



*D. A. TSENOV ACADEMY OF ECONOMICS*

*FACULTY OF FINANCE*

*DEPARTMENT OF FINANCE AND CREDIT*

---

**DOCTORAL STUDENT BORIS BOYANOV STOEV**

# **ABSTRACT**

of a dissertation for the award of an educational and scientific degree  
of "Doctor" (in Economics) in the doctoral programme "Finance,  
Money Circulation, Credit and Insurance" (Finance) on the topic:

## **"MANAGEMENT OF CORPORATE DEBT IN BULGARIA"**

**Scientific supervisor:**

Assoc. Prof. Marin Stefanov Marinov

Svishtov

2025

The dissertation was discussed and approved for defence at a meeting of the Department Council of the Department of Finance and Credit at the Faculty of Finance of the D. A. Tsenov Academy of Economics in Svishtov.

*Data about the dissertation:*

Number of pages – 205

Number of figures – 3

Number of tables – 30

Number of literary sources – 89

Number of publications by the doctoral candidate – 3

The defence will take place on 05.03.2026 at 13.30 in the Rectorate Conference Hall of D. A. Tsenov Academy of Economics – Svishtov or at a hybrid meeting at: <https://bbb.uni-svishtov.bg/b/yc7-x2c-dtm>.

The materials for the defence are available at the Doctoral and Academic Development Department.

## CONTENTS OF THE ABSTRACT

<b>I. GENERAL CHARACTERISTICS OF THE DISSERTATION .....</b>	<b>4</b>
1. <i>RELEVANCE OF THE TOPIC</i> .....	4
2. <i>OBJECT AND SUBJECT OF THE STUDY</i> .....	5
3. <i>RESEARCH THESIS</i> .....	5
4. <i>AIM AND OBJECTIVES OF THE DISSERTATION</i> .....	5
6. <i>STRUCTURE OF THE RESEARCH</i> .....	6
7. <i>APPROVAL OF THE DISSERTATION</i> .....	7
<b>II. MAIN CONTENT OF THE DISSERTATION.....</b>	<b>8</b>
<b>III. GUIDELINES FOR FUTURE RESEARCH ON THE TOPIC OF THE DISSERTATION</b>	
.....	28
<b>IV. REFERENCE TO THE SCIENTIFIC AND APPLIED SCIENTIFIC CONTRIBUTIONS</b>	
<b>IN THE DISSERTATION .....</b>	<b>29</b>
<b>V. LIST OF PUBLICATIONS BY THE DOCTORAL STUDENT .....</b>	<b>30</b>
<b>VI. REFERENCE FOR COMPLIANCE WITH THE MINIMUM NATIONAL</b>	
<b>REQUIREMENTS UNDER THE REGULATIONS FOR THE APPLICATION OF THE</b>	
<b>LAW ON THE DEVELOPMENT OF ACADEMIC STAFF IN THE REPUBLIC OF</b>	
<b>BULGARIA .....</b>	<b>31</b>
<b>VII. DECLARATION OF ORIGINALITY OF THE DISSERTATION.....</b>	<b>32</b>

## **I. General Characteristics of the Dissertation**

### ***1. Relevance of the Topic***

In today's rapidly changing world, companies are increasingly facing shortages of liquid funds. The operational financial management of public companies are exposed to the serious challenge of allocating working capital in an optimal manner. Issues related to raising capital and investing it effectively in current assets so as not to disrupt the normal running of the production process are of paramount importance to the financial manager.

Specialised scientific literature is increasingly focusing on issues related to accounts receivable, which are considered to be an integral part of the management of liquid assets. Practice shows that poor management of trade receivables may become not only an operational problem, but also a factor that threatens the overall financial stability and investment appeal of companies.

Due to a lack of cash, more and more companies are resorting to commodity lending. Many companies offer their business partners the option to pay at a later date for the goods they receive. However, this process poses a significant risk for suppliers, since buyers may fail to pay the amount that is due according to the negotiated terms. It is therefore necessary for creditors to thoroughly assess their counterparties to avoid the risk of uncollectible receivables.

The accumulation of trade receivables without having an adequate system for their control, assessment and collection can lead to serious liquidity problems, deterioration financial performance and limited opportunities for investment and growth. In a situation of economic turmoil, such as the COVID-19 pandemic, inflationary pressure and delayed payments between trading partners,

management of accounts receivable becomes a strategic priority for companies aiming at competitiveness and sustainable development.

The topic is particularly relevant in light of growing requirements to corporate management, transparency of financial reporting and effective use of working capital. In this context, the study of accounts receivable is useful not only for identify risk areas in the performance of public companies, but also for designing more effective policies and practices in the field of financial management.

## ***2. Object and Subject of the Research***

**The object** of the study is *the management of corporate accounts receivable*.

**The subject** focuses on *the analysis of the situation and problems related to accounts receivable in major Bulgarian public companies by market capitalization that are included in the BG TR30 stock exchange index*.

## ***3. Research Thesis***

On this basis, **the research thesis** is formulated as follows: *The operational financial management toolkit, including turnover, liquidity and solvency models, represents an appropriate methodological framework for managing accounts receivable in Bulgarian public companies*.

## ***4. Aim and Objectives of the dDissertation***

Based on the object, subject and thesis, **the aim** of the study is *to determine the extent to which solvency, liquidity and turnover models and indicators support the effective management of accounts receivable on Bulgarian capital market*.

**The tasks** of the dissertation are as follows:

- To provide a systematic review of research literature related to accounts receivable;
- To study the key characteristics and the economic significance of trade receivables in modern enterprises;
- To theoretically present and formulate indicators for liquidity, solvency and turnover;
- To apply the indicators for corporate solvency, liquidity and turnover on the capital market in Bulgaria;
- To outline the challenges related to managing accounts receivable within Bulgarian context;
- To examine the opportunities for improving the management of trade receivables.

