Available online at www.ijournalse.org

**Emerging Science Journal**

(ISSN: 2610-9182)

Vol. 7, No. 6, December, 2023

# Financial Development Strategies: Defining Objectives and Priorities

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**Abstract**

In recent years, scientific and practical interest in the strategic management of countries' financial development has grown significantly. However, an analysis of publications on this topic indicates the absence of a methodology to make strategic decisions on the formation of goals and priorities for financial development. The purpose of this study is to develop a methodology for the strategic management of the financial development of countries. The study uses methods of systemic, comparative, GEP analysis, and a rule-based judgment method. The result of the study is the development of a concept that allows defining strategy, quantified strategic goals and priorities for financial development, and its testing in OECD countries. The novelty of the research lies in the systematic approach to the formation of strategic goals and priorities based on the System of National Accounts, the multi-level system of key indicators of financial development, criteria formalizing alternative strategies, and rules for making strategic decisions. This is the first time such a concept has been proposed. The advantages of the developed concept are high representativeness, objectivity, and a wide range of applications. Its use will improve the quality of strategic management of countries' financial development and ensure transparency in government decisions.

**Keywords:**

Financial Sector;
Financial Development;
Financial Stability;
Financial Sovereignty;
Strategic Management.

**Article History:**

| | | | |
|---|---|---|---|
| **Received:** | 27 | July | 2023 |
| **Revised:** | 04 | November | 2023 |
| **Accepted:** | 12 | November | 2023 |
| **Published:** | 01 | December | 2023 |

## 1- Introduction

In the context of a slowdown in the development of the global economy, there is an increased interest in the strategic management of the financial development (FD) of countries, making it possible to intentionally shape the trajectories of financial flows in the best interests of the state, businesses, and the general population.

The surge in practical interest surrounding the strategic management of countries' FD has led to the emergence of relevant strategic documents developed by national governments [1–3]. However, the analysis of their content highlights several issues that hinder the assessment of the quality, objectivity, and validity of state decisions in this field. Among the most apparent problems are the following: First, the utilization of a limited set of indicators for FD evaluation; second, the general nature of strategic goals, lacking their quantitative expression; third, the fragmented approach to ensuring FD stability; fourth, the absence of targets for achieving the financial sovereignty of countries; and fifth, the disregard for targets related to the quality of strategic management in financial development.

The growing scientific interest in the countries' FD strategic management has led to countless scientific publications on this topic. However, an analysis of these publications indicates the presence of the following gaps:

- The research mainly focuses on determining the role of FD in the countries' economic development [4-6].
- Most studies examining the relationship between FD and economic growth have used separate measures of financial development, which, according to several authors [7-8], often yield contradictory results.

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**DOI:** http://dx.doi.org/10.28991/ESJ-2023-07-06-09

- FD is equated with the development of only the financial sector in national economies and is analyzed without considering the systemic risks inherent in this development. Meanwhile, as noted in the publication [9], excessive growth in the financial sector can provoke a financial crisis.
- In theoretical studies, there is no distinction between concepts such as "goals" of financial development, as well as "directions", "ways", and "methods" of achieving these goals, which leads to the identification of these concepts and negatively affects the format of strategic documents [10].
- Scientific publications do not address issues related to determining the quantitative values of strategic goals, which makes it difficult to assess the quality of strategic documents and prevents monitoring the achievement of these goals.
- The publications do not contain information about alternative FD strategies and recommendations for choosing a country's FD strategy considering the competitive environment.
- Without the attention of researchers, the issues of assessing the competitive position of countries in terms of the level of financial development at the global level of the world economy remain [11-13].
- The publications do not contain recommendations on the selection of priority areas and ways to achieve strategic goals, which makes it difficult to assess the quality of government strategic decisions.

These gaps indicate that publications on the strategic management of the countries' FD have a predominantly applied nature, necessitating fundamental research on this topic.

This study aimed to develop a methodology for the strategic management of the countries' FD in the form of a new concept. This concept should contain the principles of strategic management of the countries' FD, including a system of key indicators used to determine strategic goals and priorities for FD, a system of criteria that sets the parameters of alternative strategies, and rules for making strategic decisions regarding the choice of strategy, strategic goals, and priorities.

The developed concept should be tested using data from OECD countries for 2007-2022. Based on the test results, FD strategies should be developed for the United States and Great Britain for 2023-2025. The results obtained are compared with similar studies conducted by other authors to assess their adequacy.

## 2- Literature Review

An analysis of the scientific and specialized literature on financial development at the national and global levels reveals several key topics that are currently debated.

First, a significant portion of publications focus on the impact of financial development on countries' economies, highlighting its vital role in long-term economic growth and positive influence on economic restructuring [14–15]. FD contributes to money multiplication [16], increases investment, innovation, and entrepreneurial activity [17–18], and enhances the efficiency of resource markets [19]. Furthermore, financial development reduces the size of the shadow economy [20] and decreases income inequality [21].

Second, a considerable number of publications center around indicators that measure the FD processes, currently developed through three methodological approaches. The quantitative (first) approach relies on traditional indicators of the monetary market [22–24]. The advantage of this concept is the availability of a vast array of statistical data publicly available for countries worldwide, which enables building time series over a long period and conducting a comparative cross-country analysis. However, at the same time, this approach has its limitations. As noted by Eryigit & Dulgeroglu [25], this approach may not be sufficient for assessing the financial system comprehensively and determining appropriate policies for its development. The qualitative (second) approach, on the other hand, measures the FD level based on qualitative characteristics such as depth, accessibility, efficiency, and stability of the financial sector [26–28]. This approach employs a broader range of primary indicators compared to the previous one. However, a higher number of indicators does not necessarily result in more objective and reliable research findings. In addition, different sets of these indicators can lead to opposite conclusions (see, for example, [29]). The third methodological approach (systemic), which is relatively new, utilizes the matrix of financial assets from the System of National Accounts (SNA) to measure financial development [30]. This approach considers all financial flows in the economy and their interconnections.

Third, there is a growing number of publications that explore the problems of stability of financial development. Most of these publications are devoted to diagnosing the stability of financial markets and financial systems. Financial market stability analyses are often based on either interest rate analysis [31-32] or identifying phases of the credit cycle [33-35]. The stability of financial systems, particularly the banking sector, is also a prominent research area. This analysis employs established indicators (e.g., Z-score) and stress tests [36]. In addition, studies of the stability of the financial market and financial systems are based mainly on selective observations. Samples generally include individual countries and their small groups.

