

## OPINION

**regarding a dissertation for acquisition of the educational and scientific degree of Doctor of Philosophy in professional field 3.8. Economics, Doctoral Programme "Finance, Money Circulation, Credit, and Insurance (Finance)" at D. A. Tsenov Academy of Economics – Svishtov**

**Submitted by:** Assoc. Prof. Petar Pandushev Chobanov, PhD, Department of Finance, UNWE

**Author of the dissertation:** Vladimir Hristov Sirkarov, doctoral student at the Department of Finance and Credit of D. A. Tsenov Academy of Economics – Svishtov

**Title of the dissertation:** Challenges to the Modern Monetary Policy and Optimization of Monetary Aggregates Management

**Scientific Advisor:** Assoc. Prof. Aleksandar Petrov Ganchev, PhD

**Grounds for submission of the opinion:** Order No. 1035 of 02 Dec. 2021 of the Rector of D. A. Tsenov Academy of Economics

### **I. General characteristics of the dissertation**

The dissertation includes a total of 198 pages and comprises an introduction, three chapters, a conclusion, a list of citation references and internet sources. The main text includes 31 figures and 11 tables. The list of references includes references to 104 literary sources. The author has published one study, two articles and one conference paper on the topic of the dissertation.

The dissertation addresses a topical and socially important issue considering the serious challenges faced by monetary policies in recent years in the field of monetary aggregate management.

The main objective of the dissertation is to present a comprehensive study of the possibilities for optimization of money supply management by constructing a monetary aggregate that corresponds to the theoretical concept of money as a universal means of exchange.

The subject of the dissertation is money supply.

The object of the dissertation are the available tools for measuring money supply and defining its theoretical, monetary, and quantitative characteristics.

The thesis defended in the dissertation is that "the traditional monetary aggregates do not represent correctly the money supply in fiat money systems and, therefore, there are possibilities for optimization of the accuracy of their measurement by means of a monetary

aggregate that takes full account of the function of money as a universal means of exchange in all possible transactions”.

The introduction presents the dissertation’s relevance, significance, objectives and tasks, object and subject as well as formulates the research thesis and constraints. It also defines the research approaches and methods and presents an overview of the structure of the dissertation.

Chapter One defines money as an economic phenomenon and presents a historical analysis of money as a universal means of exchange. It addresses the methodological characteristics of Ludwig von Mises’s Regression Theorem, It also defines the functions of money in economic and financial perspective. The types of money and the economic characteristics of money equivalents are defined.

Chapter Two presents monetary systems from an evolutionary and theoretical point of view and traces their evolutionary characteristics from the classical gold standard to the Bretton Woods system. The financial and historical characteristics of fiat money systems are discussed. The traditional concepts for calculation and management of monetary aggregates are critically analyzed.

Chapter Three addresses the optimization of monetary aggregate management. A methodological optimization of the technology for measuring the money supply is proposed. A monetary aggregate that measures more accurately the actual money supply is proposed. An empirical analysis of the impact of money supply on key macroeconomic indicators is performed.

The conclusion summarizes the main findings and conclusions of the research.

## **II. Evaluation of the format and contents of the dissertation**

The dissertation addresses a significant and topical economic issue studied and analysed from a unique scientific perspective. Macroeconomic indicators, including the monetary aggregates, are not static and should be analysed taking into account the dynamics of the economic phenomena and processes.

In the aftermath of the Global Financial crisis followed by the current pandemic, the challenges to monetary policy are visible, with central banks failing achieve their main objective of ensuring price stability. One of the possible reasons is that they cannot measure sufficiently accurately the actual money supply and are thus unable to ensure its optimal management.



The author uses an appropriate scientific style and demonstrates in-depth knowledge of the topic. A large amount of statistical information and indicators is covered, the data is presented correctly, and the literary sources are cited correctly. The research methods are used adequately and the author demonstrates a high degree of knowledge in this regard.

The doctoral student's publications on the topic of the dissertation further prove his scientific and research merits and ensure the public effect of his findings. Therefore, they meet in full the requirement for related publications.

The author's summary consists of 47 pages and meets the relevant normative requirements. It presents in a synthesized form the contents of the dissertation as well as its scientific contributions, a list of the doctoral student's publications, a statement of originality and the aspects for future research in the field.

### **III. Evaluation of the scientific and applied contributions**

The author's summary includes a list of the scientific contributions of the dissertation. They are defined correctly, which gives me the grounds to accept them as completely realistic and based on specific research results. They complement and expand the empirical knowledge, as there are not enough in-depth publications on the topic. This makes the dissertation especially useful both for the academic community and the actual monetary policymakers.

The list includes the following contributions:

- A systematic analysis of money as a universal medium of exchange is used to deduce the classification characteristics of monetary forms;
- The main stages of development of the monetary systems worldwide are defined and their main financial and economic characteristics are presented;
- The dissertation reveals that the classic monetary aggregates M1 and M2 do not represent money supply correctly because, due to the lack of an accurate methodological definition of standard money and monetary substitutes in their structure, they include components that do not have the characteristics of money as they cannot be used to settle directly the liabilities arising from all possible economic transactions;
- The technology for structuring and measuring the money supply is optimized methodologically;
- A new AMS (Actual Money Supply) monetary aggregate which reflects the actual money supply and allows for differentiation of the economic effects of economic transactions with deferred and immediate settlement is proposed and justified. This

aggregate is intended to separate the macroeconomic effects of standard money and cash substitutes and increase the efficiency and effectiveness of the monetary policy utilized by central banks.

- The empirical analysis has proved that the capacity of the AMS monetary aggregate to describe the dynamics of key macroeconomic variables in the US economy is similar to that of the M2 aggregate and is much higher than that of the M1 aggregate and that the priority of the US Federal Reserve monetary policy should be on price stability rather than employment.

#### **IV. Critical notes, questions and recommendations**

The demonstrated knowledge and the practical applicability of this independent and complete scientific research give me the grounds to recommend that the author of this dissertation continue his scientific endeavours and come up with further research publications in this and other related topics.

#### **Questions to the applicant**

1. Can the ECB's failure to maintain price stability, which is the main objective of their monetary policy, be related to an inadequate measurement of monetary aggregates?
2. What are the main challenges to the current monetary system?
3. What are the main practical benefits of the monetary aggregate you propose?

#### **V. General conclusion and opinion**

My conclusion is that the dissertation is a topical, well-grounded, independent and complete and practically feasible scientific work. The author demonstrates an extensive knowledge and well-developed research skills. Doctoral Student Vladimir Sirkarov meets all national requirements according to the LDASRB.

**This provides me with the grounds to propose to the Scientific juri to confer to Vladimir Hristov Sirkarov the educational and scientific degree of "Doctor" in scientific speciality "Finance, Money Circulation, Credit, and Insurance (Finance)".**

Sofia

05 Jan. 2022

Rciewer:

/Assoc. Prof. Petar Chobanov, PhD/