### ***5. Methodology of the Research***

**The following research methods** are used for the purposes of the study: comparative analysis, trend analysis, inductive and deductive methods, observation, ratio analysis, descriptive methods, etc.

### ***6. Structure of the Research***

The dissertation consists of 205 standard pages. It is structured in three chapters as follows:

## ***INTRODUCTION***

### ***Chapter One. CONCEPTUAL FRAMEWORK OF ACCOUNTS RECEIVABLE***

1. Review of specialised literature in the field of accounts receivable

2. Key characteristics of accounts receivable
3. Economic significance of trade receivables in modern enterprises

## ***Chapter Two. METHODOLOGICAL TOOLS FOR ANALYSING ACCOUNTS***

### **RECEIVABLE**

1. Corporate policy on managing accounts receivable
2. Indicators for analysing corporate solvency
3. Indicators for analysing corporate liquidity
4. Indicators for analysing the turnover of corporate assets

## ***Chapter Three. EMPIRICAL ANALYSIS OF THE ACCOUNTS RECEIVABLE OF BULGARIAN PUBLIC COMPANIES***

1. Information basis for analysing the accounts receivable of Bulgarian public companies
2. Study of the impact of accounts receivable on the solvency, liquidity and asset turnover of Bulgarian public companies
  - 2.1. Analysis of the solvency of Bulgarian public companies
  - 2.2. Analysis of the liquidity of Bulgarian public companies
  - 2.3. Analysis of the asset turnover of Bulgarian public companies
3. Challenges in managing accounts receivable in the Bulgarian context
4. Opportunities for improving the management of accounts receivable

## ***CONCLUSION***

## ***APPENDICES***

## ***BIBLIOGRAPHY***

### ***7. Approval of the Dissertation***

The dissertation was discussed and referred for defence at a meeting of the Department of Finance and Credit at D. A. Tsenov Academy of Economics –

Svishtov. Individual parts of the study have been presented at scientific forums and published in specialised academic journals.

## II. Main Content of the Dissertation

### Chapter One. CONCEPTUAL FRAMEWORK OF ACCOUNTS RECEIVABLE

*The working hypothesis* examined in Chapter One is as follows: *Accounts receivable represent a multifaceted subject of study, combining financial, operational and strategic aspects of business management. They have a significant impact on the liquidity, profitability and value of the company, while also creating a significant credit risk.*

Accounts receivable as a subject of study have been the focus of numerous theoretical and empirical works in the fields of corporate finance, financial management and risk management. Therefore, this chapter begins **with a review of specialised literature in the field of trade receivables**. The finding of that review is that *accounts receivable are a multifaceted entity* which relates to financial, operational and strategic aspects of business management. Studies in this field emphasise that accounts receivable have a significant impact on the liquidity, profitability and value of a company, while also posing a significant credit risk.

The focus of the chapter is on **the key characteristics of accounts receivable**. Special attention is paid to the fact that in contemporary financial theory, *accounts receivable are not viewed merely as an accounting indicator, but as a strategic resource*. Their effective management is crucial for the liquidity, profitability and value of the company, the optimisation of working capital and striking a balance between encouraging sales and minimising the credit risk.

A major characteristic of accounts receivable is their *time limitation* – they only exist until a company receives cash from its debtors. High levels of accounts

receivable often signal an increased risk of uncollectible receivables, impaired liquidity and higher operating costs related to their management.

Trade credit, despite being a means of revenue growth, has its own *internal costs* related to: deferred sales proceeds; the need to finance working capital; potential losses from uncollectible receivables; additional administrative and legal costs for collecting receivables. Therefore, accounts receivable should not be viewed solely as a consequence, but also as *an indicator of the quality of commercial relations*.

Accounts receivable are a key part of *the operating and trade cycle*. Alongside inventories and accounts payable, they determine the net trade cycle. Shortening the cycle improves liquidity and reduces the need for external financing. Companies which successfully balance the period of accounts receivable and accounts payable demonstrate greater resilience in a situation of market uncertainty. Corporate credit policy, inventory management and terms of payment to suppliers are the key mechanisms that affect this cycle. A short trade cycle and efficient collection of accounts receivable have a positive impact on business profitability. Companies with shorter periods of collection typically maintain higher liquidity and resilience in times of economic turbulence.

Accounts receivable relate to *the valuation and impairment of receivables*. This procedure includes an analysis of: the length of time the debt has been outstanding; the customer's financial situation; historical payment data; guarantees and collateral for the receivable; the market and economic situation. Impairment is carried out by creating *provisions (reserves)* for doubtful or uncollectible receivables. Provisions reduce the carrying amount of the asset and are recognised as an expense in the income statement. The impairment of receivables has a dual significance: on the one hand, it improves the reliability of financial statements, and on the other hand, it serves as *an indicator of the effectiveness of the credit risk management policy*. High levels of impairment in

companies may signal weak control over their customer base, ineffective payment terms or an unfavourable market environment.

Several important factors that affect the size and management of receivables can be identified: *the economic environment* (companies tend to offer more flexible terms of payment in times of economic upsurge and tighten their credit policy during a recession); *seasonal and cyclical nature* (some industries are highly dependent on seasonal sales, which leads to uneven collection of receivables; this requires more flexible approaches to managing collectability); *customer structure* (the concentration of receivables in a small number of customers or risky industries increases the financial risk; a well-diversified customer base reduces that risk and makes management easier); *the nature of the products/services offered* (sales of capital-intensive goods or services, for instance, in construction, usually entail longer periods of payment); *payment terms and trade discounts* (which affect the speed of cash inflows and the efficiency of working capital management).