This approach reflects the specifics of macroeconomic conditions, the organizational structure of the economy, the scale of financial activities, and the values and goals of countries. Consequently, conducting a comparative analysis and identifying systemic risks will be challenging. Publications directly addressing the stability of financial development and reflecting all financial flows in the economy and their interrelations are considerably rare [37]. Nevertheless, these publications contain crucial recommendations for developing universal and objective indicators that allow for comparative analysis and the formulation of country ratings regarding the stability of financial development.

Fourth, there is a growing scientific and practical interest in the problems of ensuring the financial sovereignty of countries. Publications on this topic highlight the relevance of studying financial sovereignty in the context of geopolitical and geo-economic instability. They emphasize the need to develop strategies to strengthen financial sovereignty, enabling national financial systems to maintain stability and independence from external shocks [38-40]. Some publications contain recommendations for financial sovereignty assessment and safeguarding in modern conditions [41].

Fifth, in the last decade, there has been a scientific and practical interest in the strategic management of the countries' FD. Studies in this area encompass a relatively limited range of scientific publications as well as policy and analytical documents. These publications analyze the impact of strategy quality, foreign direct investment, and state financing of the economy on the development of the financial sector [42, 43]. Some publications note the lack of methods for analyzing combinations of quantitative and qualitative criteria for making strategic decisions and provide recommendations for improving FD strategic management through the use of "quantitative VRIO" [44], as well as criteria that signal the need to mitigate or tighten FD regulations in different macroeconomic conditions [37, 45]. Policy documents, as a rule, describe the general intentions of public administration bodies instead of quantitatively expressed strategic goals and priorities to improve financial development without a deep justification for their choice [46–48].

Based on the above, it can be concluded that the studies carried out to date differ in understanding, measuring, and assessing FD stability. These studies are mainly fragmented and do not contain recommendations to form quantified strategic goals and priorities. Policy and strategic documents on financial development have a general nature and, in essence, are a memorandum of intent. This indicates an insufficient elaboration of the theory and methodology of strategic management of FD processes and makes it difficult to assess the effectiveness of government decisions in the financial sector. Given these gaps, new research is necessary for FD strategic management to primarily focus on developing quantified strategic goals and priorities for financial development.

## 3- Methods

The study uses a new concept to form strategic goals and priorities for the countries' FD, developed based on a systematic approach to measuring financial development. The authors call this approach "5S". This concept relies on the principles of consistency, comparability, and objectivity of the results obtained.

The principle of consistency is implemented by applying a systematic approach to the definition of strategic goals based on the methodology of the System of National Accounts (SNA) [49]. The SNA is used in terms of the formation of financial balances, the content of which is given in Table A1. The statistics for the empirical study are taken from Account No. 720, Financial Accounts—Non-Consolidated—SNA 2008 [50]. The principle of comparability is implemented by calculating FD indicators in relation to the population and using the same criteria for all countries for a qualitative assessment of the countries' FD levels. Objectivity is ensured through the actual values of indicators by "cleansing" them from inflation.

Following the principle of consistency, the proposed concept will be based on a system of key indicators, including three levels (Figure 1).

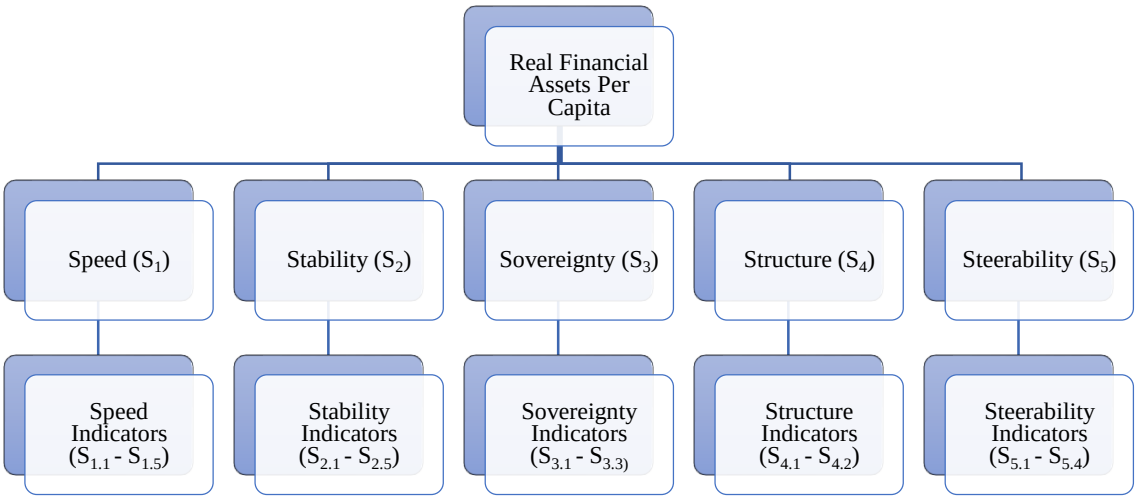


**Figure 1. System of key indicators of financial development of countries**

The first level is represented by the only indicator designed to determine the overall strategic goal - "Real financial assets per capita" - since this indicator has a clear advantage over the used in research and practice, as it allows more representative and objective estimates of the FD level.

The second level consists of five indicators characterizing different aspects of the countries' financial development: speed ($S_1$), stability ($S_2$), sovereignty ($S_3$), structure ($S_4$), and steerability ($S_5$). These indicators define future trends in key areas of financial development and contribute to achieving the general goal. The second-level indicators were formed as follows. First, speed ($S_1$) and stability ($S_2$) were included in their composition due to the increased attention from government authorities, international financial organizations, central banks, and the scientific community. Second, an indicator of financial sovereignty was included due to the increase in geopolitical challenges and threats, the destruction of integration ties, and the restructuring of international financial flows and the global monetary system. Third, the list of the second-level indicators included a structure indicator reflecting the share of investments in countries' financial assets because investment is the most important source of economic growth. In addition, setting goals for this indicator makes it possible to coordinate financial development policies with the economic policies of states. Fourthly, a new indicator was included in the second level indicators - manageability, which had not previously been used in financial development studies. The growing public attention to the effectiveness of government regulatory measures highlights the expediency of using this indicator.

The third level further specifies the indicators of the 2nd level, particularly indicators $S_1$ and $S_2$ in the context of economic sectors: non-financial corporations (NFC), financial corporations (FC), public administration (PA), households and non-profit organizations serving households (HH and NPOSH), and the rest of the world (RW), along with the specification of indicators of sovereignty ($S_3$) and structure ($S_4$) - by their types. At the same time, the degree of specification is limited by the classification of articles of the SNA financial balance. It is important to note that the indicators of the 3rd level set the parameters of the main paths of financial development and ensure the achievement of the goals of the 2nd level.

