Volume XXI 2018
ISSUE no.1
MBNA Publishing House Constanta 2018

Scientific Bulletin of Naval Academy

SBNA PAPER • OPEN ACCESS

The Major Determinants of International Financial Markets' Functional Efficiency

To cite this article: Catalin Popa, Filip Nistor and Ana Maria Monica Popa, Scientific Bulletin of Naval Academy, Vol. XXI 2018, pg. 168-172.

ISSN: 2392-8956; ISSN-L: 1454-864X

doi: 10.21279/1454-864X-18-I1-028

The Major Determinants of International Financial Markets' Functional Efficiency

Catalin Popa[1], Filip Nistor[2] and Ana Maria Monica Popa[1]

[1] Mircea cel Batran" Naval Academy, 1[st]Fulgerului Street, Constanta, Romania, catalin.popa@anmb.ro
[1] Mircea cel Batran" Naval Academy, 1[st]Fulgerului Street, Constanta, Romania, nistor.filip@anmb.ro
[1] Mircea cel Batran" Naval Academy, 1[st]Fulgerului Street, Constanta, Romania, monica.popa@yahoo.com

Abstract. *The financial market dynamics as part of International Monetary and Financial System (IMFS), become very relevant and important at least due to the last two last decades experiences, when the excessive diversification, the lack of regulation and weaker monitoring policy implementation have marked on negative manner the market game, disrespecting the economic rationales on regional and global level. On the present paperwork, the authors have aimed to describe the most relevant functional determinants of the market efficiency, with the reference of market value assessment, risk diversification tendencies and capital allocation process. Following the proposed theoretical model comprising the market efficiency variables, the article conclusions are focused on functional depiction of International Monetary and Financial System dynamics and its sensibilities related to the market game and speculations.*

1. Introduction

At the level of financial and monetary markets, the analysis of the effects recorded against the world economy starts from the interpretation of the **functional efficiency** category, which has become extremely current, as proved by the recent developments on the international markets. Thus, at least at the theoretical level, resuming the previous theory of the French economist Michel Aglietta, developed in one of his most well-known works, the efficiency of the monetary and financial markets manifests itself in four different directions: *informational* efficiency, *market value arbitration* efficiency, *diversification of risks* efficiency and *allocation process* efficiency. (Aglietta, 2001)

The informational efficiency of markets is manifested by the presence of a symmetrical form of access to the specialized information, defined by the same level of quality and fidelity for all participants in transactions, and it is possible to accurately anticipate the effects of information on the price and retrieve it in the established level of transactions. Therefore, the working hypothesis would be to provide and to assure the symmetry of the information and equivalent treatment to information access on the market variables, once the conclusion leading to the information efficiency is related to the reflection accuracy of the data units regarding the market price evolution, as determined by the environmental variables.

On the other hand, the efficiency in establishing the fundamental market value is only possible providing the main actors with a reasonable information efficiency and refers to the ability of the market price to reflect the real value of financial assets. As we can see from the evolution of the mortgage crisis triggered in mid-2007, the differences between the market value and the fundamental value of the securities are as higher as the more virulent the speculative effect will be, accentuating the market volatility and instability and multiplying the interactive sensitivity of their short-term and long-term liquidity. Ideally, the effectiveness of the fundamental value aims the stage at which only the change in the securities' market value and only the relevant information on asset valuation may affect the market price evolution in the long run.

The risk diversification efficiency aims to homogenize the risk perception in the market analysis by considering the entire information set on environmental variables, the evaluation of yields and the price change compared to the fundamental one. According to the Arrow-Debrew equilibrium theory (ADM model), the existence of a full range of competitive markets is necessary and sufficient to achieve optimal balance (Border K.C., 2000). In this perspective, the main condition for ensuring efficiency should be the development of competitive markets, leading to risk diversification and uniform distribution through a successive chain of coverage techniques. The emergence of the parallel derivatives market makes sense on this perspective, its role in mitigating market reactions and managing the risk portfolio, being absolutely justified.

