práce je provedeno zhodnocení celkové finanční situace podniku a jsou navržena doporučení ke zlepšení.

## **Klíčová slova**

region, firma, ekonomická analýza, prostředí podniku, finanční analýza, poměrová analýza, indikátory, konkurence

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## Abbreviations

CR	Czech Republic
CZK	Czech crown
EBIT	Earnings before Interest and Taxes
EBT	Earning before Taxes
EU	European Union
FA	Financial Analysis
GDP	Gross Domestic Product
GMO	Genetically Modified Food
GVA	Gross Value Added
LAU	Local Administrative Units
NUTS	Nomenclature of Territorial Units for Statistics
NWC	Net Working Capital
PEST	Political, Economic, Social and Technological
ROA	Return on Asset
ROE	Return on Equity
ROCE	Return on Capital Employed
ROS	Return on Sales
StD	Short-term Debt
SWOT	Strengths, Weaknesses, Opportunities and Threats
TA	Total Assets



# 1 Introduction

Currently, each company operates in a competitive environment, which places a great emphasis on the activities of each entity. It is important the company quickly responds to changes in the environment, the response to the actions of their competitors. In particular, it mainly concerns the range of products, its size, cost, manufacturing capabilities of the company, but also the organizational structure and no less important method of financing the business. The company's success in the competitive environment is its main aim, which can be reached through management's evaluation of market situation.

Part of financial management is an area that represents a significant part of it called financial analysis providing feedback between the planned management decisions and reality. The financial analysis is mainly used to detect phenomena that you want and need to monitor. The analysis is usually done for the evaluation of the company, its departments, and so on. The financial analysis of individual companies can also be compared with the national average in a given industry.

Financial analysis uses primarily information from the past, however on their basis is still possible to estimate the future development of the company. It shows the company's behaviour in the past. Financial analysis and interpretation of the results should contribute to the overall assessment of the situation of the company and should detect emerging problems in time to which the company should respond as soon as possible. For this reason, the financial analysis considered one of the most important management tools. These information are also essential for finding optimal financial sources and their further investment.

To make the analysis fully-fledged, the concentration on the analysis of business environment is as important as the financial analysis itself. Information is provided online and gives the opportunity to establish understanding for the business, political, technological and other environments. The importance of such analysis is impeccable therefore is included in the thesis. Information related to the company itself are the subject of comprehensive analysis. Thus those, which are processed, produced by company itself not just only those, which exists independently on the company.

## **2 Objective of the Thesis**

The main objective of the thesis is to assess the financial situation and the stability of the company based on a detailed analysis of financial data comprehensively. The aim of the thesis is to evaluate the development of the financial situation of the company in 2006-2012. The thesis is aimed at assessing the management of the company by a calculation of selected economic indicators, which are based on the analysis of the balance sheet and profit and loss account of the selected years (2006, 2007, 2008, 2009, 2010, 2011 and 2012). The data needed for the processing the financial analysis are derived from the financial statements of the company. Methodology is described in the chapter 5.

The purpose of the Diploma Thesis is to compile an economic analysis of the company. The main goal is based on meeting of the following component aims:

- A. Compilation of the theoretical background related to the issue
- B. Assessment of the company's economic performance and comparison with similar competitive enterprise and with average values achieved in the industry with 50 - 249 employees.
- C. Compilation of a proposal and recommendation for the company's improvement of the economic performance.

# Theoretical Part

## 3 Region

### 3.1 What is Region?

The term “region” does not have a precise meaning. In practice, the actual meaning given to the term is essentially purpose driven. However, in all instances the purpose implies some spatial dimension, based on some set of characteristics common to the region and uncommon or not applicable to outside the region. The existence of many definitions is discussed, which gives a proper understanding to what the region is. Region is essentially a geographical word, indicating that the globe, or the continent, or the nation, or the state has been divided into parts according to some principle.

The region is a classificatory concept designed to represent physical, cultural, social and economic characteristics for given portions of the earth’s surface. That regions exist, then, is almost axiomatic. However, there are diverging views as to what they represent and how they should be defined. The first view of regions considers them to be natural phenomena, as organic entities. The second, more recent, view sees regions simply as a method of classification—a descriptive tool defined according to particular criteria, with as many regions as there are criteria to define them. (Stejskal, 2009)

“The region can be sub-national entity - part of one state or one economy separated from other areas of the formal boundaries and usually associated with economic barriers.” (Maier & Todtling, 1997)

“The region is a contested area, both territorially and functionally. Spatially, it exists between the national and the local and is the scene of intervention by actors from all levels, national, local, regional and now supranational. Functionally, it is a space in which different types of agency interact and, since it is often weakly institutionalised itself, a terrain of competition among them.” (Keating, 1997)

According to the Law no. 248/2000 Coll. on regional development support, is a territory defined by administrative boundaries of regions, districts, municipalities or associations of municipalities whose development is supported.<sup>1</sup>

According to the regional development website, the region is a territorial entity using one or more characters; it is dissimilar to a wider area and is defined for an actual purpose or a function.<sup>2</sup> The concept of region is appropriate to the context of use or the context of interest. There are different divisions of the regions. Substantial division seems to be as the natural and administrative regions.

Native (organic) region can be designated as a closed territorial unit with territorial division of functions (and therefore the relationship) between the core and the hinterland. Relational closeness of the administrative unit is a relative term. No territorial unit (region) is not logically relational fully closed, i.e. without relation to another region or to other regions.

Administrative regions are defined for public administration purpose and this carries certain requirement of similar size. Therefore, these are the artificial regions, often inadequate in its actual processes and ongoing relations in the region. Districts, regions, cohesion regions - all these levels are considered as administrative (statistically purpose) division with varying degrees of divergence from natural regions.

Viturka (2007) defines competitiveness of regions as a result of joint efforts of the most productive use of internal resources development in interaction with the use of external resources and development opportunities, targeted at permanent increasing of potential of regions in sustainable production.

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<sup>1</sup> [29] translated

<sup>2</sup> [38] translated

### 3.2 NUTS explanation

The NUTS nomenclature is defined only for the 27 member states of the European Union. The current NUTS nomenclature is applicable from 1 January 2012 subdivides the economic territory of the European Union into 97 regions at NUTS 1 level, 270 regions at NUTS 2 level and 1 294 regions at NUTS 3 level. Below those, two levels of Local Administrative Units (LAUs) have been defined. The upper LAU level (LAU level 1, formerly NUTS level 4) is defined only for the following countries: Bulgaria, the Czech Republic, Denmark, Germany, Estonia, Ireland, Greece, France, Cyprus, Lithuania, Luxembourg, Hungary, Malta, Poland, Portugal, Slovenia, Slovakia, Finland and the United Kingdom. The lower LAU level (formerly NUTS level 5) consists of around 120 000 municipalities or equivalent units in the 28 EU Member States (as of 2013). The aim of the NUTS classification is to ensure that comparable regions appear at the same NUTS level.<sup>3</sup>

NUTS serves as a reference:

- a) for the collection, development and harmonisation of the European Union's regional statistics
- b) for socio-economic analyses of the regions
- c) for the framing of EU regional policies

However for the purpose of this thesis, the need to go into depth is unnecessary, nonetheless the concentration of the Czech Republic's NUTS division is important. For the Czech Republic, NUTS are divided as:

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<sup>3</sup> [35]

Table 1 NUTS division

<b>Territory</b>	<b>Nomenclature</b>	<b>Characteristics</b>	<b>The number in the CR</b>
Czech Republic (1/1193 Coll., Constitution)	NUTS 0	the whole state	1
Czech Republic (1/1193 Coll., Constitution)	NUTS 1	3-7 million inhabitants	1
Cohesive regions (248/2000 Coll.)	NUTS 2	0,8 - 3 million inhabitants	8
Counties [regions](347/1997 Coll.)	NUTS 3	0,15 - 0,8 million inhabitants	14
Districts (36/1960 Coll.)	LAU 1	x	76 (+ 15 Prague districts)
Municipalities (128/2000 Coll.)	LAU 2	x	6253

Source: Minařík, Borůvková, Vystrčil [2013]<sup>4</sup>

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<sup>4</sup> [16] translated

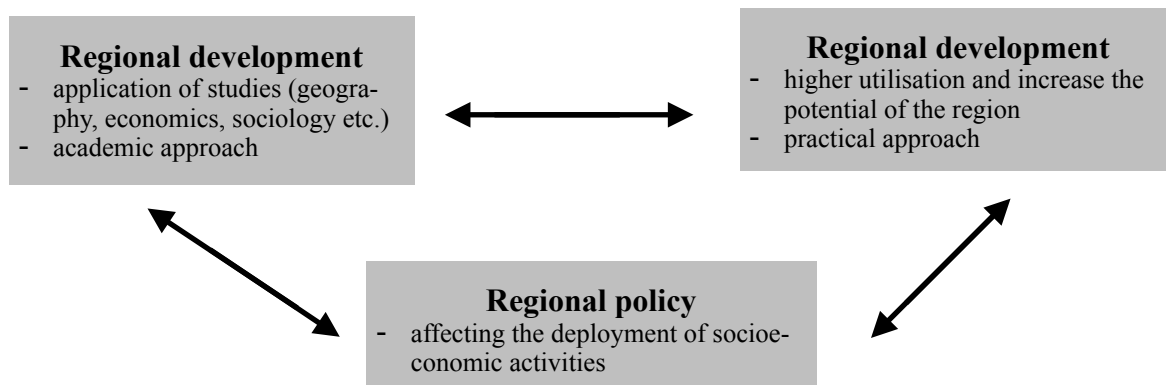
### **3.3 Regional Development and Regional Policy**

Definition of regional development is not fully determined, nonetheless from these two definitions of regional development (shown schematically Figure 1) the difference in the dual nature of the concept of regional development is obvious.

According to a practical understanding of the regional development, the higher utilization and increasing of the potential systematically defined space (territory) resulting from spatial optimization of socio-economic activities and use of natural resources. Region potential can be evaluated using indicators of gross domestic product per capita, unemployment rate, average wages, educational structure, quality and availability of infrastructure and so on. This practical understanding of regional development can be mainly found in the activities of non-academic institutions, i.e. in particular, regional, municipal, local authorities and private companies. (Wokoun, 2008)

On the other hand, academic approach takes regional development as a studies' application, in particular economics, geography and sociology, etc. This understanding of regional development is often called the regionalism and is typical of academic sphere. Sometimes it is also called regional science. However, this term is not correct, because the term regional science is only one of the directions of research on regional development, which was the creation of Walter Isard. Academic concept of regional development creates for regional policy knowledge, which are subsequently used for the practical concept of regional development (effect of higher utilization and increasing the potential of the region). There is a dual understanding of regional development and regional policy, which is depicted in the Figure 1. (Wokoun, 2008)

Figure 1 Dual understanding of regional development and regional policy



Source: Wokoun, 2008<sup>5</sup>

From these two definitions of regional development (shown schematically in the Figure 1) the difference in the dual nature of the concept of regional development is obvious. These concepts and the resulting real activity are largely dependent on each other (interdependent through existing links or common elements), but also to some extent independent, especially in the short and medium term.

According to Wokoun and collection of authors (2008), the basic economic motive of regional policy is the full utilization of all production factors, in particular labor. Social motives of regional policy can be found, for example in the area of housing, the reduction of regional differences which leads to a reduction in rents in areas with strong economic growth and reduces the need for the unemployed to leave the weaker region to region economically more developed.

Regional policy has two basic concepts, which are traditional and modern. Traditional regional policy focuses on reducing regional disparities, uses interregional redistribution, also it focuses on the localization of the capital and use of raw materials. Modern regional policy focuses mainly on issues related to the process of rapid restructuring and innovation promotion. Companies focus on mobilizing their internal resources, information, services, small and medium businesses (Wokoun, 2008). The fundamental law of regional policy in the Czech Republic is the law no. 248/2000 Coll., on regional development support.

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<sup>5</sup> [27] translated



As it was with regional development, there is plenty of definitions of regional policy as well, there are many, none of which has been accepted as generally acceptable. Nevertheless, a general regional policy is defined as a set of objectives, measures and instruments to reduce excessive differences in socio-economic level of individual regions. (Wokoun, 2008)

N. Vanhove and L.H. Klaasen with P. Hall (in Wokoun, 2008, translated) define regional policy in such concept as "regional policy introduces all the public interventions which lead to geographic distribution of economic activities improvement, or rather ones that are trying to rectify certain spatial effects of free market economy to achieve two inter-dependent objectives: economic growth and improvement of social divisions of economic effects".

There are five stages:

- definition of regional issues, including their origin
- defining goals, if possible, quantifiable
- defining a strategy would have to be applied
- identification of tools that will be used
- assessment of used policy

B. Goodall (1972) defines regional policy as "part of the government policy that affects the deployment of major economic resources and activities throughout the national territory or in its part. "

The objectives of regional policy are based on the identification of key regional issues and the concept of state economic policy, in the process each time period leads to their specification if possible, in order to check their performance and simultaneously evaluate the effectiveness of the instruments used. Among the regional policy objectives are as a rule derived instruments of regional policy. The three main instruments (Wokoun, 2003):

- macroeconomic instruments (fiscal policy, monetary policy, protectionism)
- microeconomic tools (reallocation of labor, reallocation of capital)
- other instruments (administrative tools, institutional tools)

# 4 The Economic Analysis

## 4.1 Analysis of the Business Environment

In today's information age, business people must increasingly be able to make sense of their competition, environments, organisations and strategies to be successful. Analysis is a sense-making activity. Successful analysts generate actionable, relevant and timely insights and give that sense to others, who act on it to create a more desirable future for their organisation. Effective management is undergirded by helpful analytical insights. Figuring out how to achieve certain fit or congruence between an organisation and its environment is a critical task.

At minimum, Bensoussan (2008) defines a good analysis of your competition, environment, organisation and strategy as a help to deliver the following benefits to your decision-making:

- early warning of potentially developing opportunities or emerging threats in the competitive environment and more time to address them
- an objective and arm's length assessment of your organization's relative competitive position, strengths and limitation and competencies
- the ability to help the company adapt more quickly and easily to changes in the environment, thereby avoiding typically unpleasant surprises
- this means to base your organization's strategic, marketing and sales or product plans on relevant, actionable and timely insights
- valuable addition to the organization's cumulative base of knowledge and learning
- greater confidence that decisions are based on systematically derived understanding that reduces ambiguity and complexity to acceptably low levels

The driving purpose of performing analysis is to better understand your industry, context and competitors to make better decisions and achieve enhanced results. The output of any analysis should be actionable, future-oriented, and should help decision-makers develop better strategies and tactics.

Question asked quite often is “What do we have to do to get from here to there?” which is really the transition from mission/vision crafting to environmental and organisational analysis, more commonly known as PEST and SWOT analysis. The thesis is however only concentrated on the PEST analysis, which means no need to specify what SWOT analysis means, nonetheless it does not take from the importance of such analysis.

#### **4.1.1 PEST analysis**

The PEST analysis has many different names, and different variants, especially one with the use of environment analysis, which is not used in this thesis so not discussed any further. Sometimes the analysis is called STEEP or PESTE, as stated before depending on the indicators analyzed.

With PEST analysis we look at the environmental influences on the organization. Porter’s five forces model (Porter, 1994) considers the industry sector within which the business operates. However, in formulating strategy there are other external factors that the strategist needs to take into account. This is the function of a PEST analysis. The analysis studies these areas:

- political/legal: monopolies legislation, tax policy, employment law, environmental protection laws, regulations over international trade, government continuity and stability,
- economic: inflation, unemployment, money supply, cost of parts and energy, economic growth trends, the business cycle - national and international,
- sociocultural: population changes - age and geographical distribution, lifestyle changes, educational level, income distribution, attitudes to work/leisure/consumerism,
- technological: new innovations and development, obsolescence, technology transfer, public/private investment in research.

The analysis can be used to identify key environmental factors. These are factors that will have a major long-term influence on strategy. PEST analysis may also be used to identify long-term drivers of change. For instance, globalisation of a business may be driven by globalisation of technology, of information, of the market and of the labour force. In general, a PEST analysis is used to focus on a range of environmental influences outside the organisation and outside the industry that are important to longer-term change, therefore strategy, but may be ignored in the day-to-day decision of the business.

As Henry (2011) stated, a PEST analysis provides useful information about the broad macro-environmental context. The analysis yields a valuable insight into some of the potential risks and uncertainties of a locational decision and it is not unknown for potential investors to commission. To understand the analysis slightly better, the research gave specific questions that should be asked when dealing with this analysis. The questions may differ, however it is a certain outline, which helps to navigate to a good direction.