The choice of indicators of the 2nd and 3rd levels is due to the increased attention from government bodies, international financial organizations, central banks, and the scientific community.

### *3-1- Quantifying the Countries' FD Level*

To quantify the overall level of the countries' FD, it is advisable to use Equation 1:

$$D = A_3/(P \times I) \quad (1)$$

where:

- $D$ - real financial assets per capita,
- $A_3$ - nominal financial assets,
- $P$ - population,
- $I$ - inflation (CPI).

The following equations are proposed to quantify the directions ($S_i$) and paths ($S_{ij}$) of financial development.

### *3-2- Speed ($S_1$)*

To determine the rate of overall financial development ($S_1$), it is proposed to apply the indicator "Growth rate of real financial assets per capita", calculated by Equation 2:

$$S_{1,j} = D_{j,n}/D_{j,n-1} - 1 \quad (2)$$

where:

- $S_{1,j}$ – growth rate of real financial assets per capita,
- j – number of the entire economy (j =0) and its sectors (j =1;5),
- n – period number.

### *3-3- Stability ($S_2$)*

To determine the stability of financial development, it is advisable to use the equations proposed in [37].

$$S_{2,j} = S_{1,j} - TS_{1,j} \quad (3)$$

$$TS_{1,j} = a \times k + b \quad (4)$$

where:

- $S_{2,j}$ – index of stability of financial development,
- $TS_{1,j}$ – trend in the growth rate of real financial assets per capita,
- a, b – parameters of the trend equation,
- k – period number (k = 1; n),
- n – number of observation periods.

### *3-4- Sovereignty ($S_3$)*

To quantify the financial sovereignty of countries, it is proposed to calculate the index of financial sovereignty ($S_{3.0}$) and its components, including the index of monetary sovereignty ($S_{3.1}$), the index of debt sovereignty ($S_{3.2}$) and the index of stake sovereignty ($S_{3.3}$). These indices are calculated by determining the share of domestic sources of financing for the development of countries in the total amount of financing (from internal and external sources), according to the algorithm published in [41]:

$$S_{3,0} = (L_1 + C_1)/(L_3 + C_3) \quad (5)$$

where:

- $L_1$ - domestic financial liabilities,
- $C_1$ - domestic financial capital,
- $L_3$ - all (internal and external) financial liabilities,
- $C_3$ - all (internal and external) financial capital.

$$S_{3,1} = \sum_{j=1}^{2} l_j/(L_3 + C_3) \quad (6)$$

where:

$l_j$ - monetary financial liabilities (Table A1), j=(1-2).

$$S_{3,2} = \sum_{j=3}^{8} l_j/(L_3 + C_3) \quad (7)$$

where:

$l_j$ - debt financial liabilities (Table A1), j=(3-8).

$$S_{3,3} = C_1/(L_3 + C_3) \quad (8)$$

### *3-5- Structure ($S_4$)*

To quantify the structure of the financial development of countries, it is proposed to calculate the share of all domestic investments ($S_{4.0}$), including the share of the portfolio ($S_{4.1}$) and direct ($S_{4.2}$) investments in the total financial assets (A3) of the country.

These indicators are calculated as follows:

$$S_{4,0} = S_{4,1} + S_{4,2} = a_{3,1}/A_3 + a_{5,1}/A_3 \quad (9)$$

where:

- $a_{3.1}$ – debt securities of the domestic economy (Table A1);
- $a_{5.1}$ – capital and shares/units of investment funds of the domestic economy (Table A1);
- $A_3$ – all financial assets (TableA1).

### *3-6- Steerability ($S_5$)*

To assess the steerability of the countries' FD, it is proposed to use the Equation 11, which characterizes the relative deviation of the achieved level of financial development from the reference values of strategic goals. It is advisable to calculate this deviation for all key indicators (except for $S_{5.2}$) using the following equation:

$$S_{5,j} = 100 - 100 \times (Z_{5,j} - F_{5,j})/Z_{5,i} \quad (10)$$

where:

- $S_{5,j}$ – index of manageability of financial development;
- $Z_{5,j}$ – target reference value of the indicator $S_{5,i}$;
- $F_{5,j}$ – actual value of the indicator $S_{5,j}$;
- j – type of indicator $S_5$, (j=0, 1, 3, 4).

It is proposed to assess the steerability of stability by the financial development of $S_{5.2}$ based on the following equation:

$$S_{5,2} = 100 - 100 \times (F_{5,2} - Z_{5,2})/Z_{5,2} \quad (11)$$

### *3-7- Qualitative Assessment of the FD Level*

To qualitatively characterize financial development, it is proposed to use the criteria presented in Table 1, allowing for the formation of five FD levels: high, adequate, acceptable, low, and negative.

**Table 1. Criteria for qualitative assessment of financial development**

| Level | Key metrics | | | | | |
|---|---|---|---|---|---|---|
| | **Development (D)** | **Speed ($S_1$)** | **Stability ($S_2$)** | **Sovereignty ($S_3$) *** | **Structure ($S_4$) *** | **Steerability ($S_5$) **** |
| High | $k_4 \leq D$ | $m_3 < S_1$ | $0 \leq \lvert S_2 \rvert < n_4$ | $r_3 < S_3 \leq 100$ | $h_3 < S_4 \leq 100$ | $v_3 < S_5$ |
| Adequate | $k_3 \leq D < k_4$ | $m_2 < S_1 \leq m_3$ | $n_4 \leq \lvert S_2 \rvert < n_3$ | $r_2 < S_3 \leq r_3$ | $h_2 < S_4 \leq h_3$ | $v_2 < S_5 \leq v_3$ |
| Acceptable | $k_2 \leq D < k_3$ | $m_1 < S_1 \leq m_2$ | $n_3 \leq \lvert S_2 \rvert < n_2$ | $r_1 < S_3 \leq r_2$ | $h_1 < S_4 \leq h_2$ | $v_1 < S_5 \leq v_2$ |
| Low | $k_1 \leq D < k_2$ | $0 < S_1 \leq m_1$ | $n_2 \leq \lvert S_2 \rvert < n_1$ | $0 < S_3 \leq r_1$ | $0 < S_4 \leq h_1$ | $0 < S_5 \leq v_1$ |
| Negative | $0 \leq D < k_1$ | $S_1 \leq 0$ | $n_1 \leq \lvert S_2 \rvert$ | $S_3 \leq 0$ | $S_4 \leq 0$ | $S_5 \leq 0$ |