On this basis, **the economic significance of trade receivables** is further examined. It is analysed in several main aspects:

- Accounts receivable as *a key element of managing working capital*;
- Accounts receivable as *an object of operational management*;
- Accounts receivable in the context of *the financial situation of enterprises*;
- Accounts receivable as *a tool for achieving strategic goals*;
- Trade receivables and their impact on *the value of the enterprise*;
- Trade receivables in the system of *credit risk management*.

## **Chapter Two. METHODOLOGICAL TOOLS FOR ANALYSING ACCOUNTS**

### **RECEIVABLE**

*The following working hypothesis is tested in Chapter Two: assessing the state of accounts receivable of non-financial enterprises, based on publicly*

*available information, requires developing and applying an adequate set of tools which includes a system of appropriately selected parameters and indicators that are tailored to the specific characteristics of Bulgarian practice.*

The beginning of this chapter studies **corporate policy on the management of accounts receivable**. Management of receivables is a key element of any company's financial policy. An effective policy in this aspect should aim at ensuring liquidity, reducing credit risk and improving cash flows by controlling customer receivables.

The main principles of corporate policy are:

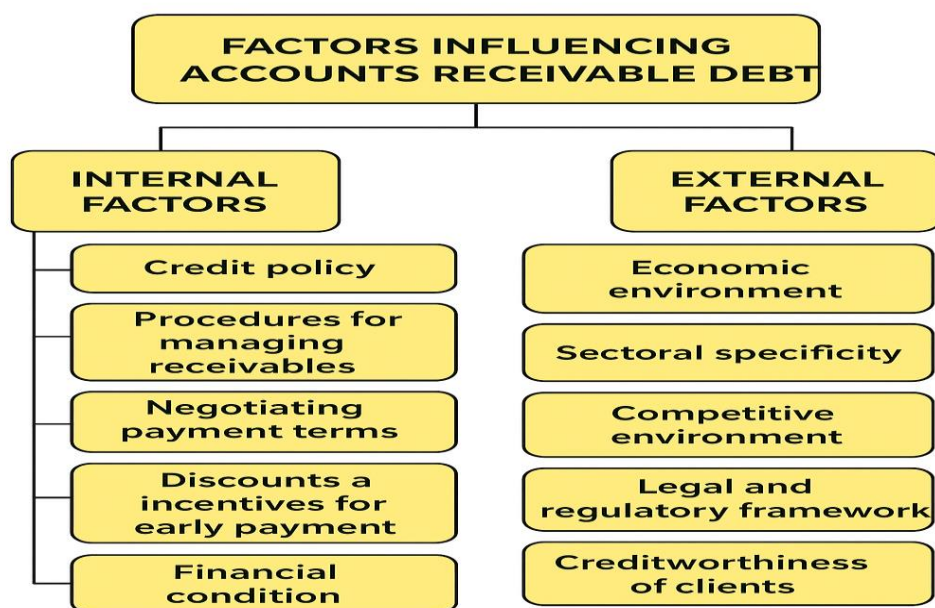
- *The design of a credit policy*: an effective credit policy reduces the risk of uncollectible receivables, improves liquidity and ensures more stable cash flows. A company's credit policy includes several key components: 1) terms of credit; 2) procedures for assessing customer creditworthiness; 3) a policy for collecting receivables; 4) incentives for prompt payment;

- *The assessment of customer creditworthiness* by using financial analysis, credit ratings and historical data;

- *The optimisation of the collection period*: reducing the delay period through procedures for: *active management of receivables* (introduction of systems for monitoring due dates, regular tracking of invoices and automated reminders, maintaining good communication with customers); *early reminder and warning policy* (sending preliminary reminders a few days before the due date; automated reminders sent via email and SMS; monitoring customers with systematic delays and taking corrective measures); *offering incentives for early payment* (providing discounts for prompt payment, imposing penalties or interest on late payments, negotiating flexible terms for customers with good creditworthiness); *using factoring* (selling receivables to a financial institution for faster access to funds) and *insuring receivables* (protection against the risk of uncollectible receivables).

- *The use of discounts for prompt payment* – tools for accelerating cash flows and reducing the risk of uncollectible receivables. They represent a financial incentive for customers to pay their invoices before the standard payment deadline.

The figure below presents the internal and external factors that influence the amount and management of trade receivables (see Fig. 1).