Every analysis has a different approach to it, a PEST approach is discussed in the table below:

Table 2 PEST approach

<b><u>POLITICAL</u></b>	<b><u>ECONOMIC</u></b>	<b><u>SOCIAL</u></b>	<b><u>TECHNOLOGICAL</u></b>
<ul style="list-style-type: none"> <li>- How stable is the government now and in the future?</li> <li>- Is the political regime favourable to foreign investments?</li> <li>- Is the government tax regime favourable to overseas-owner multinationals?</li> </ul>	<ul style="list-style-type: none"> <li>- Is there a favourable economic framework (e.g. institutions)?</li> <li>- Is the economy likely to remain stable (e.g. inflation rate) over the longer term?</li> <li>- What are the growth prospects for the economy?</li> <li>- Is there a favourable business infrastructure?</li> </ul>	<ul style="list-style-type: none"> <li>- What are the likely public reactions to foreign companies?</li> <li>- Are living standards likely to provide increased market opportunities?</li> <li>- What skills exist within the labour force?</li> </ul>	<ul style="list-style-type: none"> <li>- What is the current state of technological advance?</li> <li>- Is technology transfer feasible (e.g. skills)?</li> <li>- Will the infrastructure (existing/planned) support or hinder the investment process?</li> </ul>

Source: Worthington, 2005

The researcher is aware of the limitations of the PEST analysis, with its aim being to identify and evaluate environmental influences. In most cases, internal influences (e.g., within the organisation or within the industry) are often neglected. Additionally Khosrowpour (2007) avers that, in an unstructured discussion, it may be difficult to identify the exact issue. In addition, the rate of change of PEST factors in the general environment and their increasing unpredictability act to limit the use of PEST analysis. Some have argued that the competitive environment is the only true area for the organisation to analyse since it is the competitive environment that has the greatest impact on a company's markets and products. Whilst there is agreement that the competitive environment has the greatest effect on an organization's ability to achieve competitive advantage, it would be unwise to refrain from analysing the general environment.

## 4.2 Financial Analysis

Financial analysis is a methodology designed to provide data for decision-makers. It is intended to be flexible enough to assist different users in their decisions. Financial analysis rests entirely on the use of financial ratios, which are discussed in length in latter chapter (Riahi-Belkaoui, 1998). Růčková (2008) describes it as an essence of financial analysis that is a continued effort to assess the financial health of the company, both in terms of financial history, or in terms of predicting the future. The aim of both parts of the analysis is whether the company can survive or not. The summary of evaluation indexes are therefore intended to give a summary of overall characteristics of financial and economic situation and business performance with a single number. Their explanatory power is lower and are only suitable for the rapid and global comparison of many companies and can serve as an orientation basis for further evaluation. It is possible to say that a growing number of indicators allows a more detailed view of the situation in the company. However, it may also happen that too many indicators in the system can aggravate the orientation and thus may lead to distorted view of the company by the analyst. Nevertheless, the nature of the construction of the ratios framework is a simple model from the formal point of view. Model, respectively a functional model, has three basic functions:

- explain the impact of change in one or more indicators of the entire management of the company,
- facilitate and streamline the analysis of existing business development,
- provide the basis for selection of right decision in terms of corporate and external objectives.

According to Růčková (2012), financial analysis is a systematic analysis of the obtained data, which are contained primarily in the financial statements, their items, aggregated data and analysis of relationships and trends. The financial analysis covers three time levels of evaluation - assessing corporate past, present time and forecasting of future financial conditions. In a different point of view, the financial analysis can be seen as a way of identifying weaknesses in the corporate financial health, which could in the future lead to issues, and strengths related to possible future appreciation of the assets of the company. Financial

analysis and financial planning is used to assess financial management and overall business performance. Its purpose is to make some conclusions about the overall economic and financial situation of the company and prepare the groundwork for decision making. The main task of the financial analysis is a continuous assessment of the company's economic situation, which is the result of economic, but also non-economic factors and the effects of these factors are taken into account when interpreting the results.

The primary source of information for the preparation of financial analysis are financial statements that enable prediction of future trends and financial plan. There exists wide range of methods of financial analyses and financial analysis features can therefore have any evaluation of the economic situation. The most common users of financial analysis are managers, investors, banks, business partners, employees and competition (Růčková, 2012).

#### **4.2.1 Methods of Financial Analysis**

According to Růžičková (2011), there are different criteria which can set the way of financial analysis. There are four analysis, however the thesis has use only of the two mentioned below. *Technical financial analysis* is based on mathematical and statistical methods. In the field of elementary methods, it is a vertical analysis (structural), within which the evaluation of the development of the individual elements, and horizontal analysis (trend). The most important tools of horizontal analysis include the time series and recognition, respectively. Quantification of trend and cyclical components with simultaneous modulation from random variation.

*Comparative financial analysis* is usually complementary to technical financial analysis. Comparison may be based on a comparison with the so-called standard data indicators. We can easily conclude that this method is applicable, provided that the analyst always keeps in mind the specifics of the economic environment, sectoral specificities, respectively sector and corporate. The standard values may contribute to the creation of the basic concepts of economic and financial situation of the company when assessing the size of the indicators. It may also be used when comparing different companies with comparative base and according to such base is chosen the methodology and evaluation of results. A special "offshoot" of

comparative financial analysis is so called benchmarking, when the company compares itself with the best subject in its field, in order to strengthen their merits and eliminate its weaknesses compared with the "best" firm that represents this "benchmark".

Růžičková (2011) divides the financial analysis depending on the time dimension into either ex-post and ex-ante financial analysis. *Ex-post financial analysis* is oriented retrospectively, which is based on analysis of past data. The information thus obtained are further processed by methods and tools of financial analysis and forwarded to managerial decisions. The utilisation of technical financial analysis phase continues with fundamental financial analysis as to concentrate on the future. *Ex-ante financial analysis*, facing the future, when the credibility of such analysis is considered to be 1-3 years, maximum of 5 years. Thusly, it is not about forecasting, although the exact, mathematical-statistical methods are used, often working with predictive models, so-called bankruptcy or solvency variations, oftentimes having the form of a synthetic indicator of scale-evaluation.

Weygandt (2010) defines these various tools of analysis to evaluate the significance of financial statement data. Three commonly used tools are these:

- Horizontal analysis evaluates a series of financial statement data over a period of time
- Vertical analysis evaluates financial statement data by expressing each item in a financial statement as a percent of a base amount
- Ratio analysis expresses the relationship among selected items of financial statement data

Horizontal analysis is used primarily in intracompany comparisons. Two features in published financial statements facilitate this type of comparison: First, each of the basic financial statements presents comparative financial data for a minimum of two years. Second, a summary of selected financial data is presented for a series of five to ten years or more. This analysis is also called trend analysis, which is a technique for evaluating a series of financial statements over a period of time. Its purpose is to determine the increase or decrease that has taken place. This change may be expressed as either an amount or a percentage.

Vertical analysis is used in both intra- and intercompany comparisons. Vertical analysis, also called common-size analysis, is a technique that expresses each financial statement item as a percent of a base amount. On a balance sheet we might say that total assets are the base



amount. Or on an income statement, the net sales are the base amount. Vertical analysis shows the relative size of each category in the balance sheet/income statement.

Ratio analysis is used in all three types of comparisons. Ratio analysis expresses the relationship among selected items of financial statement data. A ratio expresses the mathematical relationship between one quantity and another. The relationship is expressed in terms of either a percentage, a rate or a simple proportion. Different ratios are discussed later on in the 4.2.3 Financial ratios chapter.

### **Preferences in the selection of indicators of financial analysis**

Financial processes and phenomena, occur throughout the management of the company, are very diverse. Considerable complexity entails their interdependence. Therefore, the indicators, which can be chosen to perform a financial analysis, using the method, are numerous. Like the existing rational requirements on the implementation of financial analysis, similar requirements must be met when selecting indicators which will be applicable in specific conditions with the financial analysis of companies. Růžičková (2011) defines the required characteristics of indicators include:

- Comprehensibility: the construction of indicators should not be as complex as to make it difficult to control the use of outputs. The results of the financial analysis, the indicator values, should be easily interpretable by analysts, as well as managers, who are using such values in their decision-making.

- Unequivocalness (unambiguity): the use of sub-indicators is more frequently used rather than synthetic indicators. Indicator has to give ambiguous output information otherwise it would hinder its use for management.

- Simplicity in sufficient precision: it is necessary to decompose the problem in the decision-making into elementary parts, at the same time cannot be entirely abstracted from connections which are often the cause of non-trivial complexity of phenomena and processes. It is therefore necessary to ensure a balance when using the tools of financial analysis - matching relation so-called "measure of things" - on the one hand, the desirable simplicity and on the other hand, precision without which the financial analysis would lose its effectiveness.

- Significance: the financial analysis has its specific purpose. In relation thereto, tools and methods are used to fully accomplish the analysis. The methods and tools must be adequate to its objectives to attain relevant achievement.

- Non-redundancy is related to the information efficiency. Financial analysis should not produce redundant outputs. Not only does it increase incurred means, but also the redundancy can cause obscurity and more difficult utilisation management. It would therefore reduce the effectiveness of financial analysis.

#### **4.2.2 Sources for processing FA**

Růčková (2008) describes in great detail resources for processing financial analysis as the default and basic source of information for financial analysis, however, especially the following economic statements. Statements of financial accounting, which could otherwise be marked as external reports, providing information especially to external users. The reports provide an overview of the status and structure of asset sources of its coverage (balance sheet), the creation and use of income (profit and loss) and finally, on the movement of cash flows (cash flow statement). Overall, the data for financial analysis can be summarised into three areas:

- Quantifiable non-financial information - containing business statistics mainly engaged in production volume, sales, employment, brochures, consumption standards, internal directives.
- Unquantifiable information - such information may not be quantifiable, but may be in the area of financial management's major impact. This information includes, in particular, the reports of managers of individual departments of the company, commentary of managers, etc.
- Financial information - covers the financial statements and annual reports, internal information, forecasts of financial analysts and company management etc. It is therefore clear that the internal information are not the only falling under the financial information, also the external information belong in such area.

Among the most important documents of a financial analysis are included the financial statements. The financial statements are the default and basic source of information for a financial analysis for all stakeholders inside and outside the company. They are part of the financial statements, which all companies must prepare under the Act. The financial statements are an integral whole and include a balance sheet, profit and loss and attachment, which may include a cash flow statement and statement of changes in equity (Růčková, 2008).

Income statements are sometimes referred to as an Earnings Statement, Statement of operations, Profit and Loss statement, or P&L statement (Director, 2013). No matter how complex the company may be, the logic of an income statement can be nothing more than  $\text{Revenues minus Expenses} = \text{Profit}$ .

Balance Sheet are sometimes described as a snapshot in that they show what the company owned and what it owed on a specific date, the last day of the reporting period. Director (2013) describes it as assessing a company's financial condition, you seek to determine whether it has the financial strength to ride out difficult economic times should it encounter them. On the flipside, you are also interested in whether it has the financial strength to take advantage of any attractive growth opportunities. By contrast, an income statement does not refer to a specific date but to an interval of time.

### **4.2.3 Financial Ratios**

#### **Differential ratios analysis**

According to Růžičková (2011), indicator of net working capital (NWC) in terms of methodological division belongs to a group of differential indicators, however is very closely related to liquidity and often included in the liquidity ratios. For thesis' purposes, the NWC has a separate chapter called differential ratios analysis. *Net working capital* is defined and calculated as current assets minus all current liabilities. The construction of this indicator is closest to the current liquidity ratio. NWC can also be seen as part of the funds that would allow the company to a limited extent continue its activity, i.e. a financial cushion for emergencies.

## **Financial ratio analysis**

Financial ratios (Riahi-Belkaoui, 1998) are more convenient to interpret than financial statement accounts. This convenience is possible because financial ratios represent “significant relationships” amongst various items in financial statements. These financial ratios are then compared to established standard ratios for the firm or other firms in the industry. If the comparison is with similar ratios of the firm over a certain number of years, the analysis is referred to as cross-sectional analysis. Whatever the type of analysis chosen, ratio analysis is intended to evaluate important financial aspects of the firm that depict its financial strengths. Ratio analysis depends to a great extent on data provided by the published financial statements and notes. Gallagher (2007) defines ratios as a comparative measure as it shows relative value and allows the analyst compare the information.

### *Classifying financial ratios*

A financial ratio is a comparison between one bit of financial information and another. We can classify ratios according to the way they are constructed and the financial characteristic they are describing. There are as many different financial ratios as there are possible combinations of items appearing on the income statement, balance sheet and statement of cash flows. Drake (2010) classifies ratios according to the financial characteristic that they value. When we assess a company’s operating performance, a concern is whether the company is applying its assets in an efficient and profitable manner. When an investor assesses a company’s financial condition, a concern is whether the company is able to meet its financial obligations. The investor can use financial ratios to evaluate five aspects of operating performance and financial condition:

1. Liquidity
2. Profitability
3. Activity
4. Financial leverage
5. Return on investment

## Liquidity Ratios

Liquidity ratios are used to assess the ability of the firm to meet its short-term financial obligations when and as they fall due. These ratios are of prime interest to short-term lenders. Both current and quick ratios are the most widely used measures of short-term liquidity but a problem with them is that they are static. They reflect values at a point in time only, i.e., at the balance sheet date (Colombo, 2006). The leverage ratios are composed of 3 separate ratios following:

*Current Ratio* evaluates an enterprise's overall liquidity position, considering current assets and current liabilities. At times, it is desirable to access a more immediate position than that indicated by the current ratio. This ratio is a comparison between assets that can be readily turned into cash - current assets - and the obligations that are due in the near future - current liabilities. A current ratio of 2, or 2:1, means that we have twice as much in current assets as we need to satisfy obligations due in the near future. It is obtained by dividing current assets by current liabilities. A disadvantage of this ratio is that it does not distinguish between different types of current assets, some of which are far more liquid than others.

*Quick (Acid-Test) ratio* is composed of current assets without the inventory divided by current liabilities. The ratio relates the most liquid assets to current liabilities. There is some disagreement about the inclusion of inventory in the numerator because it may be slow moving, obsolete or pledged to specific creditors, and, therefore, not be readily convertible into cash. A value of 1.0 is very strong, which means the company can pay off all its short-term liabilities from its cash balances plus its accounts receivable. The ratio is also industry specific, where grocery store's ratio below 1.0 is substantial and elsewhere not (Gibson, 2013).

*Cash ratio* is computed as cash equivalents and marketable securities divided by current liabilities. The cash ratio indicates the immediate liquidity of the firm. A high cash ratio indicates that the firm is not using its cash to its best advantage. Management may have plans for the cash, such as a building expansion program. A cash ratio that is too low could indicate an immediate problem with paying bills.

## Profitability Ratios

The profitability ratios portray the ability of the firm to efficiently use the capital committed by stockholders and lenders to generate revenues in excess of expenses. These ratios are consequently of interest to both stockholders and bondholders. Profitability is the net result of a number of policies and decisions. For most of these ratios, a higher value is desirable. A higher value means that the company is doing well and it is good at generating profits, revenues and cash flows. Ratios are converted to percentage (Hirschey, 2009). These are the ratios:

*ROA* (return on assets) is a financial ratio that shows the percentage of profit that a company earns in relation to its overall resources (total assets). The ratio of net income to total assets measures the return on total assets after interest and taxes. Return on assets (Gibson, 2013) is calculated by dividing a company's net income by its total assets. When computing the after tax version of ROA, we use net income after tax, the rest is the same.

*ROE* (return on equity) is the ratio that indicates how efficiently the capital supplied by the common stockholders was employed within the firm. This is a measure of the profitability of own funds, reflecting not only economic performance but also financial choices. In another words, ROE is an indicator of company's profitability by measuring how much profit the company generates with the money invested by common stock owners. Return on equity is defined as after-tax earnings over equity. The best is to compare ROE to company's previous figures or the ROE of a similar company.

*ROCE* (return on capital employed) is regarded as a key ratio by many businesses. There is many ways to count ROCE, which mainly depends on the available statement items. The ratio is operating profit divided by long-term capital employed, where long-term capital comprises share capital plus reserves plus long-term borrowings. Another possibility to count these particular ratios is dividing EBIT by total assets minus current liabilities. There is however a limitation to the ratio, it does not account for the depreciation and amortisation of the capital employed.

*Profit margin* is a measure of the percentage of each amount of sales that results in net income. Sometimes called rate of *return on sales (ROS)*. ROS can be used both as a tool to analyse a single company's performance against its past performance, and to compare similar companies' performance in the same industry. An increasing ROS indicates the company is becoming more efficient, while a decreasing ratio could signal looming financial troubles. However, in some instances, a low return on sales can be offset by increased sales. We can compute it by dividing net income or net sales, or another words dividing EBIT by sum of revenues.