* Explanation of parameters $S_3$ and $S_4$

| Level | Sovereignty ($S_3$) | | | Structure ($S_4$) | |
|---|---|---|---|---|---|
| | **Monetary ($S_{3.1}$)** | **Debt ($S_{3.2}$)** | **Stake ($S_{3.3}$)** | **Portfolio investment ($S_{4.1}$)** | **Direct investment ($S_{4.2}$)** |
| High | $r_{1.3} < S_{3.1} \leq 100$ | $r_{2.3} < S_{3.2} \leq 100$ | $r_{3.3} < S_{3.3} \leq 100$ | $h_{1.4} \leq S_{4.1} \leq 100$ | $h_{2.4} \leq S_{4.2} \leq 100$ |
| Adequate | $r_{1.2} < S_{3.1} \leq r_{1.3}$ | $r_{2.2} < S_{3.2} \leq r_{2.3}$ | $r_{3.2} < S_{3.3} \leq r_{3.3}$ | $h_{1.3} \leq S_{4.1} < h_{1.4}$ | $h_{2.3} \leq S_{4.2} < h_{2.4}$ |
| Acceptable | $r_{1.1} < S_{3.1} \leq r_{1.2}$ | $r_{2.1} < S_{3.2} \leq r_{2.2}$ | $r_{3.1} < S_{3.3} \leq r_{3.2}$ | $h_{1.2} \leq S_{4.1} < h_{1.3}$ | $h_{2.2} \leq S_{4.2} < h_{2.3}$ |
| Low | $0 < S_{3.1} \leq r_{1.1}$ | $0 < S_{3.2} \leq r_{2.1}$ | $0 < S_{3.3} \leq r_{3.1}$ | $h_{1.1} \leq S_{4.1} < h_{1.2}$ | $h_{2.1} \leq S_{4.2} < h_{2..2}$ |
| Negative | $S_{3.1} \leq 0$ | $S_{3.2} \leq 0$ | $S_{3.3} \leq 0$ | $0 \leq S_{4.1} < h_{1.1}$ | $0 \leq S_{4.2} < h_{2.1}$ |

** Steerability criteria ($S_5$) are the same for all key indicators of the 2nd and 3rd levels

The proposed criteria are formed based on a sample of countries corresponding to the level (global, interregional, regional, and local) adopted for the construction of ratings. Within the framework of the formed sample, countries are ranked by key indicators, followed by a breakdown of the total interval of positive values into ranges. At the same time, negative or zero values of indicators (except for $S_2$) will correspond to the "negative" level, since they contradict the development process. It is important to note that the values of the criteria for financial sovereignty ($S_{3.0}$) are the sum of the criteria designed to assess the levels of monetary ($S_{3.1}$), debt ($S_{3.2}$), and stake ($S_{3.3}$) sovereignty, and the values of the criteria for the structure of financial assets ($S_{4.0}$) are the sum of the criteria designed to assess the levels of portfolio ($S_{4.1}$) and direct ($S_{4.2}$) investment.

The formed criteria make it possible to determine the target reference values of indicators of steerability of financial development ($S_{5,i}$). It is advisable to set these values at a level corresponding to the lower limit of the "high" range. The selection of the mentioned range has at least three advantages. First, it corresponds to the desire of countries for international leadership in financial development while putting all countries on equal conditions. Third, it excludes the elements of subjectivity that invariably arise in the case of using in the calculations not reference, but planned goals approved by public authorities. The choice of the lower limit of the "high" range is because this range does not contain upper limits for some indicators.

The qualitative characteristics of the countries' FD (Table 1) are, in fact, the parameters of strategic alternatives, which can be formulated as follows:

- Growth strategy, consisting of increasing the level of financial development (according to the general indicator);
- Limited growth strategy, consisting of maintaining the level of financial development (according to the general indicator);
- Reduction strategy that includes reducing the FD level (according to the general indicator).

It is advisable to determine the quantitative and qualitative values of the strategic goals for financial development, including the general goal and key indicators of the 2nd and 3rd levels, guided by the following rules:

- ***Rule 1*** - The qualitative values of strategic goals for financial development should reflect the desire to maintain a high FD level (if this level has already been achieved) or the desire to move to a higher level in the planning period, compared to the previous period, simultaneously across the entire spectrum of strategic goals;
- ***Rule 2*** - The quantitative values of strategic goals for financial development should correspond to the achievement of higher positions of the country in the international ranking of countries in the planning period, compared to the previous period, simultaneously across the entire spectrum of strategic goals;
- ***Rule 3*** - Priority directions and ways of financial development are formed from key indicators of the 2nd and 3rd levels, which correspond to the worst values (low and negative levels) of these indicators in the reporting period, emphasizing the imperfection of market mechanisms and the need for state intervention in market processes.

Implementing these rules will help focus on essential aspects of financial development, streamline the mechanism for achieving targets, including incentive and restrictive measures, and enhance the quality of FD monitoring.

## 4- Results

The developed indicators, criteria, and rules were tested using data from OECD countries derived from invoice No. 720, specifically the financial accounts - non-consolidated - SNA 2008 for the years 2007-2022 [49].

This testing made it possible to determine the criteria values for FD qualitative assessment, as presented in Table 2.

**Table 2. Criteria for qualitative assessment of financial development**

| Level | Key metrics | | | | | |
|---|---|---|---|---|---|---|
| | **Development, thousand USD (D)** | **Speed, % ($S_1$)** | **Stability, % ($S_2$)** | **Sovereignty, % ($S_3$) *** | **Structure, % ($S_4$) *** | **Steerability, % ($S_5$) **** |
| High | $1000 \leq D$ | $6<S_1$ | $0\leq\|S_2\|<2$ | $75<S_3\leq100$ | $45<S_4\leq100$ | $75<S_5$ |
| Adequate | $500 \leq D< 1000$ | $4<S_1\leq6$ | $2\leq \|S_2\|<4$ | $50<S_3\leq75$ | $30<S_4\leq45$ | $50<S_5\leq75$ |
| Acceptable | $250 \leq D <500$ | $2<S_1\leq4$ | $4\leq \|S_2\|<6$ | $25<S_3\leq50$ | $15<S_4\leq30$ | $25<S_5\leq50$ |
| Low | $100 \leq D< 250$ | $0<S_1\leq 2$ | $6\leq \|S_2\|<8$ | $0<S_3\leq25$ | $0<S_4\leq15$ | $0<S_5\leq25$ |
| Negative | $0 \leq D <100$ | $S_1\leq0$ | $8\leq \|S_2\|$ | $S_3\leq 0$ | $S_4\leq0$ | $S_5\leq0$ |