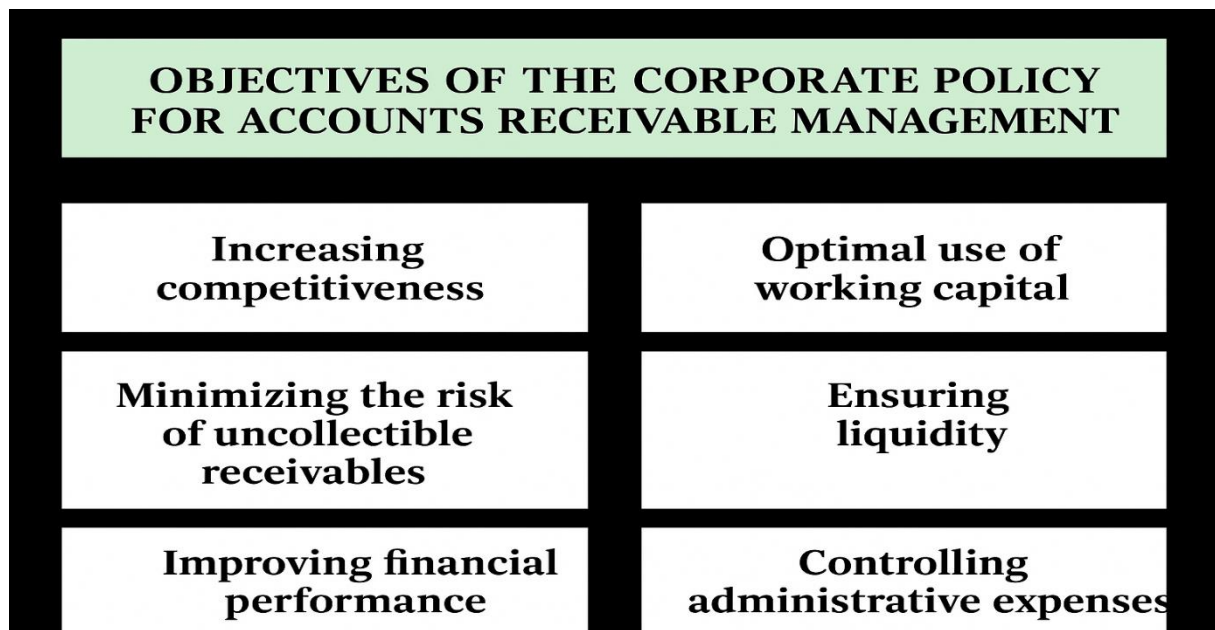


*Source: author's own work*

**Figure 1. Factors affecting accounts receivable**

Contemporary corporate policies on accounts receivable are based on applying specific tools for control, prevention and optimisation of receivables. In this regard, the following key areas are distinguished in the management process: 1) *monitoring and control of receivables*; 2) *management of the risk of uncollectible receivables*; 3) *segmentation of the customer base*; 4) *internal coordination and staff training*; 5) *goal setting and key performance indicators (KPIs)*.

On this basis, *the main objectives of the corporate policy* on the management of accounts receivable are summarized below: (Fig. 2)



*Source: author's own work*

**Figure 2. Objectives of corporate policy in accounts receivable management**

This part of the dissertation **substantiates the importance of a system of financial indicators** for assessing accounts receivable in public companies. The presented analytical framework consists of 20 indicators that are grouped into three categories:

- 1) *solvency indicators;*
- 2) *liquidity indicators;*
- 3) *asset turnover indicators.*

The comprehensive use of these groups of indicators (see Table 1) makes it possible to conduct an in-depth and objective analysis and examine the status and dynamics of accounts receivable. Their application in practice provides valuable information for identifying problems related to the management of receivables and for proposing measures to solve them.

**Table 1. Indicators for examining the accounts receivable of Bulgarian public companies**

Indicators	Method of calculation
<b>INDICATORS FOR SOLVENCY</b>	
<i>Financial autonomy ratio</i>	$\frac{\text{Equity}}{\text{Total capital (liabilities)}}$
<i>Equity concentration ratio</i>	$\frac{\text{Equity}}{\text{Total capital raised (liabilities)}}$
<i>Financial leverage ratio</i>	$\frac{\text{Total debt (Accounts payable)}}{\text{Equity}}$
<i>Financial dependency ratio</i>	$\frac{\text{Total debt (Accounts payable)}}{\text{Total capital (liabilities)}}$
<i>Equity manoeuvrability ratio</i>	$\frac{\text{Net working capital}}{\text{Equity}}$
<i>Working capital adequacy ratio</i>	$\frac{\text{Net working capital}}{\text{Current assets}}$
<i>Interest coverage ratio</i>	$\frac{\text{Earnings Before Interest and Taxes (EBIT)}}{\text{Interest expense}}$
<i>Financial stability ratio</i>	$\frac{\text{Equity}}{\text{Current liabilities}}$
<b>LIQUIDITY INDICATORS</b>	
<i>Total liquidity ratio</i>	$\frac{\text{Current assets}}{\text{Current liabilities}}$
<i>Quick liquidity ratio</i>	$\frac{\text{Current assets} - \text{Inventory}}{\text{Current liabilities}}$
<i>Immediate liquidity ratio</i>	$\frac{\text{Cash} + \text{Marketable securities}}{\text{Current liabilities}}$
<i>Absolute liquidity ratio</i>	$\frac{\text{Cash} + \text{Marketable securities}}{\text{Current liabilities}}$
<b>TURNOVER INDICATORS</b>	
<i>Average daily sales</i>	$\frac{\text{Total annual income from sales}}{365}$
<i>Inventory turnover</i>	$\frac{\text{Cost of goods sold}}{\text{Average inventory}}$
<i>Customer receivables turnover</i>	$\frac{\text{Net credit sales}}{\text{Average trade receivables}}$
<i>Total credit cycle</i>	$\text{Days inventory outstanding} + \text{Days sales outstanding} + \text{Days payable outstanding}$
<i>Net trading cycle</i>	$\text{Days inventory outstanding} + \text{Days sales outstanding} - \text{Days payable outstanding}$
<i>Inventory holding period</i>	$\frac{365}{\text{Inventory turnover}}$
<i>Turnover of fixed assets</i>	$\frac{\text{Net sales}}{\text{Average fixed assets}}$
<i>Asset turnover</i>	$\frac{\text{Net sales}}{\text{Average total assets}}$

Source: author's summary.

Tables 2, 3 and 4 summarise the relationship between the financial indicators outlined above and accounts receivable, as well as the relative advantages and disadvantages of each of them.