Ideally, we believe that the balance would be attained when, as opposed to the stock market, it would have developed a set of derivatives markets that take the risk, diversify it and manage it so effectively that the chain of the propagation of negative effects is enough segmented to mitigate the shocks or to completely relocate this imbalances outside the market price arbitration process in order to distinctively separate the market rational acts to the speculative market behavior. Only in this case market developments will be reflecting the information efficiency and the equilibrium of market price deviations versus fundamental prices, in terms of expressing the real expected returns on short and long term in relation with the assets performance as economic rationales (Holstrom B., 1997). However, the derivatives markets functional variables are looking today very diluted and, being far "deviated" from the principle of risk diversification and becoming in the last decade the "camouflage" of unattractive portfolios. The danger of an exaggerated diversification of the market issued securities was felt by the effects of the financial crisis triggered in 2007, when the supervisory and regulatory bodies were acknowledged as being virtually outdated and overwhelmed by the increasingly sophisticated techniques, implementer on the derivatives markets practices.

2. The efficiency of the capital allocation process

Based on the cumulative three conditions of the functional efficiency as presented above, the efficiency of the capital allocation process is determined as a decisive factor in ensuring the international monetary and financial markets equilibrium. The efficiency of the relocation process refers to the quality of financial flows, attributed, as the case may be, to the economic or, in rebound, to the speculative rationales, based on market behavior propensity. Synthetically, in the figure bellow is depicted the manner in which the allocation efficiency should be achieved, starting from the two basic behavioral alternatives of the market actors, based on the aforementioned information, price and risk premises.

In the first situation, the injected capital comes mainly from social-private savings (of non-specialized individuals or legal entities) and the accumulations are directed towards investments in the monetary or financial market area, which ensure a superior performance comparing to the bank deposits returns. Market players will interfere directly on the market by calling the intermediaries, thus retaining their decision-making power. The allocated amounts will take the shape of direct or long-term portfolio investments, relying on the desire for wealth growth, based on future profits arising from the widening, diversification or streamlining of the production processes, directly related to the real economy afterwards.

In the second case, the capital comes also from economic agents' savings, but the money allocation will not directly target the long term investment decision, being allotted through the filter of specialized financial institutions. Thus, hoping for higher returns but on the short term, this actors will count on the specialized institutions expertise to access the market investments. These financial institutions will act on behalf of their clients on the basis of the accumulated capital functioning as savings catalysts but mainly carrying out speculative actions, always aiming at obtaining short-term profits. There are speculative transaction flows that are defined by a higher degree of sensitivity to spot liquidity on the market.