* Explanation of parameters

| Level | Sovereignty ($S_3$), % | | | Structure ($S_4$), % | |
|---|---|---|---|---|---|
| | **Monetary, % ($S_{3.1}$)** | **Debt, % ($S_{3.2}$)** | **Stake, % ($S_{3.3}$)** | **Portfolio investment, % ($S_{4.1}$)** | **Direct investment, % ($S_{4.2}$)** |
| High | $15<S_{3.1}\leq100$ | $45< S_{3.2}\leq100$ | $15< S_{3.3}\leq100$ | $15<S_{4.1}\leq100$ | $30<S_{4.2}\leq100$ |
| Adequate | $10<S_{3.1}\leq15$ | $30< S_{3.2}\leq 45$ | $10< S_{3.3}\leq15$ | $10<S_{4.1}\leq15$ | $20<S_{4.2}\leq 30$ |
| Acceptable | $5<S_{3.1}\leq10$ | $15< S_{3.2} \leq30$ | $5< S_{3.3}\leq10$ | $5<S_{4.1}\leq10$ | $10<S_{4.2}\leq20$ |
| Low | $0<S_{3.1}\leq5$ | $0< S_{3.2}\leq15$ | $0< S_{3.3}\leq5$ | $0<S_{4.1}\leq5$ | $0<S_{4.2}\leq10$ |
| Negative | $S_{3.1}\leq0$ | $S_{3.2}\leq0$ | $S_{3.3}\leq0$ | $S_{4.1}\leq0$ | $S_{4.2}\leq0$ |

** Steerability criteria (S5) are the same for all key indicators of the 2nd and 3rd levels

The criteria for the FD level, FD stability, and financial sovereignty were taken from the publications [37, 45], and [52], respectively. The criteria for speed of development, structure, and steerability were established by the authors, considering the minimum and maximum values of these indicators across all OECD countries from 2007 to 2022.

The key indicators for the USA and the UK in 2022 were calculated using these statistics, and the qualitative and quantitative strategic goals were formulated for these countries from 2023 to 2025 (Table 3).

**Table 3. USA and UK Strategic Objectives 2023-2025**

| Goals | USA | | | | UK. | | | |
|---|---|---|---|---|---|---|---|---|
| | 2022 (actual) | 2023 | 2024 | 2025 | 2022 (actual) | 2023 | 2024 | 2025 |
| Development (D), thousand USD | 899 | 980 | 1068 | 1164 | 869 | 921 | 977 | 1035 |
| Speed ($S_1$), % | -7.1 | 9 | 9 | 9 | -13.92 | 6 | 6 | 6 |
| *NFC* | -4.84 | 10 | 10 | 10 | -18.82 | 7 | 7 | 7 |
| *FC* | -6.59 | 8.5 | 8.5 | 8.5 | -11.73 | 5 | 5 | 5 |
| *PA* | 2.75 | 7 | 7 | 7 | -20.55 | 4 | 4 | 4 |
| *HH and NPISH* | -6.69 | 9 | 9 | 9 | -22.00 | 8 | 8 | 8 |
| *RW* | -12.93 | 10 | 10 | 10 | -11.99 | 7 | 7 | 7 |
| Stability ($S_2$), % | 12.62 | 1.84 | 1.45 | 1.07 | 16.25 | 3.34 | 3.00 | 2.66 |
| *NFC* | 12.44 | 1.25 | 0.57 | 0.11 | 21.35 | 2.37 | 1.8 | 1.24 |
| *FC* | 10.87 | 2.24 | 1.88 | 1.51 | 10.69 | 3.21 | 2.99 | 2.76 |
| *PA* | 2.93 | 0.7 | 0.62 | 0.53 | 18.13 | 3.43 | 3.68 | 3.94 |
| *HH and NPISH* | 12.74 | 1.56 | 1.19 | 0.81 | 21.60 | 4.47 | 4.12 | 3.78 |
| *RW* | 19.99 | 2.56 | 2.19 | 1.81 | 15.17 | 3.47 | 3.12 | 2.78 |
| Sovereignty ($S_3$), % | 87.08 | 91.8 | 94 | 97 | 99.59 | 99.6 | 99.6 | 99.6 |
| *Monetary* ($S_{3.1}$) | 7.85 | 8 | 9 | 10 | 24.98 | 24 | 23 | 22 |
| *Debt* ($S_{3.2}$) | 83.77 | 82.8 | 82 | 82 | 75.29 | 74 | 73 | 72 |
| *Stake* ($S_{3.3}$) | -4.54 | 1 | 3 | 5 | -0.68 | 1.6 | 3.6 | 5.6 |
| Structure ($S_4$), % | 44.96 | 45.5 | 47.0 | 49.5 | 19.64 | 25 | 31 | 38 |
| *Portfolio investment* ($S_{4.1}$) | 12.84 | 13 | 14 | 16 | 6.60 | 9 | 12 | 16 |
| *Direct investment* ($S_{4.2}$) | 32.12 | 32.5 | 33.0 | 33.5 | 13.04 | 16 | 19 | 22 |
| Steerability ($S_5$), % | 90.0 | 98.0 | 106.8 | 116.4 | 86.9 | 92,1 | 97,7 | 104 |
| *Speed* ($S_{5.1}$) | -118 | 150 | 150 | 150 | -232 | 100 | 100 | 100 |
| *Stability* ($S_{5.2}$) | -431 | 108 | 127.5 | 146,5 | -616.76 | 33 | 50 | 67 |
| *Sovereignty* ($S_{5.3}$) | 83.9 | 122.4 | 125.33 | 129.33 | 132.79 | 132.8 | 132.8 | 132.8 |
| *Structure* ($S_{5.4}$) | 91.1 | 101.11 | 104.44 | 110 | 43.64 | 55.56 | 68.89 | 84.44 |

To determine the general strategic goals, data on the value of real financial assets per capita in the USA and UK from 2007 to 2022 (Figure 2) were utilized, along with the rules for forming strategic goals.