### Activity Ratios

Turnover or activity ratios are intended to convey various aspects of operational efficiency. They are generally computed on the basis of a sales figure in the numerator and the balance of an asset in the denominator. Turnover ratio provides information on the effectiveness to which the company puts its asset to use (Troy, 2008).

*Total assets turnover* is also known as an efficiency ratio because it indicates the effectiveness of the company's use of its total assets in generating sales. It is measured by dividing net sales by total assets. When total asset turnover is high, the firm makes its investments work hard in the sense of generating a large amount of sales revenue. If the values are too low, it may be an indication that the business should either utilise its assets in a more efficient manner or sell them. Another turnover to compute is *fixed assets* which is similar, with the difference of the fixed assets in denominator.

*Inventory turnover* measures the liquidity of the inventory. The turnover is defined as sales divided by inventories. The result shows the number of times that the average inventory can be converted into receivable or cash. The ratio reflects both on the quality of the inventory and the efficiency of management. Typically, the higher the turnover rate, the more likely profits will be higher. To get daily inventory turnover, we just divide the turnover by 365. Special note: inventory turnover is not computed for industries in finance, insurance and real estate.

*Receivables Turnover* measures the liquidity of accounts receivables. It indicates the average collection period throughout the year. It is obtained by dividing sales average by net receivables. A popular variant of the receivables turnover ratio is to convert it to an *average collection period* in terms of days (Weygandt,2010). To do so, we divide the receivables turnover ratio into 365 days.

### Leverage Ratios

Leverage ratios are used to assess the long-term solvency risk of the firm, that is, its ability to meet interest and principal payments on long-term obligations as they become due. These ratios are of prime interest to long-term lenders and bondholders (Walsh, 2008). These are the ratios:

*Debt Ratio* (total liabilities to total assets) indicates the company's ability to pay all its debts. It measures the creditors' and owners' of the company's ability to withstand losses. It is an indicator of the long-run solvency of the firm.

*Long-term debt ratio* represents the financial position of the company and the company's ability to meet all its financial requirements. It shows the percentage of a company's assets which are financed with loans and other financial obligations that last over a year. Another version of the ratio is *short-term debt ratio* which is computed by short-term liabilities and short-term loans divided by total assets. The higher the ratio the more important it is for a company to have positive revenue and steady cash flow.

*Self-financing ratio* is a term indicating the company's ability to finance planned investments from its own resources. The formula for self-financing ratio is shareholder's equity divided by total assets. This ratio's percentage and debt ratio percentage should comprise close to 100 %.

*Debt/Equity Ratio* is a classic approach and it is used widely, i.e. all formal interest bearing debt is expressed as a ratio to equity. The greater the debt, the greater the risk. All debt in the balance sheet gives third parties legal claims on the company. Debt costs less than equity funds. The ratio is calculated by taking long-term and short-term liabilities and loans and dividing them with shareholders equity.



*Equity multiplier* is a ratio evaluating a company's ability to use its debt for financing its assets. The common formula used for calculating equity multiplies is total assets divided by shareholder's equity.

*Financial leverage* can be aptly described as the extent to which a business is using the borrowed money. Companies with high leverage are considered to be at risk of bankruptcy nonetheless the financial leverage is always bad but it can lead to difficulties in getting new lenders in future. Financial leverage is calculated as total debt divided by shareholders equity.

*Times interest earned ratio* is determined by dividing earnings before interest and taxes by the interest charges. This ratio measures the extent to which operating income can decline before the firm is unable to meet its annual interest costs. Failure to meet this obligation can bring legal action by the firm's creditors, possibly resulting in bankruptcy.

### **4.3 Bankruptcy Models**

Bankruptcy prediction models are more generally known as measures of financial distress. The best-known, and most-widely used, multiple discriminant analysis method is the one proposed by Edward Altman. Since the work of Beaver (1966) and Altman (1968), bankruptcy prediction have been studied actively by academics and practitioners. This field of risk management continues to be very active, much due to the continuous development of new financial derivatives. Two kinds of models are commonly addressed in the literature. First, there are accounting based models, for example discriminant analysis and logistic regression models. Second, there are market based models, for example Merton models. The selection of the following models was according to the data obtained. Theoretical understanding of the models such as Altman, Taffler and Index IN05 models is quite important. The following description serves as such.

#### **Altman model**

A typical example of comprehensive evaluation index is the "Altman index of financial health" or "Altman model". It is based on calculation of global indexes, respectively overall evaluation indexes. The calculation is determined as the sum of five common financial ratios, which are assigned different weight, of which the largest weight is on the return on total capital, also known as return on net assets.

Altman used the discriminatory method to predict business risk, which is a direct statistical method based on classification of observed objects into two or more defined groups by certain characteristics. Based on this method, Altman determined the weight of the individual ratios, which are included as variables in the model. It can be said, that just as the changing economic situation in individual companies and countries, the model has to adapt during its existence. (Guerard, 2007)

There are two versions of this model, a model for companies that belongs to the group of companies publicly traded on a stock exchange market and a model for companies that do not publicly trade on a stock exchange market. The thesis uses the second modified version of the model. The difference lies only in the values of the weights of the individual ratios in the Altman model entering. The equation reads as:

$$Z = 0.717X1 + 0.847X2 + 3.107X3 + 0.42X4 + 0.998X5$$

where

X1 denotes working capital/total assets

X2 denotes return on net assets [retained earnings]/total assets

X3 denotes EBIT/total assets

X4 denotes net book worth/total liabilities [market value of equity/book value of total liabilities]

X5 denotes sales/total assets

This modified version also differs in the interpretation of results, since the thresholds are shifted slightly lower:

- values lower than 1.2 - bankruptcy line
- values from 1.2 to 2.9 - grey zone area
- values higher than 2.9 - prosperity line

If the value of Z is less than 1.2 then the financial situation of the company is evaluated as problematic, and must be analyzed in detail. Substantial corrective measures should be taken to remove the adverse financial conditions. On the other hand, if the value is higher than 2.90 the business is considered as financially stable in the short term and mildly good horizon, i.e. 2-5 years. It is not wise to automatically rely on short-term positive value of Z, even with the included individual basic financial ratios. Such analysis is necessary to apply each financial year, and check the resulting values and possibly respond immediately as to react to the values, because these actions are more effective and cheaper if applied sooner rather than later, which causes insufficiently flexible substantial correction which delivers effective results with a considerable distance. (Guerard, 2007)

## Index IN05

Inka and Ivan Neumaier are the authors of the four bankruptcy indexes. The origin is on analogous and methodological basis as other solvency and bankruptcy indexes. Unlike the others, these indexes are created and tested on the data of industrial enterprises in the Czech Republic. A key advantage of IN index is their creation in Czech conditions, which implies a higher success rate in their calculation of indexes of data Czech enterprises. (Váchal, 2013) Another great advantage of generating an index in Czech conditions, the uniqueness of used indicators, that are applied in the model based on Czech accounting standards and using the same accounting standards are derived values for these parameters in individual enterprises. Indexes of IN family have been embraced quite well in the theory and practice. There are four indexes in the IN family, namely:

- creditor variant IN95
- proprietary variant IN99
- complex variant IN01
- modified complex variant IN05

The focus of this thesis is on the variant IN05 (Váchal, 2013). This index contains five known indicators (two of them characterise the firm's ability to generate earnings before interest and taxes). The selection and weight of these indicators in the index were determined using discriminant analysis.

$$\text{IN05} = 0.13 * \text{assets} / \text{debt} + 0.04 * \text{EBIT} / \text{interest expense} + 3.97 * \text{EBIT} / \text{assets} + 0.21 * \text{revenues} / \text{assets} + 0.09 * \text{current assets} / \text{short-term liabilities}$$

According to the calculated values, it is possible to predict with high probability the expected development. If the results are:

- $\text{IN05} < 0.9$  company goes bankrupt (with a probability of 86%)
- $0.9 < \text{IN05} < 1.6$  company is in so called "grey zone"
- $\text{IN05} > 1.6$  company creates value with probability of 67%

## Taffler model

Another model in pursuit of the bankruptcy risk of the company is Taffler model or index (Váchal, 2013), first published in 1977. There are two versions of Taffler model, in the basic and in a modified form. The values are interpreted and calculated for indicators and overall scoring accordingly. Both versions, however, use 4 ratios.

Nonetheless, the modified version of the model is used in this thesis. The idea is, that detailed data are not available, which leads to using modified version and differs only in the last entry and also counts for the grey zone:

$$ZT(z) = 0.53 * \text{EBT/short-term debt} + 0.13 * \text{current assets/debts} + 0.18 * \text{StD/TA} + 0.16 * \text{sales/total assets}$$

Rating of the modified Taffler model:

- if the results is less than 0.2 it means high probability of bankruptcy;
- if the results are between <0.2; 0.3> than company is in the grey zone
- if the result is greater than 0.3 it means a small probability of bankruptcy.

## 4.4 Methods of comparisons among companies

The methods discussed here, according to Synek (2009) and Kislingerová (2008), serve for comparison among companies and their financial results. The equivalence is usually compared to average values in the industry (in the number of employees) or with competitors, with the most successful company or with recommended values. For this determination, there are used certain methods such as SWOT analysis, sector's analysis, etc.

According to Kislingerová (2008) these methods are divided into two basic groups due to the extent of indicators. These two groups are described below:

### 1. One-dimensional

One-dimensional methods are based on evaluation of companies according to their order of one indicator. It is necessary to use statistical processing. The most commonly used are economic value added indicator or return on equity indicator.

### 2. Multidimensional

Multidimensional methods differ from one-dimensional methods on the grounds of several indicators not only one of them. Four types of multidimensional methods are mentioned below:

- a) *Method of order* where companies are ordered according to the final results of individual indicators and all values of order are numbered.
- b) *Method of score* is where companies will get points from individual indicators. The maximum value will be got by the best company and other companies will be valued according to the ratio of absolute indicators.
- c) *Method standardized variables* is where companies are compared according to a statistical method especially standard deviation.
- d) *Method distance from a fictitious object* is such a method that shows how many percents the company is behind the imaginary (ideal) object. The ideal object is the best company with a maximum value.

## **Practical Part**

# **5 Methodology**

In the thesis, the balance sheet and income statement (profit and loss statement) of the company are the main sources of information in the years 2006 to 2012. During the processing, the changes that are most important taken into account are the tax and accounting aspects which have changed during the analysed years.

The thesis is divided into two parts. The first, theoretical part, describes the use of financial analysis techniques and methodological tools, indicators, and other components that form the basis for the practical part. The second part, practical part, focuses on the brief characteristics of the analysed company, characteristic of food industry and characteristic of the region, and the actual methods to evaluate the financial health. The computed values are also compared to PAKOSA Chodov a.s., which has similar company value and takes same part in food industry, i.e. dumplings production. Secondly, the average values of financial ratios of companies with 50-249 employees operating in the Czech food industry were compared to the observed company. This comparison explains the situation of the analysed company on the market.

The method is based on the following points:

- Analysis of business environment (PEST analysis)
- Horizontal analysis
- Vertical Analysis
- Differential analysis
- Financial Ratio analysis
- Bankruptcy models

Lastly, the proposal of measures to improve or maintain the current situation in the company is given. This proposal is in the recommendation chapter.

## 6 Characteristic of the company

The analysis of the company will use the fictitious name “Yankee”. In the text, there will only be used the fictional name of the company. The company is purely a Czech company that supplies important part of food chains with its products throughout the Czech Republic and partly also the Slovak Republic.

Table 3 Characteristic of the company

Name (fictitious)	Yankee
Address	Blučina, Cézavy 700
Date of Establishment	9.2.1996
Legal form	Limited company
Scope of business	- manufacturing, trade and services specified in Annexes 1 and 3 of the Trade Act - road transport
Registered capital	3 000 000 CZK

Source: Justice website

In accordance with the Commercial Code, the company is a legal entity registered in the commercial register with main business activity - manufacturing, trade and services specified in Annexes 1 and 3 of the Trade Act, road haulage inland operated vehicles over 3.5 t.

Business activity is mainly focused on the manufacturing of food products, such as dumplings in various designs, frozen food products filled with lumpy fruit, puff pastry, specific kinds of dumplings made to order, seasonal dough products made from potato dough, and additional sales of food products. In addition, there is offer for bio products and health food products - variety of Smackers (different flavours) as well as salads and meat products, protein noodles. The healthy food was initiated with the Project Protein as an innovative technology and part of the priority of the grant program INNOVATION III. of Ministry of Industry and Trade challenge.

Stock is stable and corresponds with the production needs. Work in progress or finished goods are not kept, as it is a product with short necessity and are immediately dispatched to customers. Status goods are kept to a minimum amount, because in this area it is rather a compliance buyers to complete the range from one supplier.



The company's headquarters are concentrated in Blučina, which is mainly concentrated on production, shipping, storage and also administration. In connection with the products delivery, the company has entered into a sublease agreement for product storage in the cadastral district in Kunratice and Libuš, Prague with the specific sign Vimbau. Strategy and objective of the company was to build business contacts with the expanding retail chains in the Czech Republic. This plan is partly a success. The company currently supplies its products to the entire business network such as AHOLD Czech Republic, PLUS - Discount Ltd., SPAR Czech trade company, TESCO Stores CZ, Makro Cash & Carry Czech Republic. This all adds to a number of restaurants, hotels, pensions, canteens, hospitals and retail stores throughout the country. The subsequent distribution of goods throughout Slovak Republic is also very well managed, in accordance with applied standards and regulations. The distribution is also to Slovak Republic, specifically to METRO Cash & Carry Slovakia, PRIMA ZDROJ holding. The distribution is provided by vans and one truck. However, when the load is too much, it is necessary to begin use external carriers. All vehicles are equipped with and automatic cooling system in the cargo space. The current production is primarily focused on packaged products in the fresh refrigerated shelf life of 10 days.

The company has 5 organisational units which consist of operation and production, trade and marketing, economic department, logistics and warehouse, and transportation. However, the company does not have any organisational structure abroad.

The company hold various awards and certificates such as KlasA (national quality mark), Golden Taste South Moravia certificate for organic products, Czech Dumplings - the Czech cuisine pearl, ISO 9001-2000. In 2002, the certificate HACCP (Hazard Analysis Critical Control Points), ISO 9001 and ISO 14001 was acquired, which guarantee compliance with a set of measures of health and hygiene and quality of food products. In 2004, the company received the award for KlasA for meeting extra criteria from the Ministry of Health. Since 2009, the company owns a hygienic standard IFS (International Food Standard), which is defended annually. It is a hygienic standard summarising the requirements for safety, quality and legality of the manufactured products, which are distributed on the market under so-called private label. The company is continuously involved in various specific and regional exhibitions, farmers' market and many others.

# 7 The Environment Analysis

## 7.1 Characteristic of the region

The Czech Republic consists of NUTS, which are properly discussed in the following table. However the characteristic is focused on the South Moravian Region, where the company is established and located.

Table 4 NUTS

NUTS 0	Czech Republic the state
NUTS 1	Czech Republic the territory
NUTS 2	8 cohesive regions
NUTS 3	14 counties (regions)
LAU 1	76 districts and the capital Prague
LAU 2	6 251 villages (municipality)

Source: Czech statistical office<sup>6</sup>

South Moravian Region is delimited by these districts Blansko, Brno-city, Brno-province, Břeclav, Hodonin, Vyškov and Znojmo, which are then divided into 21 administrative districts of municipalities with extended powers. The South Moravian Region ranks at fourth place in the country with the area of 719,479 hectares and a population of more than 1 166 000. Location is geographically quite convenient thanks to its historic connection between southern and northern Europe. Within the EU borders, the region neighbours with Slovakia and Austria, and within the Republic the neighbours are South Bohemian Region, Highlands (Vysočina), Pardubice, Olomouc and Zlín regions. Various natural conditions in the region have an impact on the way land use and the way of life in a particular locality.

Of the total region area, nearly 60% of the land accounts for agricultural land, of which 83% is arable land. The highest degree of cultivation (arable land for agriculture) is located in Vyškov Districts and Znojmo. In terms of production, the agriculture focuses mainly on cereals, oilseed rape and sugar beet. Above-average level of natural assumptions

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<sup>6</sup> [36]

allows to continue the long tradition of specialized agricultural production specific to region features. It is especially viticulture, fruit growing and market gardening. In the region, there are more than 90% of vineyard of the country. Viticulture is mainly developed in the district of Břeclav, where 52% of the area are vineyards, but also in Hodonín, Znojmo and partly Brno-province. Within livestock production, the South Moravian region is one of the leading places for the pig and poultry farming.<sup>7</sup>

The South Moravian Region is one of the regions with significant economic potential. The gross domestic product of the region represents 10.5% of the gross domestic product of the Czech Republic. According to the Czech statistical office, the GDP share, however, does not share the region's population to the population of the Czech Republic, which is 11.1%. Due to the industrial tradition of Brno and its surroundings, the region still has an important position in the region's economy industry, which has a share of total value added of 29.3%, another traditional branch especially of the southern parts of the region is agriculture which only accounts for 2.4%. Construction accounts for 7.9% and emerging services contribute 60.4% to GVA.