**Table 2. Indicators for examining accounts receivable through the prism of solvency**

Ratio	Relation to accounts receivable	Advantages	Disadvantages
<b>Financial autonomy</b>	Low financial autonomy may imply that external financing is needed if accounts receivable are high. High accounts receivable may reduce this ratio if the company has to incur additional debt.	Shows the degree of independence from external financing; A good indicator of stability.	Excessively high values may indicate inefficient use of borrowed funds.
<b>Concentration of equity</b>	A high share of receivables in the volume of assets may lead to dependence on external financing.	Reflects the company's security in terms of its creditors; Emphasises stability.	Does not take into account the structure and cost of external funds.
<b>Financial leverage</b>	When the volume of accounts receivable is high, the company may have difficulty in servicing its debt. When the volume of accounts receivable is high, but collectability is low, the company will have to rely more on borrowed funds.	Assesses the effect of debt financing on returns.	Excessive leverage increases financial risk.
<b>Financial dependence</b>	High dependence on external financing may be necessary when the collection rate of receivables is low. If the volume of receivables increases and payments are delayed, the company may become more dependent on long-term debt.	Shows the degree of dependence on external sources.	A high value means the company is riskier for creditors.
<b>Equity manoeuvrability</b>	A low value indicates difficulties in covering liabilities if customers delay payments. A high volume of accounts receivable can reduce this ratio if cash depends on hard-to-collect receivables.	Measures mobility and the ability to respond promptly when liquidity is needed.	The ratio may decline in case of high long-term assets.
<b>Security with own working capital</b>	A high volume of accounts receivable reduces working capital. If receivables are significant and uncollectible, the company will have lower working capital.	Shows the ability of equity to cover short-term needs.	It does not take into account the efficiency with which working capital is used.
<b>Coverage of interest payments</b>	If receivables are not collected effectively, the company may encounter difficulties with interest payments. If money is tied up in receivables, the company may have difficulty covering interest expenses.	Shows the company's ability to service its interest obligations.	It may be unreliable if profits are unstable.
<b>Financial stability</b>	A large volume of uncollected receivables can reduce financial stability. Low collectability of receivables leads to reduced financial stability.	Provides an overall assessment of long-term stability and financial health.	Does not take into account the quality and structure of assets and liabilities.

Source: author's own work

**Table 3. Indicators for examining debtor indebtedness from the perspective of liquidity**

<b>Ratio</b>	<b>Relation to accounts receivable</b>	<b>Advantages</b>	<b>Disadvantages</b>
<b><i>Overall liquidity</i></b>	High accounts receivable can artificially inflate this ratio without improving actual solvency. High accounts receivable can distort the indicator, giving a false impression of good liquidity if the receivables are difficult to collect.	Gives an overall idea about a company's ability to cover its short-term liabilities through all current assets.	Possible overestimation of liquidity, as it also includes assets that are difficult to convert into cash (inventories).
<b><i>Quick liquidity</i></b>	If receivables are large but uncollectible, this ratio will not reflect actual liquidity. More specifically, if a large share of assets are receivables but collection is slow, this ratio may remain high even though actual liquidity is low.	A more realistic assessment of liquidity by excluding inventories from the calculations.	It does not take into account the possibility that some receivables may be difficult to collect.
<b><i>Immediate liquidity</i></b>	High accounts receivable reduce actual cash holdings, which can lead to low immediate liquidity. High accounts receivable lead to low immediate liquidity, as a large share of current assets are "frozen" in receivables.	Assesses a company's ability to cover its liabilities with only the most liquid assets (cash and cash equivalents).	A very restrictive indicator, rarely reaching desired values
<b><i>Absolute liquidity</i></b>	If the company relies too heavily on receivables, this ratio will be low, indicating high financial vulnerability. High accounts receivable significantly worsen this ratio if receivables are not converted into cash flows on time.	A clear indicator of solvency in extreme situations.	It is not realistic for a company to maintain high values of this ratio over a long period.

*Source: author's own work*

**Table 4. Indicators for examining accounts receivable  
from the perspective of assets turnover**

<b>Ratio</b>	<b>Relation to accounts receivable</b>	<b>Advantages</b>	<b>Disadvantages</b>
<b><i>Average daily sales</i></b>	A high volume of accounts receivable may mean that a significant share of these sales are on credit and do not immediately convert into cash.	Allows daily revenue to be assessed and other turnover-related indicators to be calculated.	It does not provide direct information about the efficiency of used assets.
<b><i>Inventory turnover</i></b>	Slow inventory turnover can lead to cash flow problems and increase pressure on accounts receivable.	It shows how effectively the company manages its inventory.	It may fail to take into account the seasonal or specific character of production.
<b><i>Customer receivables turnover</i></b>	A low value means that customers are slow to pay, which increases financial risk and affects liquidity.	Helps assess credit policy and collectability of receivables.	With large credit sales, the situation may seem to be better than it really is.
<b><i>Total credit cycle</i></b>	A high credit cycle indicates that a company waits long for payments, which leads to high accounts receivable.	It provides an overall picture of the time it takes for investments to be converted into cash.	Difficult to calculate accurately in an unstable environment or when accurate data is not available.
<b><i>Net trading cycle</i></b>	If this cycle is long, the company is more dependent on its receivables and more vulnerable to late payments.	It shows the actual time required for recovering invested funds.	Does not take into account all external factors such as market conditions.
<b><i>Inventory holding period</i></b>	Long inventory retention can lead to a lack of liquidity and additional pressure on collecting the receivables.	Helps determine the effectiveness of inventory policy.	Too short a period may pose a risk of stock shortages.
<b><i>Turnover of fixed assets</i></b>	If a company is heavily dependent on accounts receivable, it may be necessary to sell assets to cover liabilities.	Assesses the effectiveness of the use of fixed assets.	It is strongly influenced by the scale of investment and the depreciation policy.
<b><i>Assets turnover</i></b>	If assets are not used efficiently and a large share of them are receivables, the company's liquidity may be under pressure.	Shows the overall efficiency of resource utilisation.	It is difficult to identify a specific problem based on this ratio alone.