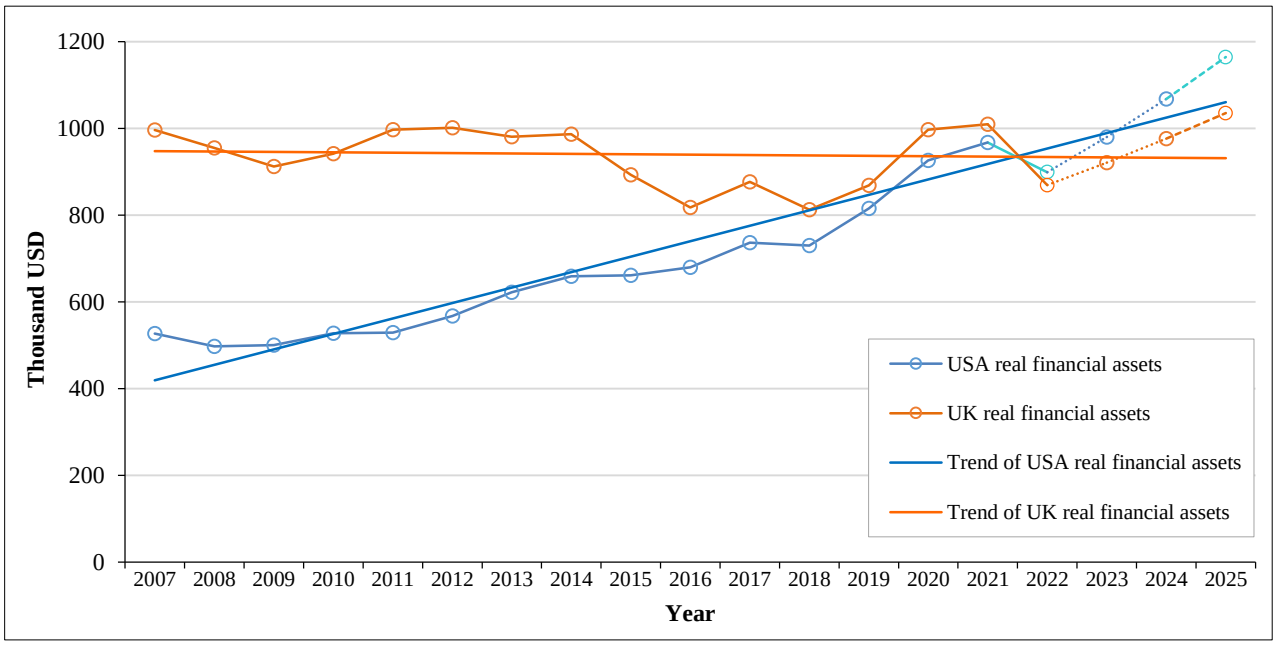


**Figure 2. Real financial assets per capita USA and UK, 2007–2025, thousand USD**

Analysis of the dynamics of real financial assets per capita during 2007-2022 shows that the USA adhered to the growth strategy, and the UK pursued the reduction strategy during this period. This confirms the upward nature of the trend in the USA and downward in the UK, as calculated for 2007-2022.

Taking into account rule 1 in the methodology of this study, the qualitative value of the general goal for the USA at the end of the planning period (2025) can be defined as achieving a new level of financial development for the country, namely "high", and for the UK - as achieving the level of "high", already attained by this country in 2012 and 2021.

Taking into account rule 2 in the methodology of this study, the quantitative value of the general goal at the end of the planning period (2025) can be determined for the USA and UK as $1164,000 and $1035,000, respectively. The achievement of these general goals is supported by an annual growth rate of real financial assets per capita of 9.0% and 6.0% for the USA and UK, respectively. These growth rates are not excessively high due to the FD stability projected to be at the "high" level for the USA and the "adequate" level for the UK from 2023 to 2025.

The target values of financial sovereignty ($S_3$) were determined considering maintaining the already attained high level by both countries (rule 1) and a slight increase in their international positions on this indicator from 2022 to 2025 (rule 2).

Targets for the structure of financial assets ($S_4$) were set based on the transition of the analyzed countries to a new and higher quality level. For the USA, it involves moving from the "adequate" to the "high" level, while for the UK, it means transitioning from the "acceptable" to the "adequate" level.

Target values of FD steerability ($S_5$) were calculated by the quantitative value of general strategic goals. Throughout the planning period from 2023 to 2025, these values will correspond to the previously achieved "high" level in 2022 (rule 1) with an improvement in their positions on the indicator. The manageability will increase from 90.0% to 116.4% for the USA and from 86.9% to 104.0% for the UK by the end of the planning period (rule 2). The value of these indicators above 100% is because the target reference values for this indicator ($S_{5,i}$) were set at 75%.

Level 3 strategic goals were defined for the USA and UK (Table 3) as follows. The FD rates of economic sectors ($S_{1.1}$ - $S_{1.5}$) were determined by the selection method. At the same time, the condition was observed that the weighted average growth rate of financial assets of economic sectors was equal to the growth rate of financial assets of the entire economy ($S_1$). The FD stability of economic sectors ($S_{2.1}$ - $S_{2.5}$) was calculated based on Equations 3 and 4 using planned parameter values. Target values for monetary, debt, and equity sovereignty ($S_{3.1}$ - $S_{3.3}$) were set taking into account their achievability. In this case, the sum of the target values of monetary, debt, and equity sovereignty had to be equal to the target value of financial sovereignty ($S_3$). Target values for portfolio and direct investments ($S_{4.1}$ - $S_{4.2}$) were determined considering their achievability and were totally equal to the target value of all investments ($S_4$). Particular goals for the FD manageability ($S_{5.1}$ - $S_{5.4}$) were calculated based on Equations 10 and 11 using planned parameter values.

According to the calculations performed, by 2025, all FD indicators are expected to reach higher levels than in 2022 for both countries. Strategic goals for the USA (excluding monetary and shared sovereignty) will correspond to the "high" level, while the UK will have 13 out of 25 targets at a high level. The strategic goals for the USA indicate its intention to continue implementing the growth strategy (Figure 2), while the UK focuses on transition from a reduction to a growth strategy (Figure 3). This transition will be reflected in the change of trend parameters towards a decrease in negative values.