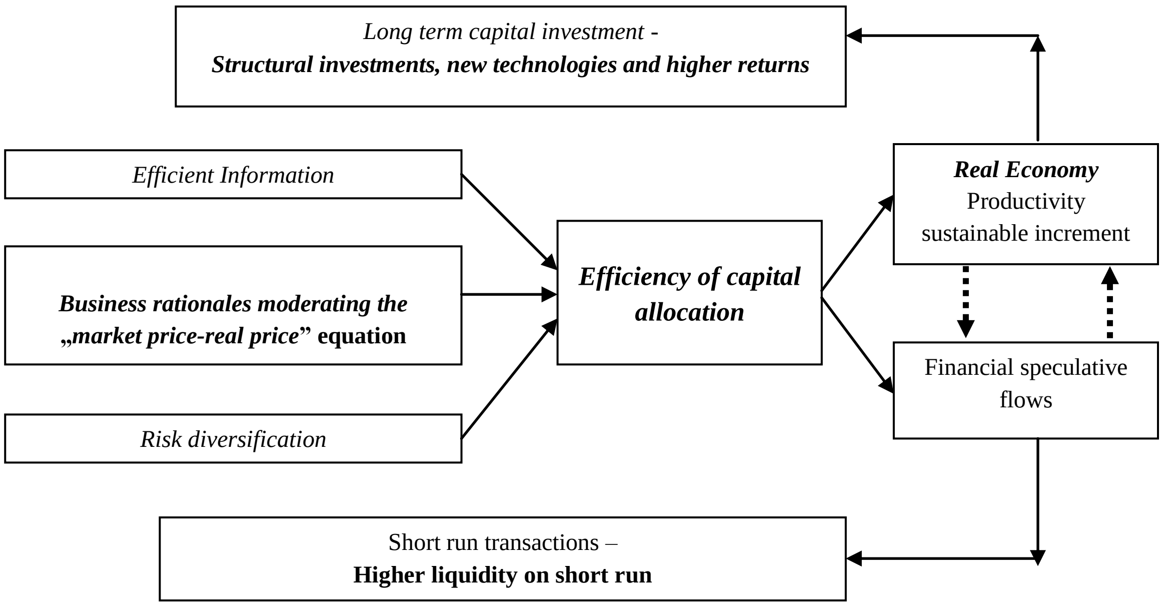

Figure no. 1: *The factors influencing the efficiency and the qualitative allocation of the capital*

Beyond the primary reason about maximizing the profits that underpin any economic activity, for market makers or noisy traders, liquidity, or short-term perspective, is the main quality criterion pursued in the resources allocation process. Thus, the efficiency of capital allocation is given by the sensitivity level of monetary-financial market in relation with the investors' short-term behavior and expectations and with their preference for long-term profits, resumed by higher economic returns and significant technological progress. Efficiency is expressed in the first situation depending on the liquidity level on the market and, in the second situation, depending on the productive capitalization of capital and on the provision of higher economic returns. The qualitative ratio established between the financial flows generating economic added value and technological updates required by the real economy progress (i.e. real financial flows) and the speculative financial flows incurred from the hedge funds (nominal financial flows), counts the efficiency of the allocation capital.

The behavioral investment rationale within the "financial system - global economy" ratio should be an economic one, based on higher returns perspective or a wealth accumulations one, based on physical assets built, actions that subsequently will lead to the beneficial flow of health capital toward the productive system in real economy. Or alternatively, the rationale could follow the speculative game, redefining the investment bias to the temporary perspective and focused on short-term advantages, betting on spectacular and artificial increments in market values. If the market information will be symmetrical, timely and complete, on the background of unrestricted access to these data, investors can shape a reliable feeling on the market and can be much clearer articulated when formulating the market actions.

3. Functional determinants for International Monetary and Financial System efficiency

The analysis of the monetary-financial system in regard of the manifested interdependencies against the world economy components does not accept only global or international approaches and concepts. The interaction of the monetary-financial system with the world economy will consist on functional level even on a smaller scale, respectively, at the level of impacting the major macroeconomic variables. This relationship is a double one, dedicated to two major directions: the demand side and the supply side (Ionescu L.C., 1999).

In regard of "demand economy," decisions making process related to the output level and final consumption in fundamentally depending on the financial strength of economic agents. High levels of indebtedness, uncorrelated with a consistent revenue stream, can limit the private sector's absorption capacity and are able to hamper the economic expansion (Hazlitt H, 1995).

It is interesting to note that the development and further evolutions recorded by a national economy lead to distinct stages in terms of the risk perception quality. Thus, when economies are structurally adjusted, the prudence is maximal, risk appetite is minimal, and financial decisions are well grounded, especially in terms of indebtedness and future returns, which are constantly questioned. But with economic growth, risk perceptions are gradually "unsorted" (qualitatively diminished), and prudential levers become "relaxed", especially in the final stages of defining a stable economic environment (especially for emerging or developing economies) in which there is an improvement in terms of exchange terms and the economic environment at macro level. At this stage, under the market forces pressure along the national economy dynamics, there is a tendency to design the business assessments, starting from recent positive experiences, the expectations being too optimistic, actually encouraging the financial imbalances on assumed risks. It is the case of the Mexican crisis, the Argentinian crisis or, in part, the case of the last crisis triggered in mid-2007, when either the artificial inflation of the asset's value or the overstatement of the state's ability to bear the effects of short run, on the background of excessive optimistic appreciation of future performance. Overbidding the debt leverage and the market prices deviation from real values against the real economy's ability to bear the shocks, will determine a major imbalance on medium and long term, permanently detracting the "ephemeral" economic effects short.