South Moravian Region as a whole has a relatively good quality of air. Air pollution, noise and similar unfavourable influences are only of local character, especially in large industrial centres. Hodonín and Brno-province have the highest levels of emissions of pollutants. The increasing number of cars, especially in big cities, accounts for its share of the pollution. There is an increasing number of municipalities connected to the sewage system with sewage treatment plant, which is one of the many ways to improve the strong water pollution of rivers Morava, Dyje and Svatka. Issues of environmental protection in the South Moravian Region received considerable attention.

The population was influenced primarily by migration. In 2012, the total increase was 2 337 people and at the end of the year there were 1 168 650 inhabitants in 673 municipalities in total. Population increase is mainly thanks to the international migration. In a breakdown by sex, the share of women were prevailing, 1000 men accounted for 1,043 women. It is primarily influenced by the structure of Brno, where lives 1000 men for 1074 women. In recent years, South Moravian region has one of the highest life expectancy of

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<sup>7</sup> Czech statistical office [39]

women in the country. In the South Moravian region, the average age is 41.5 years, of which the youngest population is in the village Popůvky in the district of Brno-Country (province) with an average age of 35.0 years, on the other hand the oldest inhabitants live in the village Nelepeč-Žernůvka in the district of Brno-Country(province), who are of average age of 57.6 years. Population density is 162.4 persons per km<sup>2</sup>, which compared to the national average is 29.1 people more. Highest density in the region is in the village Zastávka with 2 084 persons per km<sup>2</sup> and the smallest is Podhradí nad Dyjí with 7.7 persons per km<sup>2</sup>.<sup>8</sup>

An important part of regional cooperation, supported in particular by the Regional Authority of the South Moravian Region is the formation of micro-regions. The formation of micro-regions is an important and positive trend to advance their common interests and goals especially in rural communities with the aim of achieving desirable changes in all municipalities of a particular territory. Furthermore, the cross-border cooperation in Euroregion Morava River is developing, the region unites Weinviertel, South Moravia and western Slovakia. Most of these areas are characterized by intensive agricultural activities. Exception are the urban agglomeration Vienna, Brno and Bratislava, where the concentration is on industrial and commercial activities. The main priority of the development of the South Moravian Region is the development of the Euroregion Morava and cross-border cooperation, support the conceptual development of the area, development of cooperation on the Euro-regional level, particularly in the fields of science, education, healthcare, social services, culture and sport.

Number of employees in the companies based in the region increased slightly in 2012. The average wage 23 094 CZK per natural persons ranks the region below the national average (24 272 CZK). According to data of Ministry of Labor and Social Affairs, the number of job seekers increased in 2012. The proportion of unemployed persons has value of 8.15%, which is still among the highest in the country. South Moravian Region ranked in 10th place out of fourteen regions. Number of vacancies fell by 17.5%. On average, there is 29 candidates for one job vacancy in the region.<sup>9</sup>

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<sup>8</sup> Czech statistical office [39]

<sup>9</sup> Czech statistical office [39]

In terms of transport, the South Moravian Region has an important transit function. The backbone of the transport system consists of motorways D1, D2 and the highways R43 and R52. A major transport hub of roads, highways and rail transport and integrated transport system is in the city of Brno. Civilian airport in Brno - Tuřany can accept all type of aircraft all year round. The region is undergoing two major rail corridors linking of EU countries and the city of Brno, which is a member of the Association of European cities , is interested in building a fast railway.

From the international tourism perspective, the South Moravian Region has a leading position in landscape, cultural and historical sites, such as the Lednice-Valtice site, Moravian Karst and Austerlitz battlefield. Similar position is held by Brno with its cultural monuments. Among the outstanding natural attractions is the National Park Podyjí. The region attracts visitors to a number of important cultural and social attractions which are very beneficial for the development of tourism. The advantages of the region in this regard include wine tourism and unmistakable character of the folklore and a folk culture. Positively, in this direction the cycling tourism operates in South Moravia, even on an international level. The importance of Masaryk Circuit cannot be forgotten either, which annually attracts a large number of domestic and foreign supporters of motor racing.

The region's population has an above-average education level, which has also been contributed by a quality higher education system. Required education is provided for students with both public and private universities in Brno, Znojmo and Lednice, also University of Defence should be mentioned.

## **7.2 Food Industry in the Czech Republic**

Food Industry in the Czech Republic belongs to the traditional manufacturing industry. Its input is a crucial agrarian production, mostly of domestic origin. However, the industry has not exhausted the possibilities of its further development. By increasing the degree of effective processing in agricultural production and placing it above all the domestic and European market will allow the food sector to maintain the productive functions of agriculture in the following years. The food sector as a key link in the chain throughout the daily deliveries to ensure food market, which is considered in terms of standard of living as a significant article of consumer market with strategic importance, which is expressing the national interest.

Maintaining full-fledged functions of the food sector and its further development in the next few years nevertheless will mainly depend on how the sector can adapt to changing conditions of lifestyles in developed European countries, which operate on the food market and require increasingly more processing products, semi-finished products, ready meals, frozen products and more diverse, especially quality and weight range of each foods. Social changes lead to a reduction in the number of household members, increasing the number of women in employment, decrease the transmission of culinary knowledge from generation to generation and expanding requirements for properties of food by increasingly fragmenting consumer groups.

Current trends that will continue to promote and represent the changing demands of the nature of food in the coming years act as the branch structure of the food sector. There are many phases, we are however interested in the second phase which is described in few words. In the second phase of production process, which includes the production of meat, bakery and confectionery products, cocoa, chocolate and confectionery, production of distilled alcoholic beverages, beer, mineral water and soft drinks and table water, the dynamic development can be expected. Progressive trends in the whole group productions can positively affect overall growth performance of the food sector in the coming years.

In the last 15 years there has been extraordinarily significant changes in supply, demand, consumption and nutrition of the population. These changes are accompanied by a high concentration of the food market. Food consumption in the Czech Republic essentially

corresponds to the level and trends of consumption in the EU. Expected development of food consumption may be in greater or smaller part covered from the domestic sources of raw materials and their finalization in the Czech food industry. The share of demand by Czech products and imported products is dependent on whether the Czech food products will be competitive in the market both in quality and price.

The problem of the Czech food industry is often outdated management concept and a low concentration of capital. This reduces the chance of promotion in the market, especially for small and medium businesses. The essence of competitiveness is to change ideas in the management and production about concrete and constant production of a range, which is automatically followed by sales (this is possible only when a shortage of supply), and the production of targeted focus on market requirements. This means creating a marketing strategy based on the decision of the real market position of food products. Marketing strategy must follow the production, technology and last but not least, staffing. The only way to increase the competitiveness of Czech products, in particular build the brand of a product, as well as manufacturers and adjust the personnel structure of companies so that the workers were able to actively participate in the proceedings.

#### *Mill and bakery production*

Position of these traditional outputs with production of staple foods will be based on:

- daily production for meeting the demand in the retail industry to expand its range and specialization manufacturers of baked goods,
- gradual concentration of cereal production and vertical and horizontal networking companies in vertical grain
- existence of a wide spectrum of companies of various sizes throughout the territory with different sales channels

## 7.3 PEST analysis

### Political-legislative factors

The legal environment is made up of a number of laws, amendments to existing laws, decrees and regulations. There are higher demands on the business entities in terms of administrative requirements, continuous monitoring of legislation and adapting to changes in the law that brings with it increased costs. To support the business 19 November 2008, the Government approved a new tax code, which simplifies the administrative process and reduces the administrative burden and costs.

An important event has occurred with the Czech Republic's admittance into the European Union in May 2004. Such step brought a series of legislative changes to harmonize legislation with EU law. A great contribution to the Czech Republic is the opening of the internal market, which comprises the territories of the Member States of the European Union. In the territory of the internal market, there are so-called four basic freedoms: the free movement of goods, persons, services and capital. New markets had opened to the business entities, which not only brings new opportunities, but also threats in the form of increased competition.

The proper functioning of the state is needed to fully fledged government and political stability. The World Bank carries out research, which includes the political stability index, which measures the likelihood of destabilisation or overthrow the government by unconstitutional or violent means, including the national violence and/or terrorism. Political stability index has a normal distribution of mean value equaled to zero, where the values range from -2.5 to 2.5. The research was conducted in the Republic of nine independent sources.

From the legislative standpoint, the importance of food industry laws is key aspect of this factor. The main law is the number 110/1997 coll. about food and cigarette products. However, this is not the only law to abide by. The Food Safety Information Centre (FSIC) is part of the Food Authority of the Ministry of Agriculture which provides the public with accurate and comprehensive information covering the whole food production, also focuses



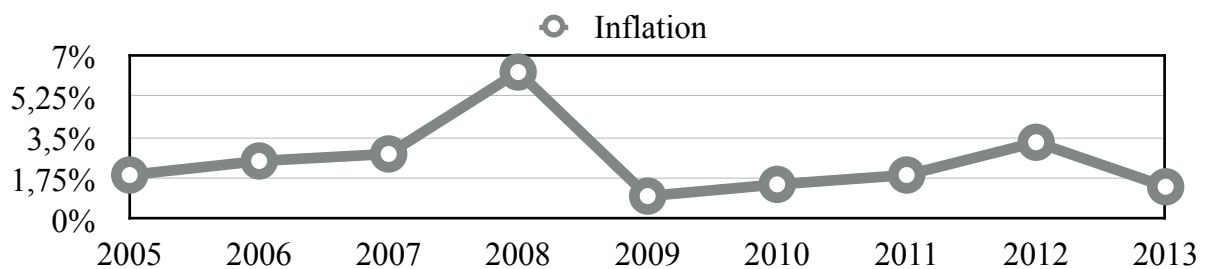
on public nutritional issues. There is the EU legislative, which mainly consists of the hygienic package and GMO legislative. The European Food Safety Authority (EFSA) is committed to ensuring that Europe's food is safe.

### Economic factors

Basic indicators of economic development are listed in the following figures, which has contained data since 2005. Input data were obtained of the Ministry of Finance of the Czech Republic and the Statistical office.

Czech economy is characterised by low and relatively stable inflation, low interest rates and a fully convertible currency. Inflation or the price level has over time been rather growing since 2006 however in the last three years was on the decline. Higher inflation is favourable only for citizens in the long term repaying the loan, which then becomes cheaper. For most people, however, means the loss in the form of higher costs for goods and services and reducing income from savings and investments. In terms of the conditions for the functioning of the corporate sector, the Czech banking sector has somewhat lower level of competition. Banks benefited primarily from an increase in interest margins in 2009, even in an environment of declining interbank rates. The average annual inflation rate differed from 1.0 % to 6.3% rate. Average inflation for the last 9 years is published in the Figure 2.

Figure 2 Inflation

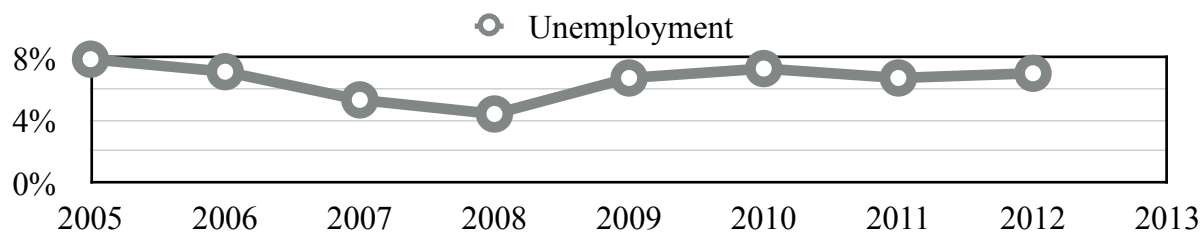


Source: Czech statistical office<sup>10</sup>

<sup>10</sup> [33]

General unemployment rate, which is calculated by dividing the number of unemployed to the total labor force has downward trend since 2006. This positive development was associated with the growth of the economy. However the trend has ended up increasing since 2008 as seen in Figure 3.

Figure 3 Unemployment

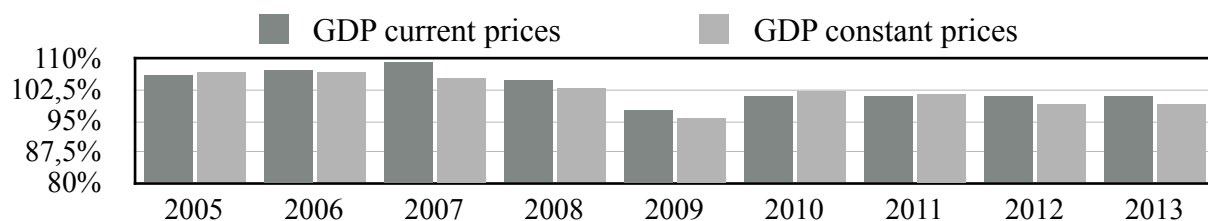


Source: Czech statistical office<sup>11</sup>

The positive development of the Czech economy can be captured by using exchange rates in recent years which have shown decreasing tendency due to the strengthening of the Czech currency. A growing economy, a skilled workforce and low price level attracts foreign investors, leading to appreciation of the domestic currency.

One of the indicators of financial stability is the growth in real GDP. Since 2006, the real GDP growth in the Czech Republic and EU had downward trend, but the growth in real GDP of the Czech Republic takes over the reporting period of higher values. The chart in Figure 4 represents the evolution of GDP prices throughout the 9 year period. The low tendency is quite visible in the last 4 years of the period.

Figure 4 GDP

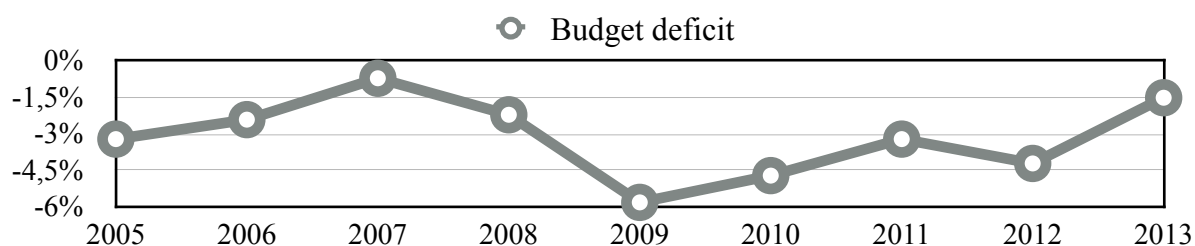


Source: Czech statistical office

<sup>11</sup> [42]

Budget deficit (see Figure 5), or public debt, was developing more positively in comparison with EU. In the 9-year period, the deficit was on the lowest level in 2009 however it grew more positive over the last few years. Researching and regarding the debt values, it is obvious the values keep increasing each year.

Figure 5 Budget deficit



Source: Finance<sup>12</sup>

The Czech Republic achieves better or comparable results with the European Union and, as regards the foreign trade balance shows a distinctively positive value against the EU average. Exports may weaken the strengthening Czech currency, the Czech manufacturer is therefore preferable to trade in euro, which is stable. Stable exchange rate of the Czech crown against the euro strengthens import-export business with countries with which the Czech Republic most trades hence Germany and Slovakia. For our purpose, Slovakia's the biggest ally.

### Social factors

Among the social factors are classified demographic, socio-cultural factors. The demographic development of the population of the Czech Republic highlights mainly the changing age structure. In the Czech Republic, there was recorded 10 505 445 inhabitants<sup>13</sup> in 2012. Within the scope of the company, South Moravia, survives 1 227 668 inhabitants<sup>14</sup>. Overall, the number of divorces and abortions decreased, however the number of deceased increased as well as immigrants and emigrants. Lastly, the number of marriages and births

<sup>12</sup> [43]

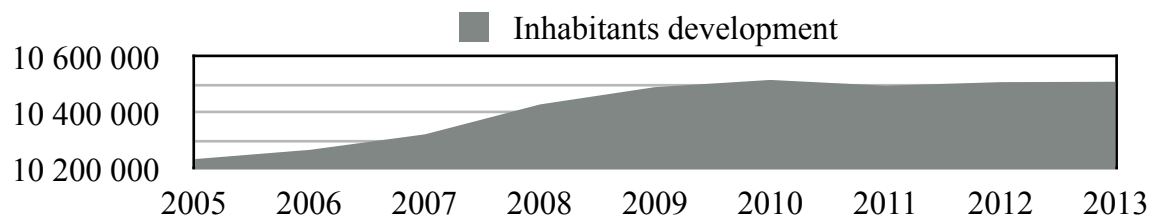
<sup>13</sup> Czech statistical office [35]

<sup>14</sup> Czech statistical office [35]

stagnated somewhat. The figures below represent all the development in the years of 2005 through 2013.