Source: author's own work

### **Chapter Three. EMPIRICAL ANALYSIS OF ACCOUNTS RECEIVABLE INDEBTEDNESS OF BULGARIAN PUBLIC COMPANIES**

In Chapter Three, *the* following **working hypothesis** is tested: *companies need a consistent policy for managing their trade receivables that should be adapted to the specifics of each public company.*

The beginning of the chapter presents **the information basis for the analysis of accounts receivable indebtedness of Bulgarian public companies.** The selection of companies for the empirical analysis is purposeful and based on clear market and economic criteria. Seven public companies that are part of the **BG TR30** stock index are analysed: *Speedy AD; M+S Hydraulics AD; Holding Varna AD; Gradus AD; Stara Planina Hold AD; Shelli Group AD; Velgraf Asset Management AD.* The BG TR30 index, calculated by the Bulgarian Stock Exchange (BSE), includes the thirty most liquid and capitalised public companies in Bulgaria which represent a wide range of sectors and a variety of business models. These companies are included in the index based on their market capitalisation, stock exchange activity and representativeness for the economy. This guarantees their importance for the capital market and their influence on the dynamics of the country's economy.

The selected companies operate in various economic sectors – logistics, industry, food and beverage industry, energy, investments and holding structures. This provides an opportunity for a representative and comparative study of different models of working capital management and financial efficiency. It also makes it possible to arrive at conclusions whose relevance is higher and applicable to a wide range of economic entities, rather than limited to a specific sector.

The public nature of the companies in *the BG TR30* implies a high degree of transparency and access to financial statements, which is a key condition for conducting an in-depth quantitative analysis. Therefore, the selection of these companies is not random but is based on objective economic and market

indicators. It aims at ensuring high reliability and analytical significance of the study.

The study period covers four consecutive financial years – from 2020 to 2023. The choice of this time frame is justified both by the scientific validity of the analysis and by economic and market considerations.

Firstly, a four-year period provides sufficient data to track trends and patterns in the financial indicators of the companies under review. Such a time horizon allows for a dynamic (horizontal) analysis to be conducted, through which directions of development, sustainability or volatility in the management of working capital and financial efficiency can be identified.

Secondly, the time frame includes key macroeconomic and market events that have a real impact on business activity – the COVID-19 pandemic (2020–2021), the post-pandemic economic recovery, as well as rising inflation and global uncertainty in 2022–2023. This makes the period particularly suitable for studying the adaptability and financial management of companies in times of crisis and transition to stabilisation. Furthermore, the use of the latest available annual reports ensures that the analysis is up to date and consistent with the current state of the business environment. The data is publicly disclosed and officially certified, which ensures reliability and comparability.

In this regard, the selected four-year period from 2020 to 2023 is long enough to reveal real business trends, and at the same time recent enough to have practical value for current conclusions and recommendations.

The information base for calculating the relevant indicators is the financial statements of the analysed companies (see <https://www.infostock.bg>). A major advantage is its official nature. This renders the assessments based on public reporting more objective compared to the somewhat subjective results obtained solely on the basis of expert assessments.

Hence, the analytical set of tools for analysing and assessing debtor indebtedness developed in the previous chapter is applied to specific public companies in Bulgaria by using real empirical data.

Based on the analysis of public companies, significant differences are established in the management of working capital, business cycles and the efficiency of asset utilisation. Companies such as Stara Planina Holding PLC and Shelli Group PLC demonstrate a stable financial structure, with high efficiency of asset turnover, a short credit cycle and good liquidity, which indicates sustainable management of receivables and inventories. The high turnover of fixed assets is also evidence of good capital efficiency. In terms of the efficient use of fixed assets and assets as a whole, Stara Planina Holding PLC is the leader, with the highest level of economic activity.

The best values in terms of working capital adequacy and high receivables turnover are demonstrated by companies with clearly expressed operational stability, such as Speedy PLC and Stara Planina Holding PLC. On the other hand, Holding Varna PLC shows high instability and negative values of the net trade cycle, which indicates structural difficulties in managing receivables and liabilities.

Speedy PLC and Gradus PLC maintain relatively stable dynamics, but Gradus stands out with long periods for maintaining material stocks and a longer net trade cycle, which indicates room for improvement in operational management.

Holding Varna PLC and Velgraf Asset Management PLC have weaker asset turnover, unstable receivables turnover and negative net trade cycles in some years, which is indicative of problems in the management of short-term receivables and liabilities.

Based on the empirical analysis, it is concluded that the management of accounts receivable in Bulgarian public companies faces a number of **structural and systemic challenges and constraints**.

*Legislative issues* are related to the fact that some regulatory and institutional conditions in Bulgaria create an uncertain legal environment for the management of receivables. The main challenges are in terms of:

- Slow and inefficient court procedures for debt collection, both in civil and commercial proceedings, especially when a collateral is not available;
- Uneven law enforcement practice which makes it difficult to predict the outcome of court or enforcement proceedings;
- Lack of incentives for voluntary settlement: existing legislation does not provide sufficiently effective mechanisms for alternative resolution of disputes or voluntary payments;
- Receivables insurance and factoring are not sufficiently developed in Bulgaria and remain poorly regulated and underutilised in the corporate sector.

Overall, the regulatory framework in Bulgaria poses a significant challenge to the effective management of receivables, even though it formally complies with the requirements of the European Union. The problems arise not so much from the lack of legal basis, but from ineffective law enforcement, inconsistent legislation and weak institutional support.

There are *market problems* since some of the characteristics of the Bulgarian market also pose challenges for the sustainable management of debtors:

- Poor payment discipline – late payments are considered "normal" in some sectors, especially those of construction, trade and services;
- Competitive pressure and price wars – companies often compromise on their credit terms to retain customers;
- Weak risk management culture – few companies have internal credit scoring and limit systems in place;
- Limited liquidity of SMEs – many companies, including suppliers to public companies, rely on delayed payments to finance their operations, which increases the risk for the payee.

In addition, there are *organisational problems*, as many public companies in Bulgaria face operational and structural difficulties at an internal level:

- Lack of specialised credit control departments – this function is often shared by accounting and sales, with no clear entity in charge;
- Insufficient training of staff on the subject of debtors, credit risk and solvency assessment;
- Outdated IT systems – many companies still rely on manual data entry, Excel spreadsheets or accounting programmes without accounts receivable functionality;
- Poor integration between departments – lack of communication between sales, finance, logistics and legal departments leads to incomplete or outdated information about customers.