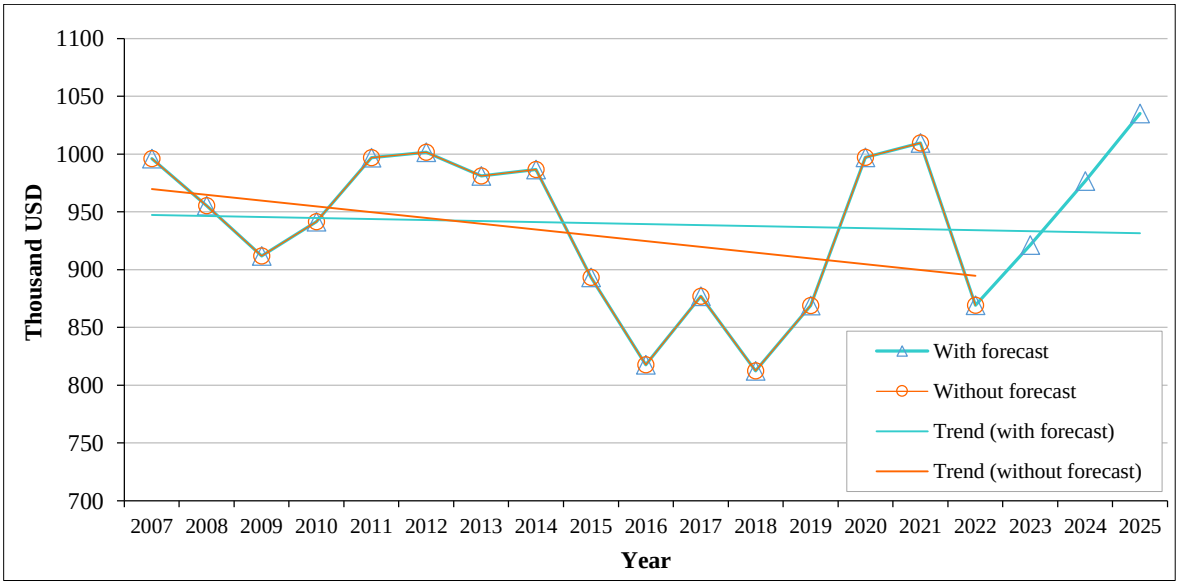


**Figure 3. Trends in UK real financial assets per capita 2007–2022 and 2007–2025, thousand USD**

Thus, the use of the "5S" concept in the development of strategic documents made it possible to formulate a strategy for the financial development of the analyzed countries for the planning period while determining trajectories of financial development in key areas ($S_1$-$S_5$) and also forming a system of quantitatively expressed strategic goals linked with calculation algorithms.

It is important to note that the system of strategic goals for financial development of the USA and Great Britain, presented in Table 3, is one of the acceptable options, although not optimal. Further research is required using appropriate mathematical methods to optimize decisions on the formation of strategic goals.

According to the data analysis in Table 3, the gap in the levels and values of key indicators between their actual and planned values is not the same, potentially because some key indicators were at the "negative" level and had very low values in 2022. It is logical to assume that improving these indicators will require much public administration effort. In this regard, these indicators can be regarded as priorities for financial development.

According to rule 3, the priority areas for financial development of the USA from 2022-2025 are to increase the growth rate of real financial assets per capita from -7.1% to 9.0% per year and to enhance the FD stability from 12.62% to 1.07%. Thus, the main ways of achieving financial development in the USA include increasing the growth rate of real financial assets per capita and enhancing the FD stability in sectors such as non-financial corporations, financial corporations, households, non-profit organizations serving households, and the rest of the world sector. Additionally, increasing the controllability of the FD speed and stability and improving the share of the country's sovereignty will also contribute to financial development.

For the UK, the priority areas for financial development from 2023-2025 are to increase the growth rate of real financial assets per capita from -13.92% to 6.0% per year and to enhance the FD stability from 16.25% to 2.66%. Thus, the main ways of achieving financial development in the UK include increasing the growth rate of real financial assets per capita and enhancing the FD stability in all sectors of the economy while increasing the controllability of the FD speed and stability and improving the share of the sovereignty of the country.

## 5- Discussion

As a result of the study, a concept, including principles, rules, indicators, and criteria, was developed to form quantified strategic goals and priorities for the countries' FD. This study is the first step towards formalizing the strategic goals and priorities of financial development, distinguishing it from previous studies and highlighting its scientific novelty. The study also produced a 3-level system of key indicators of countries' FD, which differs from the indicators developed in previous studies as follows. In contrast to the methodological approach, called "quantitative" in the literature review, the developed system of indicators uses such new individual indicators as the value of monetary, debt, and stake sovereignty of countries, the share of portfolio and direct investments in the domestic economy in the financial assets of countries, steerability (quality of management), speed, stability, sovereignty and structure of financial development.

In contrast to the methodological approach, referred to as "qualitative" in the literature review, the developed system of indicators defines the indicator "height of financial development" as general and transferred from the third level to the first [10] because each level is designed to solve a special management task in the developed system of indicators. In particular, level 1, 2, and 3 indicators are used to determine the quantitative and qualitative characteristics of the general strategic goal, financial development areas, and financial development paths, respectively.

In addition, the study used such indicators of financial development as height, speed, stability, sovereignty, structure, and steerability, which differ from the previously developed qualitative characteristics (height, availability, efficiency, and stability). Thus, the following indicators have been added to qualitative characteristics: speed of financial development, financial sovereignty, structure of financial assets, and FD steerability. The first of these indicators is important in determining the type of strategy and controlling excessive financial development. The second indicator characterizes the degree of independence of public administration bodies in making strategic decisions in the financial sector. The third indicator focuses on investment as the main source of financial resources for economic development. The performance indicator was replaced with the manageability indicator for the following reasons. Studies conducted by other authors propose to measure and evaluate the effectiveness of financial development based on the stock market turnover ratio, net interest margin of banks, credit-deposit spread, non-interest income concerning the total income, and overhead concerning the total amount of assets, and return on assets of financial institutions. These indicators characterize the efficiency of the market and the quality of financial development management within the financial corporations' sector. For the purposes of strategic management of financial development, the indicator of steerability is preferably used since it allows assessing the quality of FD public management across the entire range of key indicators, i.e., the effectiveness of government intervention in all market processes. The indicator of accessibility of financial services was not included in the list of qualitative characteristics of financial development since, according to the authors of this study, it most likely refers not to the goals of financial development but to the ways of achieving these goals.

In contrast to the methodological approach, referred to in the literature review as "systemic", real values of countries' financial assets are used instead of nominal values when determining indicators.

The study used well-known formulas to quantitatively and qualitatively assess the speed of financial development and the structure of financial assets. To assess the stability of financial development and the financial sovereignty of countries, the recommendations set out in publications [37, 41] were used. The algorithm for the quantitative and qualitative value assessment of the general indicator and the FD steerability was developed by the authors of this study for the first time.

In the study, groundbreaking advancements were made in formulating key indicators for the FD assessment of nations and the establishment of methodologies to quantify strategic goals and determine priorities, marking the first instance of such principles being devised. A judgment-based method derived from these principles can be employed to formulate strategic goals. This approach enables the identification of various plausible strategic goals. Consequently, an area promising for further exploration lies in optimizing these goals through the utilization of mathematical models.

Notably, within the study, the strategic goals for financial development of the United States and the United Kingdom were determined based on their respective standings in the OECD country ranking. An even more prospective avenue for enhancing the findings would involve the application of a rating scale and criteria that align with the global position of the world economy when identifying the strategic goals of these nations.

## 6- Conclusions

The availability of a solid theoretical and methodological foundation for formulating strategic goals and priorities is crucial to ensure the quality enhancement of public management in terms of the countries' FD. However, an analysis of publications on this topic reveals disparities in understanding, measuring, and evaluating financial development thus far. These studies are predominantly fragmented and lack recommendations for establishing quantified strategic goals and priorities. Policy strategic documents related to financial development primarily take a general approach and essentially serve as memoranda of intent. This study aims to address these deficiencies.