The Figure 6 represents the development of inhabitants, its increases or decreases. On a first glance, it is obvious the development was positive, the number of inhabitants has grown exponentially since 2005. In the last few observed years, the development was stable, more or less constant with no extremes.

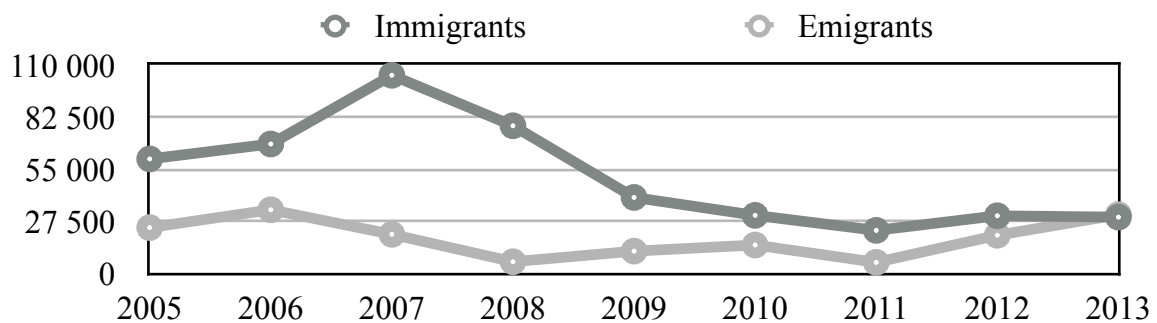
Figure 6 Inhabitants development



Source: Czech statistical office<sup>15</sup>

As it was stated above, the numbers of immigrants and emigrants increased in the last three years of the observed period. To state the obvious, the first years of the figure 7 shows quite high numbers and large immigrant/emigrant development in the Czech Republic. In hindsight, the use of immigrants is quite steep in the Czech Republic. However, this is not the case of the discussed company in particular.

Figure 7 Immigrants and Emigrants



Source: Czech statistical office<sup>16</sup>

<sup>15</sup> [32]

<sup>16</sup> [32]

In the framework of the EU-SILC (European Union - Statistics on Income and Living Conditions), the statistics are mandatory for all the Member States. Its main purpose is to obtain long-term comparable data on the social situation of the population in European countries. At the national level, the results are used for targeted social policies of the state and to assess its impact on the living standards of citizens. Net annual cash income of households per capita has nominally increased but fell in real terms. In connection with the changes in the tax system, the differentiation of income decreased and the risk of income poverty rate was reduced to 8.5%. The 2012 change in tax system meant negligible affect on household incomes. For example, the cancellation of “flood tax”. At the same time, the tax credit for dependent children increased. These changes reduces the tax burden on working people.

Another indicator related to the standard of living of the population is education, which affects the quality of job applicants and is becoming a prerequisite for economic and social development.

### **Technological sphere**

In today's globalised world, it is inconceivable that the economy continues to develop without using technology. With the development of science, research and human knowledge leads to new discoveries and innovations in the field of information technology, industry, construction, agriculture and more. With advanced technology and modern production methods the industry can achieve higher productivity, higher quality products and lower production costs. These are just some of the reasons why companies also are investing significant resources into research and development. One of the indicators reflects the level of technological development, the number of patent applications.

In regard to our observed company, there are plenty of tests to help with the quality of a product, which is taken every year. There are new technologies to test for issues with the product or production itself. Making sure, the technology is up to date.

Nowadays, information and communications technology plays a particularly very important role. The company cannot properly work without cell phone or access to the Internet as such things stand for quality and rapid transmission of information which is becoming a key success factor in this generation.

# 8 Financial Analysis

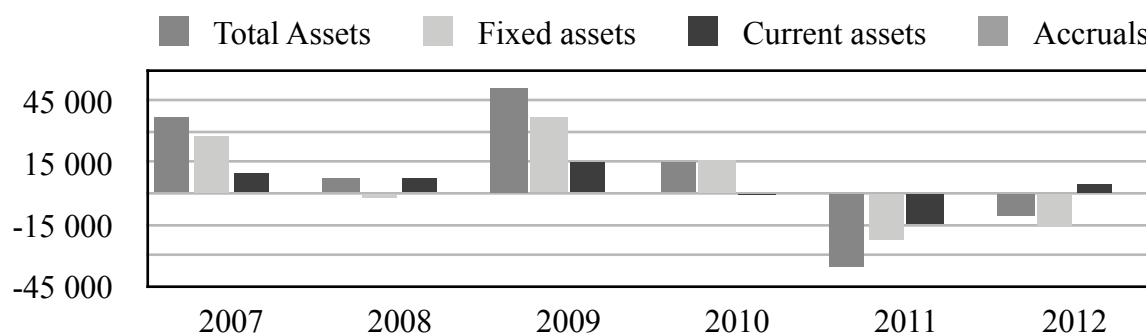
## 8.1 Horizontal Analysis

### 8.1.1 Horizontal Analysis of Balance Sheet

The final results of the horizontal analysis of the balance sheet are available in the attachments. The chart in Figure 8 expresses the absolute change in the reviewed years and for better understanding a table is available with both absolute and relative change below.

In the following Figure 8, there is representation of assets development over the observed period. There is no visible trend in the observed period. The asset development is rather variable.

Figure 8 Horizontal analysis of assets



Source: author's computations based on financial statements of the company

The highest absolute amount of *total assets* was exactly 51 532 CZK in 2009 when the increase compared to previous year was precisely 47%. The lowest absolute value of total assets is -36 061 CZK in 2011 with relative change of -20.5%. Since the first observed year, 2007, to the last observed year, 2012, the amount decreased by 48 507 CZK. The average amount of all the observed years was 10 563 CZK.

The total assets consist of fixed assets and current assets. Both assets have rather fluctuating tendencies. *Fixed assets* has primarily higher contribution in total assets than the current assets. The highest value occurred with a relative change of 54.4% (36 986 CZK) in 2009. On the other hand, the lowest amount had a relative change of -18.3% (-22 211 CZK)

in 2011. On average, fixed assets values at 6 879 CZK. *Current assets* had quite a low value in 2010 and 2011, however 2011 was the lowest occurrence with -15 016 CZK. Averagely, the current assets were made of 3 313 CZK.

*Accruals* are usually in low values and the tendencies are more or less fluctuating. The highest amount occurred with 172% change in 2008 (1 217 CZK). Minimal amount was -614 CZK in the year 2010.

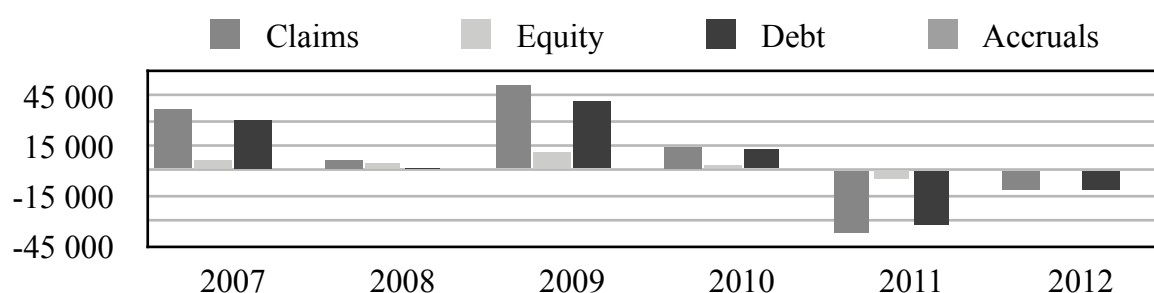
Table 5 Horizontal analysis of assets

	2007		2008		2009		2010		2011		2012	
	absolute change (thousands CZK)	relative change (%)	absolute change (thousands CZK)	relative change (%)	absolute change (thousands CZK)	relative change (%)	absolute change (thousands CZK)	relative change (%)	absolute change (thousands CZK)	relative change (%)	absolute change (thousands CZK)	relative change (%)
<b>Total Assets</b>	37 336	57.1%	6 963	6.8%	51 532	47%	14 782	9.2%	-36 061	-20.5%	-11 171	-8%
<b>Fixed assets</b>	27 778	66.7%	-1 443	-2.1%	36 986	54.4%	16 389	15.6%	-22 211	-18.3%	-16 225	-16.4%
<b>Current assets</b>	9 409	40.5%	7 189	22%	14 390	36.1%	-993	-1.8%	-15 016	-28.2%	4 901	12.8%
<b>Accruals</b>	149	26.8%	1 217	172.4%	156	8.1%	-614	-29.5%	1 166	79.6%	183	7%

Source: author's computations based on financial statements of the company

In the following chart in Figure 9 and then table is a representation of a horizontal analysis of liabilities values of the reviewed years. As it was stated above, the full horizontal analysis of the balance sheet is available in the attachment. Overall the observed years, the changes were again fluctuating in mostly positive values, however in the year 2011 and 2012 the numbers moved to the negative values.

Figure 9 Horizontal analysis of liabilities



Source: author's computations based on financial statements of the company

The development of *claims* was overall increasing except the year 2011, which had a decrease of 20.5%. The highest absolute amount change occurred in 2008 (51 532 CZK), however the relative change was highest between years 2006 and 2007 with a change of 57.1%.

*Equity* development was rather similar to claims. As it is obvious from the Figure 9, in 2011 there was a negative change of -4 158 CZK and almost zero relative change between 2011 and 2012 (0.3%), which is the lowest value in all the observed years. *Debts* are used to innovate the technological growth. The development of debts is easily visible. In the latter observed years, the values are in the positive numbers with the highest value change occurring in 2009 (40 918 CZK). The lowest change of debts was between the years 2010 and 2011 with -24.3%. Averagely, the debts values at 7 170 CZK.

*Accruals* are usually beneath the thousand czech crowns. The values are at maximum in 2008 (499 CZK) with a 157.9% change to previous year. The lowest value occurred in 2010 (-48 CZK).

Table 6 Horizontal analysis of liabilities

	2007		2008		2009		2010		2011		2012	
	absolute change (thousands CZK)	relative change (%)	absolute change (thousands CZK)	relative change (%)	absolute change (thousands CZK)	relative change (%)	absolute change (thousands CZK)	relative change (%)	absolute change (thousands CZK)	relative change (%)	absolute change (thousands CZK)	relative change (%)
<b>Claims</b>	37 336	57.1%	6 963	6.8%	51 532	47%	14 782	9.2%	-36 061	-20.5%	-11 171	-8%
<b>Equity</b>	6 868	33.4%	4 202	15.7%	11 381	36.8%	2 396	5.7%	-4 158	-9.3%	113	0.3%
<b>Debts</b>	30 618	67.8%	2 262	3%	40 918	52.4%	12 434	10.5%	-31 943	-24.3%	-11 270	-11.3%
<b>Accruals</b>	32	11.3%	499	157.9%	-767	-94.1%	-48	-100%	40	0,0%	-14	-35%

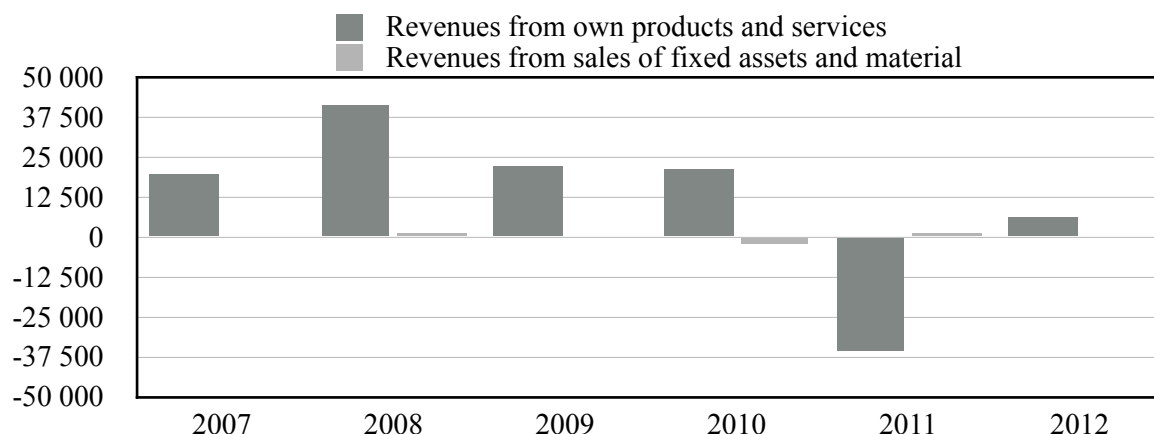
Source: author's computations based on financial statements of the company



### 8.1.2 Horizontal Analysis of Income Statements

The final results of the horizontal analysis of income statements are contained in the attachment. The development of *revenues from own products and services* had consistent tendencies, however one inconsistency occurred in 2011 with an extreme change from positive values to negative values (-35 085 CZK). A turnaround occurred in the latest observed year, 2012, with the change of 3.6%. In the percentile change, the highest relative value came about in 2008 with 33.7% change. The average value of revenues from own products and services was 12 786 CZK. *Revenues from the sale of fixed assets and material* is an entirely different story, considering the revenues are the eliminated assets. The values are rather inconsistent and low. The highest value was of 1 639 CZK in 2008 which is 327.1% relative change. The lowest change occurred in 2010 (-2 243 CZK). On average, the revenues change was 144 CZK.

Figure10 Horizontal analysis of revenues



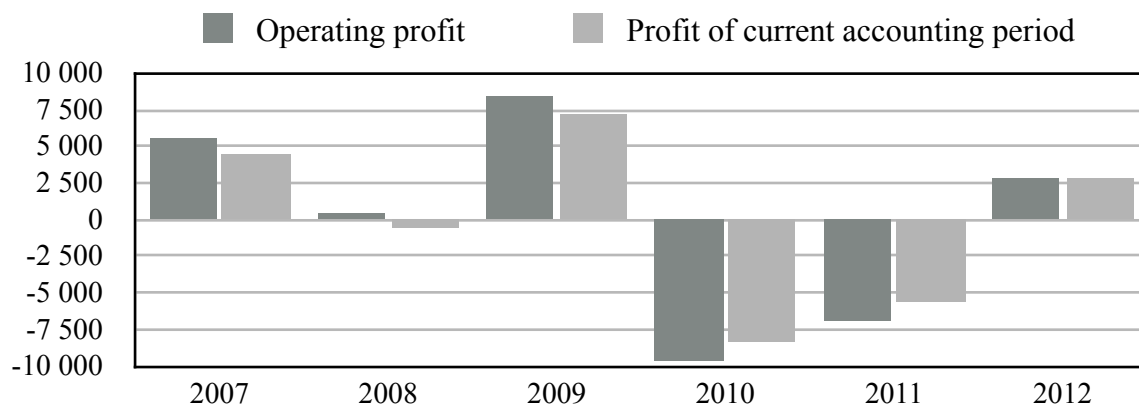
Source: author's computations based on financial statements of the company

Either of the represented values have similar tendencies in Figure 11. The *operating profit* maximal value occurs in the year 2009 with 8 362 CZK. The development of profit is variable in all the observed years and in many years negative with obvious loss. The average value of operating profit was 76 CZK.

*Profit of current accounting period* had an unfortunate fluctuating trends. It is quite easily obvious from the Figure 11, the profit is in positive values one year and the following ends in negative values. The lowest value occurred in 2010 (-8 412 CZK). The last reviewed year (2012) had an increasing tendency and moved from the negative values to positive of 2 714 CZK. The change in profits had negative values in 2008. The average value change of profit of current accounting period was -32 CZK.

The values are rather inconsistent as it had been already stated, however the last reviewed year shows pleasant positive values with increasing profits, which is eventually also possible to see in other calculated analyses.