One of the challenges to the management of accounts receivable in Bulgarian public companies is related to *information issues*, i.e. limited transparency and accountability of financial information. Effective management of receivables relies on reliable, timely and complete accounting data, which is often missing or presented inconsistently. Despite the existing regulatory framework, which is in line with the international accounting standards (IFRS), in practice the information asymmetry between companies, investors and counterparties remains significant. This is reflected in: incomplete or delayed publication of annual and quarterly reports; limited disclosure of accounting policies and estimates, especially for receivables with uncertain collectability; lack of a detailed breakdown by age structure of receivables (aging schedule), which is crucial for risk assessment; inaccurate forecasts; misinterpretation of ratios and even incorrect assessment of the financial health of counterparties; lack of standardised internal practices for managing and reporting trade receivables, which often leads to subjectivity in the classification of receivables.

Another problem is the lack of a public credit register for companies, except for the limited information available in the registers of the Bulgarian National

Bank (for banks and non-bank financial institutions) and the Commercial Register. This makes it difficult to manage credit risk, since it requires access to historical data on solvency, arrears and financial behaviour.

In addition, there are a number of *behavioural and management issues* that affect the effectiveness of receivables management. These include:

- Tolerance towards late payments and a "culture of tolerance" – in many Bulgarian companies, the practice of compromising for customers who do not pay on time still prevails, especially if they are long-term or "strategically important" partners.

- Insufficient commitment from senior management – one of the common problems is the lack of strategic attention to the management of accounts receivable. Managers often perceive this process as an operational or accounting function, without linking it to liquidity, risk and return.

- Conflict between commercial and financial interests – sales teams are often motivated to increase sales without paying attention to customer creditworthiness. As a result, deals are made with high-risk customers just to hit sales targets; tension arises between the sales and finance departments; there is no coordination on acceptable risk levels, credit limits, and payment terms.

- Limited expertise and lack of training – many companies lack trained specialists in credit risk management, and finance teams do not have the necessary analytical tools.

- Lack of standardised internal processes – unregulated or informal processes lead to inconsistency in policy implementation, including: different approaches to customers depending on the employee; inconsistent payment terms; lack of a centralised database for credit history, payments and receivables.

- Widespread delayed payments along the supply chain. This phenomenon is characterised by the fact that even when companies have the necessary funds, they often deliberately delay payments to suppliers, which triggers a cascade

effect of overdue receivables. In Bulgaria, the problem is exacerbated by weak legal and contractual discipline – even when there are contractually fixed payment terms, actual collection often exceeds 60 or even 90 days, especially in the construction sector, wholesale trade and the public procurement sector.

The combined effect of these factors leads to increased credit risk, lower collection rates and higher financing costs for working capital. Overcoming these constraints requires both internal restructuring and improvements in the business environment and legislative infrastructure. Improvements in these aspects is of key importance to the sustainable development of public companies in Bulgaria.

On this basis, **opportunities for improving the management of accounts receivable** are identified. Successful management requires the implementation of well-defined and strategically focused credit policies. The main objective of a credit policy is to ensure *a balance between increasing sales and controlling the risk of non-payment*. An overly liberal credit policy can result in revenue growth but also in a deterioration of collectability, while an overly restrictive approach can limit a company's market share and lead to customer loss. A well-designed credit policy usually has the following elements: 1) criteria for assessing creditworthiness; 2) set credit limits; 3) payment terms; 4) approval procedures; 5) mechanisms for control and reassessment.

In an environment of more and more complex business processes and highly dynamic financial flows, public companies are increasingly relying on *integrated software solutions* for managing their accounts receivable. The implementation of ERP (Enterprise Resource Planning) systems and specialised modules for receivables management is becoming a strategic tool for control, traceability and credit risk prevention.

Automated processes for managing accounts receivable leads to significant improvements in several key aspects:

- *Exercising comprehensive control over receivables* – real-time tracking of obligations, deadlines and receipts;

- *Timely risk identification* – automatic alerts for late payments, exceeded limits or negative trends;
- *Shorter collection cycles* – automated notifications to customers, issuance of reminders, invoices and collection letters;
- *Improved reporting* – detailed reports by customer, region, sector and time period;
- *Higher efficiency* – elimination of manual processing, reduction of errors and availability of resources.

System automation allows companies *to switch from a reactive to a proactive model of risk management* by providing timely information for decision-making and preventing the accumulation of bad debts.

ERP platforms bring together all key business functions in a single environment – finance, sales, procurement, accounting and customer management. The following modules are most commonly used in accounts receivable management: *Accounts Receivable (AR)* (management of invoicing, payments, balances); *Credit Management* (setting limits, payment terms, scoring profiles); *Collections Management*; *Customer Relationship Management (CRM)* (tracking communication and customer history).

Popular ERP systems such as *SAP, Oracle NetSuite, Microsoft Dynamics 365, and Infor* offer comprehensive functionality for management of accounts receivable that is compatible with the needs of large public companies. Some systems also allow integration with external credit bureaus, factoring platforms, accounting systems, and banking services, which expands the possibilities for analysis and control.

Modern systems increasingly incorporate *artificial intelligence (AI)* and *machine learning (ML)* to predict customer behaviour and identify risks. Such technologies enable: forecasting the probability of default; classifying customers by risk; personalising credit terms according to profile; optimising collectability through automatic action planning. According to a PwC study (2022), over 60%

of large European companies already use AI-based solutions for receivables management, which reduces non-performing loans by an average of 20-30%.