In regard of the "supply-side economy", the monetary-financial sector faces the same environmental variables as in the case of the real economy performance evolution. The supply of monetary-financial resources is initially at the level of the domestic environment. Together with the developing economies 'opening up' and with the capital flows liberalization, the financial sector is shaken by external pressures, which will cause competition bursting, ultimately forcing an asymmetric alignment of the capital intermediation sector. The risk neglecting of external financial forces, caused by total ignorance of environmental variables or the predominance of speculative behavior (in relation with the investor performance) and excessive reliance on the domestic financial sector, could lead to a creation of high volatile and sensitive market. Speculative run after short-term yields, granted by an excessive positive outlook in regard of emerging economies, may turn into a negative trend at the first sign of capital withdrawn, case when the national or regional financial sector will remain isolated massively pressured exerted from outside.

The price of assets plays an essential role both for the demand and supply economies perspectives, being the ultimate and sometimes neglected link between the monetary-financial system and the global economy. On wealth perspective, real assets are represented by securities or issued values to be traded on the primary and secondary financial markets. Beyond short-term speculative reasons, accumulation has the ultimate long-term goal of increasing or expanding property rights either by taking over assets or by gaining further dividends or future benefits. Private sector decisions and strategies are driven by changes in the financial and real assets prices, the market valuation of these values incorporating in turn all excessive optimistic or pessimistic expectations of market participants.

The evolution of the market prices of all assets categories, determined either by negotiated prices or by the arbitrary stock exchange quotations, is decisive for the relationship "private sector - financial intermediaries", in the sense that the economic agents receive or not the financial resources required to be able to withstand against the economic shocks, in order to develop their production capacities or to preserve the results of the global technological revolution. As a result of the lack of real and nominal economic and financial indicators, economic outcomes can be significantly influenced by market attitudes, information imbalances, capital allocation or risk spreading, rebounding over the national balance of payments, foreign exchange terms and affecting the level of economic growth, employment rate, the price levels, or other macroeconomic indicators.

4. Conclusions and final remarks

The relationship between the monetary and financial system and the global economy is therefore organic, and the neglecting of one or other of the dimensions in setting up the financial and economic governance strategies and policies can lead to severe system syncope, which affects at least the short- and medium-term equilibrium on global level. If in August 2007 there was a financial crisis related to the faulty management of some derivatives portfolios, one year later, because of the organic connections between the two financial, economic and economic dimensions, we could also talk about an economic crisis, determined by the volatility of funding sources level and structure toward the real economy. Obviously, as a fundamental lever of the two systems, the credit and other forms of financing are the essences of the functioning of any segment of the real economy on regional and global level. In this context, the economic recession phase, following this market game, should correct severely, at considerable cost, both dimensions: on the one hand, the monetary-financial system will review its lending, financing, investment, supervision and risk assessment systems and instruments, and on the other, the real economy will restructure its output according to real socio-human needs, based on new standards, that will fully express the new valences of the market value.

References

[1.] Aglietta M., *Macroeconomie financiară*, vol. II, Ed. C.N.I. „Coresi” , Bucureşti, 2001

[2.] Border K.C., *Brief Notes on the Arrow–Debreu–McKenzie Model of an Economy*, California Institute of Technology, 2000

[3.] Hazlitt H., *The Critics of Keynesian Economics*, The Foundation for Economic Education Inc.,New York,1995

[4.] Holstrom B., Tirole J., *Financial Intermediation, Loanable Funds and the Real Sector*, Quaterly Jurnal of Economics, No.3, 1997

[5.] Ionescu C.L., *Macroeconomie şi economie internaţională*, IBR, Bucureşti, 1999