Figure 11 Horizontal analysis of profit



Source: author's computations based on financial statements of the company

## 8.2 Vertical Analysis

### 8.2.1 Vertical Analysis of Balance Sheet

#### The vertical analysis of balance sheet of assets

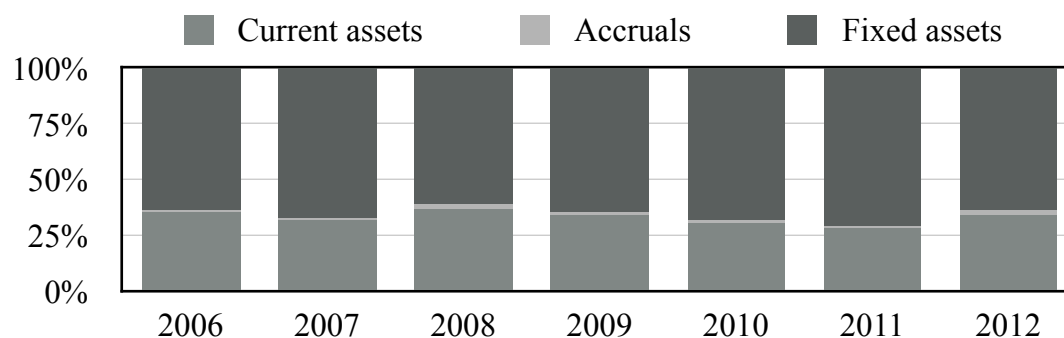
The results are shown in the chart in Figure 12 below, and the full analysis is available in the attachment.

The basis for the calculation of an appropriate type of assets is total assets. Throughout the analysis of individual items of spoken assets, it was observed that *fixed assets* have the most significant role and pull the most weight of the total assets (over 60% in all the observed years). The most significant year for fixed assets was in 2011 when the weight of such item was 70.8%. The lowest weight of fixed assets was in the year 2008 (61.8%). On average, fixed assets occupied 66% of total assets. The tangible assets have 99% share in all the fixed assets.

*Current assets* have less significant role, usually around 30% out of the total assets. Approximately, the value was 32.6% in all the observed years. Part of these assets are inventory, long-term, short-term receivables and short-term financial assets. There are no long-term receivable, however small amount of inventory has share in the current assets, around 4% on average. Lastly, both short-term assets have fifty-fifty share in current assets. The short-term financial assets had been having an increasing tendency in the last few observed years.

*Accruals* had such a small share in the total assets count, it is barely visible in Figure 12. The value was approximately 1.4% during all the observed years.

Figure 12 Vertical analysis of assets



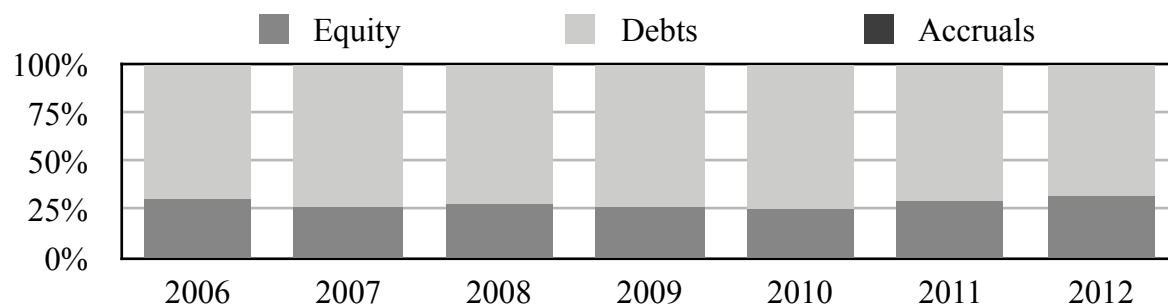
Source: author's computations based on financial statements of the company

### The vertical analysis of balance sheet of liabilities

The basis of calculation for this particular type are liabilities. It is quite evident that the company is composed mainly of *debts* from the vertical analysis. Most of the debts are composed of bank loans (usually amounts for 60% of debt assets). Another high-weight asset is trade payables with about 35% of significance. Long-term payables have negligible importance. Debts amount for 70% of all the liabilities. The highest value occurred in 2010 (74.6%). The lowest value is visible in the year 2012. Considering the use of debts, the company knows the way to use their money and does not leave the equity lying around.

*Equity* values are quite stable, there is almost no variability. The values are usually at 30% in all the observed years. The development of equity is consistent. The lowest value is visible in 2010 (25.4%). The value slightly increased in the year 2012 due to mortgage for innovation. *Accruals* had almost no significance in liabilities. In 2010, the values were at 0%. The maximum amount for 0.7% in the year 2008, which is not even visible in Figure 13.

Figure 13 Vertical analysis of liabilities



Source: author's computations based on financial statements of the company

### **8.2.2 Vertical Analysis of Income Statements**

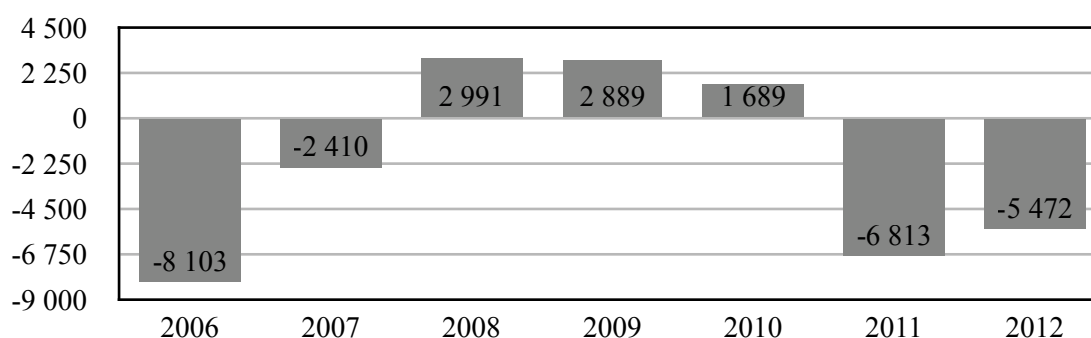
The calculations are available in the attachment, which contains the final results of vertical analysis of the income statements. The results were quite negligible thus it is only discussed here not represented by a chart. The basis for the calculation of appropriate type is total revenues. Revenues are specifically formed by *revenues from sold goods* and *revenues from own products and services*. The rate of revenues from sold goods is quite low, barely visible. There occurred two high points in the sold goods such as 1.2% (2012) and 1.3% (2008) however the lowest rate was possible to see in the first two observed years. Revenues from own products and services is taking much larger part in their overall revenues, on average 99.3%. The rest of the calculated values are in the attachment.

## 8.3 The Analysis of Differential Ratios

### 8.3.1 The Net Working Capital

The final results of net working capital are available in the attachment. The company's net working capital (NWC) is the amount of money which is available to spend on its day-to-day business operations, such as paying short term bills and buying inventory. Having higher net working capital helps a company run its business. Although, it can be more profitable to have a negative value of the net working capital from the cheaper short-term sources point of view, from the stability point of view it is required to have the net working capital in positive value.

Figure 14 Net working capital



Source: author's computations based on financial statements of the company

The values have not been favourable in the past two computed years. The most negative NWC occurred in the year 2006, which meant use of supplier's credit as a source of capital. Overall, the negative NWC is not such an inconvenient issue as a number of firms have used similar strategy to grow. However, it is not advisable to continue such a strategy in a longer period. In the selected period, the NWC had been also positive for few years, which shows a different strategy and ability to pay in time. Short term financial assets had been increasing over the observed period, however it was the same amount over the last three years. The current assets had few low points, that is in 2006 and 2007 and 2011. Short term payables had had the same issue in the same years. The biggest change and rise occurred between the years 2008 and 2009 in particular assets. The value of the short term payable increased by 9 492 CZK and at the same time the value of short term financial assets by exactly 5 000 CZK. In the computed years, the highest decrease was between the years 2010 and 2011, in both current assets, which makes a decrease of 15 016 CZK, and short term payables of 6 514 CZK decrease.

## 8.4 The Analysis of Financial Ratios

### 8.4.1 The Liquidity Ratios

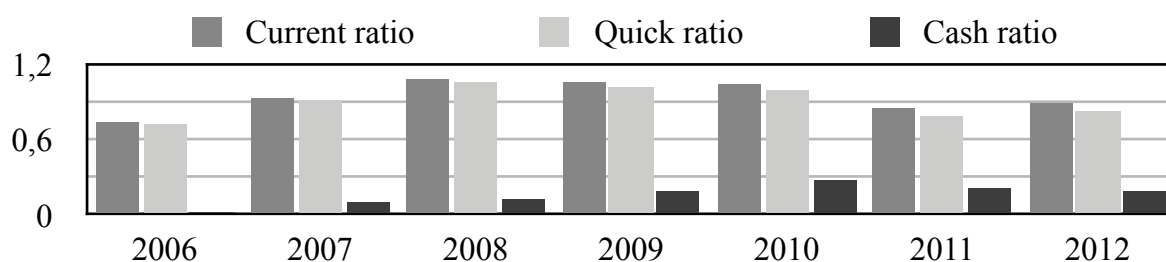
Current liquidity, quick liquidity and cash liquidity are all included in the liquidity ratio analyses. The computed values are displayed in the Figure 15 and in an attachment in more detailed analyses.

*Current liquidity* tells how many times the company is able to pay its short-term payables when all the current assets will be monetised. The optimum value is 2.0 (Colombo, 2006). The optimum has never been reached over the computed time period. The highest values of current liquidity was in 2008 (1.08) and the lowest value of such liquidity was in 2006 (0.74). Generally, the year 2006 was not the best. Such low values can only mean the disability to meet current obligations, however it does not indicate a critical problem.

*Quick ratio* specifies whether the assets can be quickly converted into cash are sufficient to cover current liabilities. The values of quick liquidity are similar to the current liquidity values. However, the optimum is 1 - 1.5 (Gallagher, 2007), which still means the company only reached the optimum in 2008 and 2009 (1.06 and 1.02). The company's quick liquidity means they are meeting in the middle, they are not relying too much on inventory, which has low value itself and they do not keep too much cash. The years 2006 and 2011 was the time the company relied too much on such asset as the values decreased to about 0.72.

*Cash liquidity* expresses the ability to pay short-term payables from short-term financial assets; immediate amount of cash available. The optimum is between 0.2 - 0.5 (Gibson, 2013). The company has been either right under the optimum or just above the 0.2 optimum. The highest cash liquidity value was in 2010 (0.28). The lowest cash liquidity occurred in the year 2006 (0.03).

Figure 15 Liquidity ratios



Source: author's computations based on financial statements of the company

The conclusion to the liquidity of the observed company is rather unsatisfying however the results may have been worse and leaving the company worse off. The current liquidity shows an inability to meet current obligations, however the quick liquidity tells us the ability to turn assets into cash. According to the results, and review of statements, it is obvious there is no to little inventory; the reason is the quick turnover of inventory and considering the need to sell the product as soon as possible. The company has enough liquidity to function and is actually well off.

### Comparison with the competitor

The liquidity ratios of both companies are quite similar, as it is obvious in the table 7. The difference between current liquidity in these companies is just 0.09. The difference is barely noticeable. PAKOSA company's 1 CZK of short-term payables accounts for 0.80 of current assets. In case of Yankee company, the 1 CZK accounts for 0.89 of current assets. The quick liquidity's results are similar and not discussed in any length.

In account of cash liquidity, PAKOSA has a leading position with the optimum 0.26 and is over the recommended optimum value. Companies differ by 0.07 where Yankee company is worse off.

Table 7 Comparison of liquidity ratios with the competitor

Liquidity Ratios	Yankee	PAKOSA Chodov a.s.	Variance
Current liquidity	0.89	0.80	0.09
Quick liquidity	0.83	0.73	0.1
Cash liquidity	0.19	0.26	-0.07

Source: author's computations based on financial statements of the company



### Comparison (average of the medium sized companies)

The difference between Yankee company and the average are instantly visible. Current liquidity has the highest variation with the value 1.12, which leads to the understanding that on average the medium sized companies' 1 CZK of short-term payables accounts for 1.12 more of current assets than Yankee's. Both quick liquidity and cash liquidity have resulted in the industry's advantage with more liquid assets than the Yankee company.

Table 8 Comparison of liquidity ratios with industry's average

Liquidity Ratios	Yankee	Average	Variance
Current liquidity	0.89	2.01	1.12
Quick liquidity	0.83	1.49	0.66
Cash liquidity	0.19	0.5	0.31

Source: author's computations based on financial statements of the company

### 8.4.2 The Leverage Ratios

The leverage ratio is, in a way, a solvency ratio that measures a company's total liabilities as a percentage of its total assets, whether the company is able to pay off its liabilities with its assets. The table and figures available below show the selected leverage ratios.

Table 9 The Leverage ratios

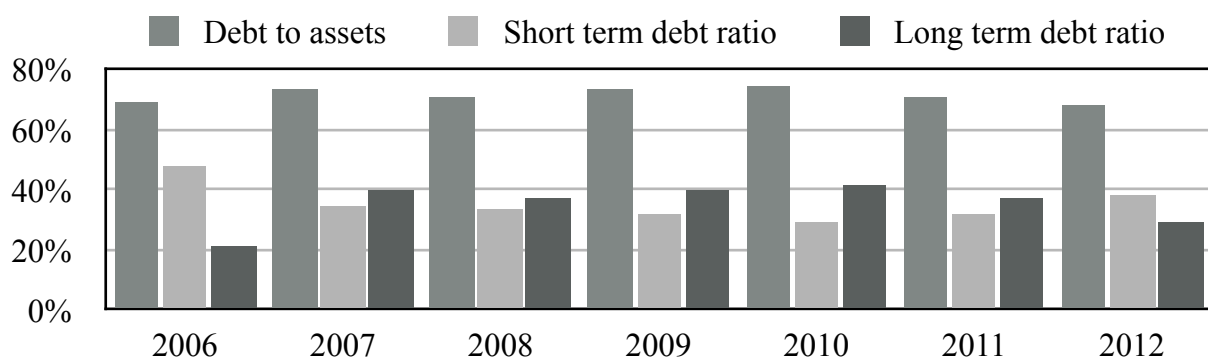
Leverage Ratios	2006	2007	2008	2009	2010	2011	2012
Debt ratio	69%	73.7%	71.1%	73.8%	74.6%	71%	68.4%
Long-term debt ratio	21.11%	39.61%	37.53%	40.07%	41.66%	36.77%	28.91%
Short-term debt ratio	47.90%	34.11%	33.58%	31.83%	29.28%	32.17%	37.72%
Self-financing ratio	31%	26%	28%	26%	25%	29%	32%
Debt-equity ratio	2.26	2.84	2.53	2.74	2.80	2.38	2.11
Equity multiplier	3.27	3.85	3.55	3.82	3.94	3.46	3.17
Financial Leverage	2.26	2.84	2.53	2.81	2.94	2.46	2.17
Times interest earned	1.29	6.56	3.24	7.49	2.32	-0,09	1.01

Source: author's computations based on financial statements of the company

*Debt to assets* or also known as debt ratio was overall the observed years quite consistent with values between 68% to 75%. The ratio is slightly higher, however it is still quite reasonable. The highest value accounted for 74.6% in 2010. The company has the ability to finance its development and innovate in the right way. The lowest ratio had the amount of 68.4% in the last observed year, 2012. Generally, it is not exactly positive to have higher debt to asset values for the creditors that take it as high risk. However, the company has been able to payoff their debts evenly. It is quite obvious, the debt share is rather larger than the self financing ability. The average value of self-financing ratio reached 28%.

The next described debt ratio is quite obvious from the Figure 16. *Long-term debt to assets ratio* is almost similar to short-term debt ratio mainly due to the fact the observed company has had similar absolute values as the short term. The highest value occurred in 2010 with 41.66%. In the last couple of observed years, the ratio decreased under the 40% line. The observed values tell us the company has 0.4 CZK as a long term debt for every czech crown it has in assets. The lowest value occurred in the first observed year, 2006, which was actually opposite to the short-term debt as is obvious from the Figure below. *Short-term debt to assets ratio* similar values, as is stated again. The highest observed value in the reviewed period was in 2006, the first reviewed year. The value read at 47.90%. The values of the short-term debt to assets ratio have not been variable very much over the observed period.