The implementation of ERP solutions is related to some challenges as well. Some of the major issues include: high initial costs for software, hardware and training; the need to restructure internal processes; resistance from staff and the need to introduce changes in the work culture; technical support required; adaptation to local regulations and the tax framework. Nevertheless, the long-term benefits by far outweigh the initial investment, especially when the systems are integrated with the corporate strategy for working capital and credit risk management.

In addition to internal policies and systems for managing accounts receivable, public companies are increasingly turning to *external financial instruments and partnerships* to optimise risk, liquidity and operational efficiency. These include factoring, receivables insurance and outsourcing of collection processes.

The main benefits of *factoring* in terms of accounts receivable management are related to: immediate release of working capital; improved liquidity and cash flow; reduced administrative resources for collection; the possibility to remain anonymous for the customer (depending on the form). Factoring is especially popular in sectors with high volumes of deferred payment sales, such as manufacturing, distribution and logistics .

The benefits for public companies from *trade receivables insurance* are in terms of: limiting credit risk; higher investor and shareholder confidence; improved financing conditions, especially when working with banks; bolder entry into new markets and customers. In Bulgaria, the leading companies in this segment are Coface, Atradius and Euler Hermes which work with international clients and provide risk analyses by country, sector and company.

*Outsourcing* is mainly used in cases of chronic late payments; small but numerous debts; situations where direct communication with the customer is

undesirable or ineffective. The advantages of outsourcing are related to: release of internal resources; increased collection rates through professional approaches; reduced tension in customer relations; additional pressure through legal or judicial instruments (if necessary). It is important, however, to select reputable agencies and monitor compliance with ethical and legal standards.

Other external tools that can be used in managing credit risk on trade receivables are: *securitisation of receivables* (converting receivables into tradable securities that are sold to investors); *fintech platforms* (use of digital channels for credit scoring, online factoring and debt collection); *legal protection and legal advisors* (for contracts, penalties and legal proceedings in cases of difficult debtors).

## **Conclusion**

The conclusion presents the final results of the theoretical and applied research on current issues related to the management of public companies' accounts receivable in Bulgaria. It reflects the achievement of the set goal, the working hypotheses, and the research thesis of the dissertation.

### **III. Guidelines for Future Research on the Topic of the Dissertation**

The issue of accounts receivable management is not exhausted by the main areas of research in the dissertation. The topic remains relevant and can be developed in the following directions for further research:

- The proposed model for assessing accounts receivable is "open" in nature, i.e. it can be continuously supplemented and updated by including new data from the published financial statements of public companies.
- There are opportunities for continuously upgrading, expanding and improving the tools used for analysis and assessment, as well as for widening the scope of the public companies studied;
- The model developed in the dissertation is based on external public information. At the same time, work can be done to expand the model by using both external and internal information.

## **IV. Reference to the Scientific and Applied Scientific Contributions of the Dissertation**

1. The key characteristics and the economic significance of the management of trade receivables in modern enterprises are examined in detail.

2. A model for remote assessment of the effectiveness of receivables management through the use of public information is presented. It is based on a system of appropriately selected indicators of solvency, liquidity and turnover which have the required informational significance for this purpose. The causal relationships between them are outlined.

3. The presented model for remote analysis of accounts receivable is tested, and its practical applicability is confirmed. The empirical study is conducted by using real data from the activities of eight public companies in Bulgaria over a period of four years (2020-2023), on the basis of which a comparative analysis is made of their management of trade receivables.

4. The management of accounts receivable in Bulgarian context is critically assessed, and the problems and challenges faced by public companies in Bulgaria are outlined. Based on these, specific opportunities for improving their management of trade receivables are identified.

## **V. List of the Doctoral Student's Publications**

### ***Articles:***

1. **Stoev, B.** Credit risk management: strategic approaches to accounts receivable in public companies//sp. Narodnostopanski arhiv, 2025, issue 3
2. **Stoev, B.** Theoretical foundations of accounts receivable management in public companies: contemporary concepts and approaches//Dialog magazine, 2025, issue 3

### ***Papers:***

3. **Stoev, B.** Theoretical foundations of accounts receivable //Collection of scientific research from the annual conference of the Faculty of Economics of VTU "St. St. Cyril and Methodius", held on 27-28 May 2021, pp. 175-178

## VI. Reference for Compliance with the Minimum National Requirements under the Regulations for the Application of the Law on the Development of Academic Staff in the Republic of Bulgaria

Minimum national requirement in points: **30**

<i>Publications by the author</i>	<i>Points</i>
1. <b>Stoev, B.</b> Credit risk management: strategic approaches to debtor indebtedness in public companies//sp. Narodnostopanski arhiv, 2025, issue 3	10
2. <b>Stoev, B.</b> Theoretical foundations of accounts receivable management in public companies: contemporary concepts and approaches//Dialog magazine, 2025, issue 3	10
3. <b>Stoev, B.</b> Theoretical foundations of accounts receivable //Collection of scientific research from the annual conference of the Faculty of Economics of VTU "St. St. Cyril and Methodius", held on 27-28 May 2021	10
<b><i>TOTAL</i></b>	<b><i>30</i></b>

Total points for the author: **30 = 30**

## VII. Declaration of Originality of the Dissertation

The dissertation, comprising 205 pages, entitled: "MANAGEMENT OF CORPORATE DEBT IN Bulgaria" is authentic and represents the author's own scientific work. It uses the author's ideas, texts and visual elements presented through graphs, diagrams, tables and formulas, in compliance with all requirements of the Copyright and Related Rights Act through proper citation and reference to other authors' ideas and data, including:

1. The findings of the dissertation and the contributions made are original and have not been borrowed from research or publications in which the author has not participated.
2. The information presented by the author in the form of copies of documents and publications, personally compiled reports, etc. corresponds to the objective truth.
3. The scientific results obtained, described and/or published by other authors are duly and thoroughly cited in the bibliography.

Doctoral student:.....

/Boris Stoev/