As a result of this study, the authors have developed a concept, termed "5S", to formulate quantified strategic goals and priorities for financial development. The concept incorporates principles, rules, indicators, and criteria necessary for making decisions regarding the qualitative and quantitative aspects of strategic goals and priorities.

The developed concept was applied to data from OECD countries ranging from 2007 to 2022, enabling the determination of strategic goals and priorities for the USA and UK between 2023 and 2025. The findings from the trial period of 2007-2022 indicate that the USA pursued a growth strategy, while the UK focused on a reduction strategy. In 2022, the real per capita incomes in both countries reached an "adequate" level, amounting to $899,000 in the USA and $869,000 in the UK. Meanwhile, other key indicators varied across different levels of financial development, ranging from a "negative" to a "high" level.

Following the formulated strategic goals, the USA will continue implementing its growth strategy from 2023 to 2025, which aims to raise the real per capita income to $1,164,000 by the end of the planning period in 2025. The priority areas for financial development in the USA will involve increasing the growth rate of real financial assets per capita from -7.1% to 9.0% per year, enhancing the FD stability from 12.62% to 1.07%, and focusing on greater financial development and controllability across sectors of the economy (excluding the public administration sector), as well as increasing the country's share of sovereignty.

For the UK, the years 2023-2025 will witness a transition from a reduction to a growth strategy, which aims to raise the real per capita income to $1,164,000 by the end of the planning period in 2025. The priority areas for the UK financial development encompass increasing the growth rate of real financial assets per capita from -13.92% to 6.0% per year, improving the FD stability from 16.25% to 2.66%, and focusing on greater financial development and controllability across all sectors of the economy, alongside an increase in the country's share of sovereignty.

This study is novel since it has developed a concept for establishing quantified strategic goals and priorities for financial development, encompassing principles, rules, indicators, and criteria necessary for decision-making concerning the qualitative and quantitative attributes of strategic goals and priorities. Notably, this concept has been devised for the first time.

The proposed concept fills the following gaps in scientific research:

- It eliminates fragmentation in the selection of indicators used for analysis and goal setting in the field of strategic management of the countries' FD by forming a three-level system of key indicators based on the application of a systematic approach and SNA methodology;
- It complements the existing range of indicators with a new indicator, financial sovereignty, which plays an important role in the context of growing geopolitical tensions and restructuring of international financial flows, while also proposing an indicator of FD stability, calculated based on the general key indicator proposed by the authors;

- It provides for the differentiation of such concepts as “goals” of financial development, as well as “directions” and “paths” to achieving these goals;
- It contains formulations of alternative strategies for the countries' FD and criteria that set the parameters of these strategies in the form of levels of financial development;
- It includes algorithms for determining the competitive position of countries across the entire range of key indicators used to determine strategic goals and priorities for financial development;
- It contains the principles and rules for making strategic decisions to choose an alternative strategy and the quantitative values of strategic goals and to determine priority directions and ways to achieve them.

In scientific terms, the results of the study develop the theory and methodology of strategic management of financial development at the macroeconomic level and open up great opportunities for further improvement based on the use of quantitative methods.

The advantages of this developed concept reside in its high representativeness, objectivity, and wide range of applications. Its implementation holds the potential to enhance the quality of strategic management in relation to countries' financial development while ensuring the transparency of government decisions.

## 7- Declarations

### *7-1- Author Contributions*

Conceptualization, G.G. and E.Z.; methodology, G.G. and E.Z.; software, E.Z.; validation, G.G. and E.Z.; formal analysis, G.G. and E.Z.; resources, G.G. and E.Z.; writing—original draft preparation, G.G. and E.Z.; writing—review and editing, G.G. and E.Z.; visualization, G.G.; supervision, G.G. and E.Z.; project administration, G.G. and E.Z.; funding acquisition, G.G. and E.Z. All authors have read and agreed to the published version of the manuscript.

### *7-2- Data Availability Statement*

Publicly available datasets were analyzed in this study. This data can be found here: https://stats.oecd.org/Index.aspx?DatasetCode=SNA_TABLE720.

### *7-3- Funding*

The research was funded by the Russian Science Foundation (project No. 23-28-01020).

### *7-4- Institutional Review Board Statement*

Not applicable.

### *7-5- Informed Consent Statement*

Not applicable.

### *7-6- Conflicts of Interest*

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

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# Appendix I: Financial Balance Sheet

**Table A1. Financial Balance Sheet**

| Code of Items | Name of Elements | Domestic Economy | Rest of the World | Total |
|---|---|---|---|---|
| I. AF | Financial assets | $A_1$ | $A_2$ | $A_3$ |
| 1. AF | Monetary gold and SDRs | $a_{11}$ | $a_{12}$ | $a_{13}$ |
| 2. AF | Currency and deposits | $a_{21}$ | $a_{22}$ | $a_{23}$ |
| 3. AF | Debt securities | $a_{31}$ | $a_{32}$ | $a_{33}$ |
| 4. AF | Loans | $a_{41}$ | $a_{42}$ | $a_{43}$ |
| 5. AF | Equity and investment fund shares/units | $a_{51}$ | $a_{52}$ | $a_{53}$ |
| 6. AF | Insurance pension and standardized guarantees | $a_{61}$ | $a_{62}$ | $a_{63}$ |
| 7. AF | Financial derivatives and employee stock options | $a_{71}$ | $a_{72}$ | $a_{73}$ |
| 8. AF | Other accounts receivable | $a_{81}$ | $a_{82}$ | $a_{83}$ |
| II. LF | Financial liabilities | $L_1$ | $L_2$ | $L_3$ |
| 1. LF | Monetary gold and SDRs | $l_{11}$ | $l_{21}$ | $l_{31}$ |
| 2. LF | Currency and deposits | $l_{12}$ | $l_{22}$ | $l_{32}$ |
| 3. LF | Debt securities | $l_{13}$ | $l_{23}$ | $l_{33}$ |
| 4. LF | Loans | $l_{14}$ | $l_{24}$ | $l_{34}$ |
| 5. LF | Equity and investment fund shares/units | $l_{15}$ | $l_{25}$ | $l_{35}$ |
| 6. LF | Insurance pension and standardised guarantees | $l_{16}$ | $l_{26}$ | $l_{36}$ |
| 7. LF | Financial derivatives and employee stock options | $l_{17}$ | $l_{27}$ | $l_{37}$ |
| 8. LF | Other accounts receivable | $l_{18}$ | $l_{28}$ | $l_{38}$ |
| III. CF | Financial capital | $C_1$ | $C_2$ | $C_3$ |

**Source:** Authors' development based on SNA materials [50].