Figure 16 Debt ratios

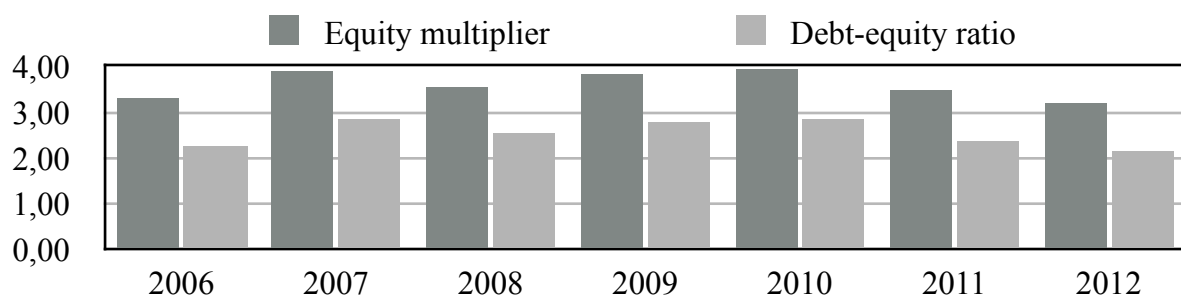


Source: author's computations based on financial statements of the company

*Equity multiplier* is showing the observed company's assets financed or owed by the shareholders. The company has a higher multiplier which states they rely more heavily on debt to finance its assets, which is just a confirmation of the previous ratio. The values were always above 3. The highest value amounts for 3.94 in 2010, which accounts for such a high ratio. In 2012, there is a positive change to slightly lower value of 3.17.

*Debt-equity ratio* helps to judge the observed company's financial standing and ability to repay its obligations. The ratio had been more or less stable in all the observed years. Slight decrease has been obvious since 2010, which generally says its being financed by own financial sources more often rather than by creditors. The ratio optimum differs quite often from industry to industry, however the ratio of 2 does not have to be thought of as bad in this case. The company is able to pay its obligations nonetheless.

Figure 17 Equity ratios



Source: author's computations based on financial statements of the company

The company's observed *financial leverage* is quite high, which states a higher levels of liabilities and is considered highly leveraged and more risky for lenders. The tendency is rather consistent with decreasing trend in the last two observed years. The highest financial leverage value amounted for 2.94 and occurred in 2010. On average, the value was at 2.56 ratio. The lowest value occurred in the last reviewed year with value of 2.17.

## Comparison with the competitor

Comparing the leverage ratios to the competitor PAKOSA Chodov a.s. showed the observed company at much better state, rest of the data is available in the attachment. The debt ratio is much larger for the competitor. The difference is -31.1% in favour of the Yankee company. The table also shows the competitor is using more short-term debt rather than the long-term debt. The long-term financing difference is quite small in favour of the competitor by 2.2%. According to the values, Yankee uses more self-financing than PAKOSA Chodov a.s. with the difference of 31%. Even though, the competitor uses much higher debt financing it does not implicitly mean the observed company is not using as much. According the analysis, the observed company uses quite enough of debt financing with ability to pay up. In a way, it is possible to see that in this industry it is important to use different source of financing than just own assets. Both companies use over 50% of debt financing in their business.

Table 10 Comparison of leverage ratios with the competitor

Leverage Ratios	Yankee	PAKOSA Chodov a.s.	Variance
Debt ratio	68.4%	99.5%	-31.1%
Long-term debt ratio	28.91%	26.7%	2.2%
Short-term debt ratio	37.72%	64.8%	-27%
Self-financing ratio	31.53%	0.488%	31%
Debt-equity ratio	2.11	187.3	-185.2
Equity multiplier	3.17	204.8	-201.6
Times interest earned	1.01	1.04	-0.03
Financial leverage	2.17	187.3	-185.2

Source: author's computations based on financial statements of the company

### Comparison (average of the medium sized companies)

Comparing the leverage ratios to the average of the industry's medium sized companies and Yankee, there is quite a few high differences, however couple of the ratios are quite similar, which in hindsight tells us something about the industry itself. Examples of the similar ratios are debt, long-term debt, short-term debt and self-financing ratios. It is obvious from the table below, that Yankee company uses more debt to finance its enterprise than the computed average is. The difference is not as high however it is not negligible either. The financial leverage average of the industry's medium sized companies is visibly higher, which states a higher levels of liabilities and is rather risky for lenders.

Table 11 Comparison of leverage ratios with industry's average

Leverage Ratios	Yankee	Average	Variance
Debt ratio	68.4%	55.73%	-12.67%
Long-term debt ratio	28.91%	22.75%	-6.16%
Short-term debt ratio	37.72%	29.2%	-8.52%
Self-financing ratio	31.53%	42.76%	11.23%
Debt-equity ratio	211	5.15	3.04
Equity multiplier	3.17	6.24	3.07
Times interest earned	1.01	1.58	0.57
Financial leverage	2.17	5.15	2.98

Source: author's computations based on financial statements of the company

### 8.4.3 The Activity Ratios

These ratios are often referred to as operating ratios or management ratios, which measure efficiency with which the business uses its assets. The ratios analysed are total assets turnover, fixed assets turnover, inventory turnover and average collection period. The Table 12 is offered to pose a better explanation.

Table 12 The Activity ratios

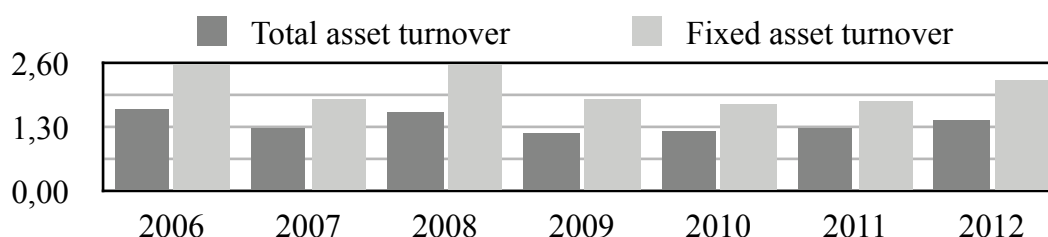
Activity Ratios	2006	2007	2008	2009	2010	2011	2012
Total asset turnover	1.64	1.25	1.58	1.19	1.21	1.28	1.44
Fixed asset turnover	2.58	1.84	2.55	1.84	1.76	1.8	2.23
Inventory turnover	195.33	177.89	195.37	100.12	77.97	54.78	70.79
Inventory turnover period (days)	1.9	2.1	1.9	3.7	4.7	6.7	5.1
Average collection period (days)	76.96	82.59	74.22	83.09	62.43	53.88	62.39
Receivables turnover (days)	75.9	81.5	74.2	82	61.6	53.1	61.5

Source: author's computations based on financial statements of the company

*Total asset turnover* shows the efficiency with which assets are used. The lowest point in the reporting time period occurred in 2009 with the value of 1.19. Neither of the values went above ratio of 2. The value of this particular turnover was on average 1.37. In this case, the last reporting year had a value of 1.44 which means the company produces 1.44 CZK worth of sales for every crown invested in total assets.

*Fixed asset turnover* measures how intensively a company's fixed assets are used to generate sales. On average, the value is 2.09, which means that the company generates 2.09 CZK worth of sales for crown invested in fixed assets. Over the years, the company has always been around such worth. The lowest values occurred in 2010 of 1.76.

Figure 18 Asset turnover



Source: author's computations based on financial statements of the company

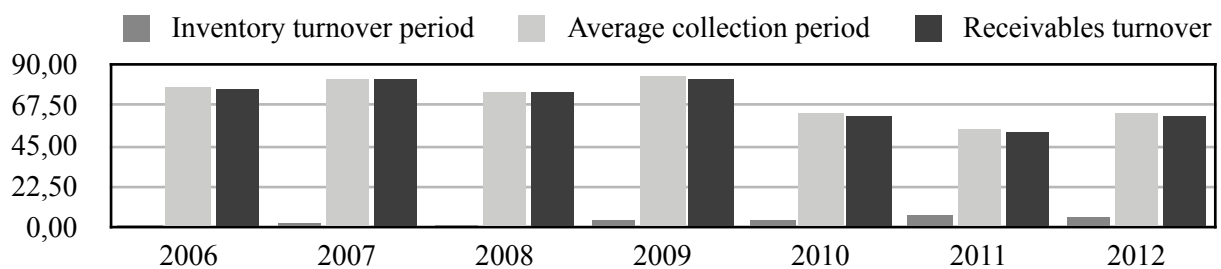
*Inventory turnover* measures the turnover of company's investment in inventory during given year. On average, the inventory turned over 121.24 times. The highest point during the reporting period had been in 2008 and 2006 with turnover of 189. In the last few years of reporting period, the values were beneath 100 times, usual turnover around 60 times. In the chart in Figure 19, the inventory turnover is divided by 365 days. It is quite obvious, there are of negligible amounts of such turnover as the products are consumer goods. However, the figure shows increasing trend over the last 3 years.

*Average Collection Period* of reported company during the period was usually around 70 days. The highest collection period occurred in 2009, 83 days. In the last reported year, the collection period was 62 days on average, which is still quite high. A longer collection period automatically creates a larger investment in assets.

*Receivables turnover time* indicates the velocity of the company's debt collection. In general, the company's turnover time is 70 days per one turnover. The longest turnover time of receivables was known in 2009 of 89 days per one turnover. In this industry, it refers to enough time for receivable to mature.

*Short-term payables turnover* values are at zero. The values are available in the attachment.

Figure 19 Inventory turnover & Receivables turnover



Source: author's computations based on financial statements of the company

### Comparison with the competitor

Comparing the values with the competition helps to see whose activity ratios are more successful. PAKOSA a.s. has higher total asset turnover by 3, which means the competitor produces 3 CZK more worth of sales for every crown invested in total assets. Again, the competition generates more sales with fixed assets, the value is 7.45 higher than the Yankee's value. Inventory turnover is vastly higher for the PAKOSA company by 223 times, which

in hindsight means they keep too much of inventory items and it may spoil. The competitor has lower average collection period, by 34 days that is, which lowers investment in its assets. Receivable turnover has similar difference results. The competitor has quite fast turnover. In another words, it receivable assets can't mature that enough.

Table 13 Comparison of activity ratios with the competitor

Activity Ratios	Yankee	PAKOSA Chodov a.s.	Variance
Total asset turnover	1.44	4.44	-3.00
Fixed asset turnover	2.23	9.68	-7.45
Inventory turnover	69.96	293.43	-223.47
Average collection period (days)	62.39	27.85	34.54
Receivables turnover (days)	61.5	27.5	34.1

Source: author's computations based on financial statements of the company

### Comparison (average of the medium sized companies)

Comparing the values with the medium sized companies' average number, it is impossible to miss the lower values of Yankee. On the first glance, the average values are impeccably better. On average, the medium sized companies have quicker inventory turnover by 35.82, which in food industry is nothing bad. It was earlier stated that Yankee company has almost no inventory as its turnover is as quick. The lowest difference has occurred in the total asset turnover ratio with variance 0.77, which means the competitor produces 0.77 CZK more worth of sales for every crown invested in total assets. Another similar value with lower variance is visible in the average collection period (10.53 days) and receivables turnover (10.32 days). Nonetheless, Yankee's values are slightly lower and turn over less.

Table 14 Comparison of activity ratios with industry's average

Activity Ratios	Yankee	Average	Variance
Total asset turnover	1.44	2.21	0.77
Fixed asset turnover	2.23	19.03	16.8
Inventory turnover	69.96	34.14	35.82
Average collection period (days)	62.39	51.86	10.53
Receivables turnover (days)	61.5	51.18	10.32

Source: author's computations based on financial statements of the company



#### 8.4.4 The Profitability Ratios

A profitability ratio measures a company's performance. Profitability is simply the capacity to make a profit, which is what is left over from income earned after deducting all costs and expenses related to earning the income. As it is possible to see in the chart in Figure 20, the company is profitable most of the time, however the company was at loss in 2011.

Table 15 The Profitability Ratios

Profitability ratios	2006	2007	2008	2009	2010	2011	2012
ROA	3.12%	6.92%	6.93%	10.01%	3.78%	-0.19%	2.01%
ROA after tax	0.32%	3.48%	3.06%	5.67%	1.38%	-1.52%	0.05%
ROE	1.40%	17.65%	13.76%	27.02%	6.74%	-6.49%	0.21%
ROCE	6%	10.6%	10.6%	14.7%	5.3%	-0.3%	3.3%
ROS	1.9%	5.6%	4.4%	8.4%	3.1%	-0.1%	1.4%

Source: author's computations based on financial statements of the company

*Return on Assets* measures how effectively the company produces income from its assets. The calculations happen before and after taxation. The results vary. The values were high until 2009, then there was a turning point and next two years went downhill. The year 2011 resulted in negative values, however the values have been in a sense of break-even since 2012. In average, ROA before tax values were 4.66% and after tax 1.78%.

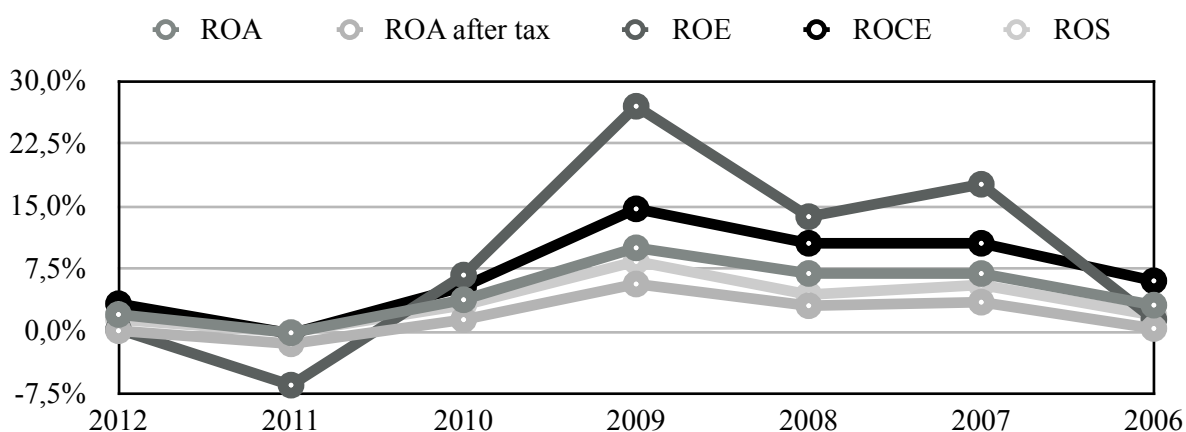
*Return on Equity* indicates how much a company makes for each crown that invests into it. The values are quite variable during the reporting period. The average value of return on equity was 8.61%. Evidently, the most positive value occurred in 2009 with 27.02%, which unfortunately dropped the next year to 6.74%. The worst calculated year measured at -6.49%. This is however not any surprise, overall the reporting period the discussed year was not profitable at all.

*Return on Capital Employed* is often referred as the "primary accounting ratio", which expresses the annual percentage return an investor would receive on their capital. It basically relates the profit to the size of the business. The results mean that for every 1 CZK of capital invested in the business, the annual return is on average 0.7 CZK.

In the reporting period, the values are positive except the year 2011, which was overall unfortunate year for the company. The best year for the company was 2009 with values of 14.7%, and the worst was, as already stated, the year 2011 with negative results of -0.3%.

*Return on Sales* is a ratio used to evaluate a company's operating performance. Such return is achieved from standard operations and does not include unique or one off transactions. The company does not have extremely high return on sales ratio, which can be offset by increased sales, however the profitability is mostly positive. Again, year 2011 has the negative value of -0.1%. Otherwise, the values are in positive numbers. The highest value occurred in 2009 with 8.4%, which is reflected in the EBIT values. On average, the return was 3.5%

Figure 20 Profitability ratios



Source: author's computations based on financial statements of the company

### Comparison with the competitor

In comparison, it is obvious that PAKOSA Chodov, a.s. has better values and is profitable in all the ratios except return on sales during the reporting period. The highest difference is in return on equity ratio, the competition has 25.61% better return on equity than the reported company. The lowest difference is in the ratio return on asset after taxes (-0.6%). The only positive value the reviewed company is return on sales (0.58%). The profitability is in favour of the competition, which clearly states better success for PAKOSA Chodov, a.s. rather than the analysed company Yankee. The developed results are presented in attachment.

Table 16 Comparison of profitability ratios with the competitor

Profitability Ratios	Yankee	PAKOSA Chodov a.s.	Variance
ROA	2.01%	3.67%	-1.66%
ROA (taxed)	0.05%	0.7%	-0.6%
ROCE	3.3%	13.5%	-10.2%
ROE	0.21%	25.82%	-25.61%
ROS	1.4%	0.82%	0.58%

Source: author's computations based on financial statements of the company

### Comparison (average of the medium sized companies)

The table below shows the profitability ratios of the medium sized companies on average. The ratios were computed from 60 of these companies. It is obvious, Yankee company has overall more profitable values. The highest difference has occurred in the return on capital employed ratio, the Yankee company has 2.18% better return than the average. Return on sale is quite the opposite, the variance has the smallest value change (0.15%) among the ratios. Overall, Yankee company is more profitable than the average of the medium sized companies.

Table 17 Comparison of profitability ratios with industry's average

Profitability Ratios	Yankee	Average	Variance
ROA	2.01%	1.13%	0.88%
ROA (taxed)	0.05%	-0.27%	0.32%
ROCE	3.3%	1.12%	2.18%
ROE	0.21%	-1.06%	1.27%
ROS	1.4%	1.25%	0.15%

Source: author's computations based on financial statements of the company

## **8.4 Bankruptcy Models**

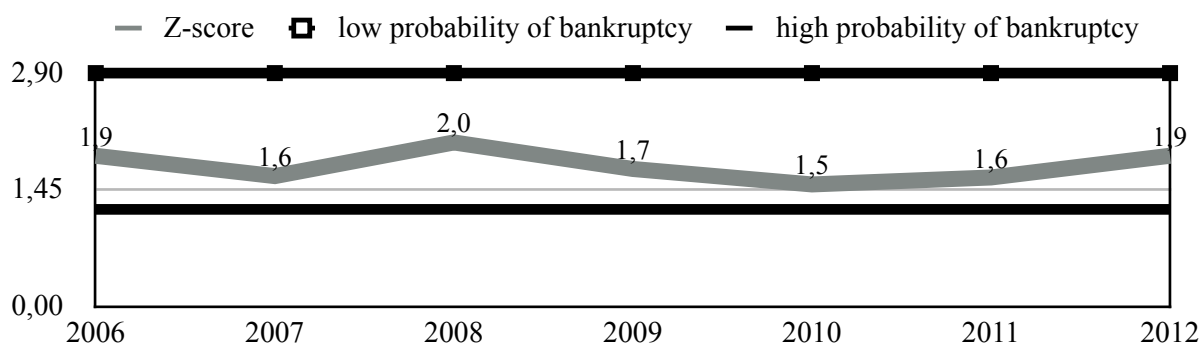
Predicting financial distress is a supplementary tool of financial analysis. The bankruptcy models applied are the Altman Z-score model, Index IN05 and Tafler's bankruptcy model. These models are used for prediction of the bankruptcy with the most possible accuracy. The formulas are mentioned in the theoretical part. The final results are shown in attachment.

### **8.4.1 Altman Z-Score**

The Altman Z-score, the paramount recognised model of financial distress which uses several ratios to generate a prediction of the likelihood of bankruptcy, which is previously mentioned in the theoretical part. This model uses multiple discriminant analysis. According to the optimum values with regards to both values, the company has been positioned in the ambiguous area the computed time period.

Results are displayed in the figure below. Final value is quite favourable than in the past years. Over the years, none of the values exceeded either of the optimums, lower than 1.20 which means high probability of bankruptcy and higher than 2.9 which low probability of bankruptcy (Guerard, 2007), which actually begs the question why has the company never left the ambiguous area? The entire company is not solvent enough because the working capital figure, mentioned in another part of the practical part, of the company is showing negative which is one of the major factors in analysing the Z-score. After evaluating the 7-year-worth-of annual reports, the company management hasn't taken any profound steps in the organisational structure. The average value over the computed time period is 1.7 which is in the ambiguous area as well. The management may or may not be concerned about possible bankruptcy considering the values.

Figure 21 Altman Z-Score

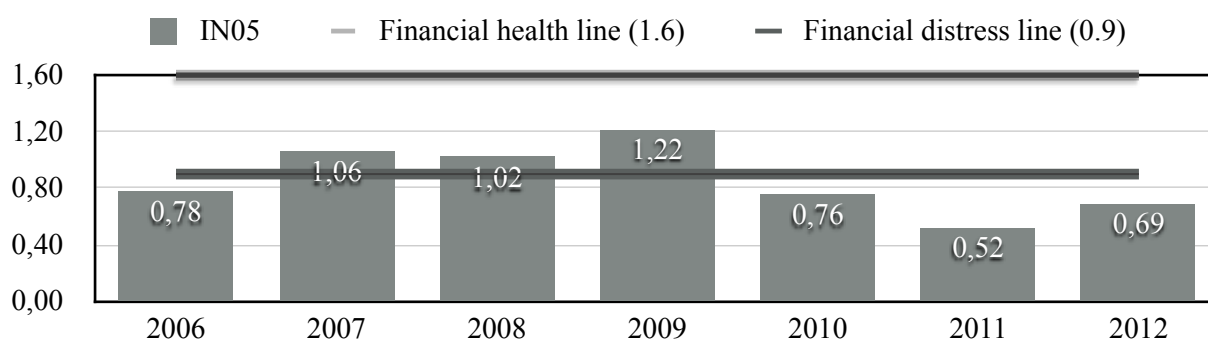


Source: author's computations based on financial statements of the company

### 8.4.2 Index IN05

The index IN05 is preferable to other indexes for the Czech companies due to its typical verification with respect to the Czech economy. This last version includes the creditor's point of view and owner's point of view. In all the computed time period, the company has never exceeded the financial health line of 1.6 (Váchal, 2013). In the chart in Figure 25, it is obvious the company has been under the financial distress line of 0.9 over the past 3 computed years. In years 2007 - 2009, the company had turned things around and to the "grey zone".

Figure 22 Index IN05



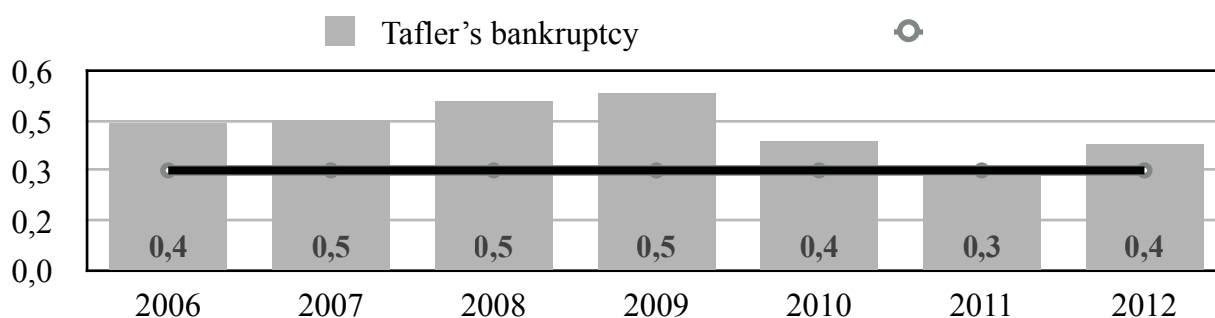
Source: author's computations based on financial statements of the company

The company has never reached the maximum optimum of 1.6 line. Overall, the company has serious financial complications according to the index. In comparison with the competition, the selected company is in worse financial health. In average, the competition has IN05 of 1.14 which is comparison to IN05 0.86 of selected company is a quite huge difference.

### 8.4.3 Taffler's bankruptcy model

Except one year, 2011, the company has always been above the line 0.3 (Váchal, 2013). According to the Taffler's bankruptcy model, the company is a prospering and there is a low likelihood of bankruptcy. Taffler's model disapproved the IN05, which stated a probability of bankruptcy and financial distress and kindly pushed the ambiguity out of the Altman's Z-score. On average, the model accounts for 0.4.

Figure 23 Taffler's model



Source: author's computations based on financial statements of the company

Considering all the available data on each of these models, the Taffler's bankruptcy models has the lowest pressure because it does not take into account the Czech economy as does the Altman Z-score model. However, the computed data are still being considered as valid.

### Comparison with the competitor

The table below showcases the average values of two bankruptcy models during the 3-year period. It is quite obvious, that according to the Altman Z-Score, the competitor is well over the 2.9 optimum. Yankee is averagely placed in the grey zone, neither bankrupt able or extremely well-off. According to the Index IN05, neither of the companies exceeded the 1.6 line of low bankruptcy. However, PAKOSA is again much better off. The difference is 0.57 in such index. Overall, the competitor's bankruptcy models are more successful and optimistic than the observed company.

Table 18 Comparison with the competitor

<b>Bankruptcy models</b>	<b>Yankee</b>	<b>PAKOSA Chodov a.s.</b>	<b>Variance</b>
<b>Altman Z-Score</b>	1.659	4.1	-2.441
<b>Index IN05</b>	0.66	1.23	-0.57

Source: author's computations based on financial statements of the company

## 9 Discussion

The selected company, Yankee (fictitious name), is exclusively concentrated on the production and distribution of domestic dumplings in all different modifications. The company has, since 2003 consistently exceeded 100 million threshold and therefore it is an economically stable company.

The results of the vertical analysis suggest the company, in terms of assets, is made up over 50% of fixed assets. The tangible assets have 99% share in all the fixed assets. Current assets have less significance in the company and the value had been around 30% and less. Considering the company does not hold inventory due to consumerism and quick turnover, the current assets hold such low value. Work in progress or finished goods are not kept due to the short necessity and are immediately dispatched to customers. Debts occupy quite large matter of claims, on average it is 60% and more. The debts are used to develop the business further and to innovate the buildings and machines. The ratio shows higher use of short-term debts rather than long-term debts. In hindsight and in terms of interest, holding debts are profitable for the company. However, the recommendation is given in the subchapter 9.1, which in short is to lower the debt or make sure receivables are paid in time.

The result of the vertical analysis of income statements is utterly axiomatic, the total revenues of the company comprise of revenues of own products and services. The only small and quite negligible evidence of revenues from sold goods occurred in 2008. The added value is moving on average of 38.5% in the studied period. The company did not increase the number of employees in the last couple of years of the studied period.

It is clear from the Figure 8 that the company's developing assets had fluctuating trend in the horizontal analysis of assets. In the last 3 studied years, the values were slightly lower however there was an increase in 2012. Such development (the positive change in 2012) can be seen in the income statement as well.



The company had been having issues with financing current assets which is available in the net working capital values, which are lower than usual. The last observed year is obviously boosting one, which is possible to see in every calculated indicator and gives hope and positiveness to the employees and customers as the company will be in the market for a long time.

Furthermore, the assessment of financial stability was calculated with financial ratios. The liquidity of the company is slightly dissatisfactory however the company is not holding large sums of assets, and they are easily turned into cash. A good point is that optimums are not exceeding the top lines. The company manages relatively well with its assets which is demonstrated by activity ratios. Company's weakness are receivables which are usually paid within 60 days as its obvious from the results, however many of the receivable are not even paid within 180 days, which leads to the court time, such information was acquired from annual reports. Short term payables are valued at zero. From the profitability perspective, the company is in the state of break-even, especially in the last observed year with results of 0.05% after tax. The company does not have high return on sales which can be however an offset by increase sales. In all the observed years, there were times the company was not profitable, nonetheless this could still mean the effects of economic crisis, which whether one would like to believe has even now effects on business. Overall, the company is financially smart, considering its innovative standard, especially the hygienic standards and investing in new technologies, which makes new development of products possible as well as faster delivery.

The results of the financial analysis are also reflected in the prediction models of financial distress or otherwise known as bankruptcy models. In all three applied models, there were times when the company sunk below the optimum level however in the overall aspect the company had been rather stable in its grey zone, which is neither a good nor bad thing. In the Czech version of bankruptcy models, Index IN05, the company has been under the financial distress line for the last 3 observed years, which was more or less disproved by the two other, which as I stated once before, the company is in the grey zone which is quite ambiguous.

## 9.1 Recommendation

First and foremost recommendation is to perform a quarterly financial analysis process, especially the indebtedness and profitability. Bankruptcy models ought to be performed as well to see whether there is any difference visible in the following years, as the last couple of years were getting better values. The outcomes can capture trend that would otherwise be detectable by comparing the years. The company has an early opportunity to reveal their weaknesses and strengths and act as soon as possible if necessary.

Further recommendation for the company is the possibility of penetration of new markets thereby obtaining more funds for repayment of considerable loans thus shrinking the debt considering the ratio is quite high, and in general to be known in the European market, not just Slovakia and slightly in Germany.

Lastly, keeping in mind that net working capital had been negative in the last few years, which leads to either lack of current assets or excess amount of current liabilities. In this company's case, there is an excess of current liabilities. In another words, this means higher cash outflow. Considering, there is no money tied up in the inventory, due to a quick turnover, it needs to be taken into account that receivables have to be paid in time, even though the turnover itself was not as high however the recommendation is to either enforces quicker payback or lower the liabilities, such as loans, which goes hand in hand with the recommendation two to spread into new markets and hopefully increase current assets. One important thing to mention, the company is not in the negative numbers for long periods of time, which suggests quick solutions to such issues. In the observed years, the company was in both negative as well as positive values. However, sometimes the issues are not as much external as they are internal which takes time to change. One suggestion is to implement cash-focused management and to use key performance indicators. This is nonetheless company's mission. Provide awareness training at management level and activity training on new processes at operational level. Changing habits does not happen overnight, so company will need to provide ongoing support in order to run these processes successfully.

## 10 Conclusion

The aim of this thesis was to assess the financial situation of the company Yankee and based on the calculated results to assess the overall situation in the company and to propose any recommendations for the future if necessary. Evaluation of financial situation was based on calculations using the methods: horizontal and vertical analysis, financial ratios (activity, liquidity, profitability, financial stability, and net working capital) and bankruptcy models. The thesis was based on data from the balance sheet and income statement (profit and loss statement) for the period of 2006 to 2012. Calculations were mainly based on the above mentioned statements. The analysis of business environment was also use, specifically PEST analysis. The objective was achieved through three aims, which were specified in the chapter 2, and then in the individual chapter of this thesis.

First aim includes a summary of the theoretical basis as to establish an economic analysis. The theoretical basis is divided into two chapters, which are in this order, third chapter about region, regional development and regional policy. The fourth chapter is about economic analysis which comprises of subchapters as analysis of the business environment and financial analysis and the financial indicators and their applications.

Second aim is focused on the practical part of the thesis including characteristics of the selected company and characteristic of specific industry, the food industry. Basic description and company's definition is given and discussed, the company's history, its business objectives and others are discussed. The business environment is discussed via PEST analysis, which briefly describes also the macro-environment. The part of the second aim is the focus on economic analysis. The economic analysis was achieved by constructing economic analysis and comparing it to PAKOSA Chodov a.s. and the average of the medium sized companies in the food industry (with 50 - 249 employees). Rest assured, the conclusion is described below.

The vertical and horizontal analysis of balance sheet and income statement was performed first. Fundamental movements of some items were already ascertained in a detailed analysis. An important phenomenon for the company remains the fact that the funds are not tied in excess inventories. The company is maintaining a certain degree in order to continu-

ously satisfy their customers and at the same time that inventories do not lie uselessly on the stock, as it is consumer goods and could spoil easily. Due to the purchase of new technologies and innovative quests predominate outside sources, known as debt, in the company. Their share in total resources is around 70%, which is not favourable. On the other hand, it can be expected, even indicated by the last observed year, that the company will not have a problem with repaying debt. Yankee company mixes mainly on Czech and Slovak market, which satisfies a wide range of customers, and the assumption can be that their reputation continues to retain and thus can increase their existing revenues. The company could penetrate new markets and thereby obtain more funds for repayment of considerable loans.

Ratio analysis showed indicators' volatility in individual years. For comparison, data are available for 7 years. In most cases, the volatility occurred in 2006, 2011, 2012, and in some cases-even 2009. An important phenomenon is that the fixed assets should be covered by equity, according to the recommended values, by 75%. However, the firm does not reach this value in any of the observed years, as the value reaches only around 40%. As it has been already mentioned, the company has an inordinate amount of foreign resources (debt) and should strive to repay and increase the share of own resources in the future. Lack of funds suggests an indicator of quick liquidity when the recommended value ranges from 1.00 to 1.5 and the computed value is always below 1.00. Again, the worst situation was in 2006, 2011 and 2012. In 2008, the company has almost reached the recommended value. In the future, the company should monitor the size of their financial means, because when unexpected situations occur, the company could get into financial trouble, which is associated with the repayment of loans and long-term liabilities. Very favourable is the receivables turnover, which was reduced from 82 days in 2009 to 61 days in 2012. It is important, the company had a constant turnover of funds. Important indicators for the evaluation of financial situation of the company are indicators of profitability and financial stability. Return on equity has declined significantly during the observed years. In comparison with industry averages (food industry), the observed company reaches average values firm, but on average the monitored company has much better values than the industry.

Bankruptcy models revealed some problems. It is possible to characterize the company as a mouse in the grey zone, but this does not mean that the company would have a higher possibility of bankruptcy, actually one of the problems is the indebtedness of the company, which as discussed earlier is certainly higher. The models revealed a certain tendency to move in a grey zone in all three models bankruptcy (Altman Z-Score, Taffler's model, Index IN05).

On the basis of the calculated results, the company can be evaluated positively in its industry, and if the company takes into account some of the recommendations mentioned in the recommendation chapter just above, it could achieve even better results in the next few years.

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