

JOSEPH STIGLITZ

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Joseph Stiglitz, professor at Columbia University and convinced Neo-Keynesian, received the Nobel Prize jointly with G. A. Akerlof and A. M. Spencer in



2001 for research into „information asymmetry in the market“ and analysis of „moral hazard“ in economics.

Joseph Stiglitz was born on 9th February 1943 at Gary, Indiana in the USA. It is interesting that Paul Samuelson, another very important winner of the Nobel Prize for economics, was born in the same city.

Joseph E. Stiglitz attended state schools. From 1960 to 1963, he studied at Amherst College, a small university in New England. He directed his attention to economics in his third year of study. He left Amherst College in his last year of study, because he got a grant to study at the Massachusetts Institute of Technology (MIT). He was only later awarded an additional degree diploma and still later, an honorary doctorate.

Study at the MIT was important for the development of his profession as an economist. He spent two years at the MIT as a student and then continued to study there for a doctorate. He was taught by outstanding teachers, including at least four winners of Nobel Prizes: Samuelson 1970, Solow 1987, Modigliani 1985 and Arow 1972. His first paper presented at an academic event was compiled jointly with George Akerlof, with whom he also shares the Nobel Prize. After completing his first year of study at the MIT, he was offered the chance to critically review Paul Samuelson's articles. Even after leaving the MIT, he was long known as the best critical reviewer of Samuelson's articles.

In 1965-1966, Stiglitz gained a grant to study at Cambridge University. From Cambridge he returned to the MIT, but after a year he left to teach at Yale University. One reason for this was to delay being drafted for the war in Vietnam. During this period, he continued to work on the dynamic of economics, and he began to concern himself with the problem of uncertainty in economics, which led him to work on the role of information in the economics.

The main subject of J. Stiglitz's interest in researching dynamics was the stability of the market economy. Together with Karl Shell, he pointed to the fact that a competitive economy with future, still growing markets will generally be exposed to an unstable dynamic. According to Stiglitz, we will not find problems

with instability and ineffectiveness only if we consider a variant of the assumption of rational expectations, if we create simple models with a long time horizon.

Stiglitz's work on uncertainty in economics led him to research on information asymmetry and more generally to work on the imperfect informedness of actors in the market. Stiglitz pointed to the results of the economic behaviour of actors in the market. The first course he taught was on statistics, and specifically on the use of the theory of probability to explain statistical inexactness.

A further key work was a book on public finance "Economics of the Public Sector", in which he clarifies the principles of the functioning of a correctly managed and cautious state. In his lecture on the occasion of receiving the Nobel Prize, he stated that from various points of view, information is a public commodity, and so it is improbable that a private market will secure effective allocation of resources, when information is an endogenous factor. His further works were directed towards more exact definition of the origin of failure of the market.

His stay in Kenya was important for the development of J. Stiglitz's thinking on the economics of information. It helped him to understand the basic problems a poor country has to struggle with. He also had a chance to learn about the problems of an economy, which differs very much from a functioning market economy. Similarly, the fact that he grew up in Gary, Indiana, helped him to understand problems such as wage discrimination, which led to him realizing that certain pre-conditions for the functioning of the market were not consistently fulfilled in practice.

Although J. Stiglitz devoted the majority of his professional effort to teaching economics and to economic research, he also briefly devoted his attention to consultancy activity. He attached great importance to the problems of public policy. His first great consultancy project was a direct result of his work on imperfect information. It was oriented to information externality, which happened at the time of the oil boom. Further consultancy, connected mainly with violations of anti-trust



rules or with questions of the role of the central government gave Stiglitz stimuli for clarification of how markets really function and how companies behave in these markets. Joseph Stiglitz now teaches economics and finance at Columbia University. He received the Nobel Prize for analysis of "moral hazard" in economics.

In 1993, he became the chief economic advisor to Bill Clinton. He promoted reduction of the public debt and budget deficit. In 1997, he was appointed to the position of chief economist and vice president of the World Bank, which gave him direct access to information about development aid. He gave up this position in 2001.

J. Stiglitz also thought about the new challenges and problems of globalization. He has written the book "Globalization and its Discontents", which asks the

architects of globalization the basic question: Why does the USA, when threatened by recession react with appropriate relaxation of monetary and fiscal policy, while the IMF advises or even forces developing countries to do exactly the opposite? Stiglitz's arguments have evoked much discussion in the ranks of both the supporters and opponents of globalization.

J. Stiglitz argues that the private owner looks after property better than the state, so removal of restrictions on the economy supports development. However, it is necessary to bear in mind that in countries, where the market system is only emerging and beginning to operate, this principle has many exceptions. Joseph Stiglitz is a person, who knows very much about these exceptions.

Information asymmetry in the market

Stiglitz's scientific work on uncertainty in economics led him to knowledge about information asymmetry and the general imperfect informedness in the market, which was only a short step from the generalization, that the market is not ideal. Stiglitz and his colleagues G.A. Akerlof and A.M. Spencer are convinced that even small deviations from rationality in the relations between individual actors in an economy cause macro-economic break downs. In classical or neo-classical economic models, a key element is the assumption that the market is perfect. Buyers and sellers have equal power and opportunity to achieve a satisfactory price. They have perfect information, they know who sells cheaper and who buys at a higher price. However, the real market is not perfect, on one side are privileged actors, on the other disadvantaged participants. Some companies can wait before selling because they have reserves, while others must sell at any price. Some know much about the goods and conditions in the market, others know nothing.

According to Stiglitz and the neo-Keynesians in general, unequal access to information and the unequal position of actors are typical of real markets.

If we take this assumption into account, it is entirely clear that the market does not contribute to the optimal redistribution of the resources available to society. In other words, the theory of economics needs to be supplemented. The balance of supply and demand as the basic thesis of every standard economics textbook is only a theoretical hypothesis. Well managed companies employing highly qualified workers should clearly prosper in the market, but the reality is much more complicated. The company wins by illegally destroying the ethics of trade, because by doing so it eliminates the competition.

Joseph Stiglitz realized that the classical or neo-

classical model of the market did not pay attention to the pre-condition of access to information, and it also completely ignored technological progress. He became a supporter of Joseph Schumpeter, emphasizing the importance of innovations, but he pointed to the fact that an established monopoly may persist, it does not have to be a short-term matter.

At the beginning of the 1970s, Stiglitz took an interest in alternative approaches to the functioning of the market founded on the evolutionary basis of Hayek. He was interested in evaluation of the evolutionary process. He considered that the key question was whether freely functioning markets can achieve the effective desired evolution without external intervention, and whether it is possible to intervene in these markets in ways, which would lead to better results. According to Stiglitz, this question has still not been sufficiently researched. He stated in his lecture on receiving the Nobel Prize that there are limits to the evolution of the free market. Only part of this problem lies in the imperfections of the capital market.

Stiglitz's views on the inadequacy of the standard model were fully expressed in the discussion of the process of transformation of the former socialist economies into market economies. In this process, he emphasized the importance of competition, the central government, finance and more widely also the institutional including the legal infrastructure. However, he did not place much emphasis on privatization. He belonged to the group of experts sometimes called "gradualists" in contrast to the supporters of the theory of shock therapy, who concentrated on rapid changes with rapid privatization. The transformation strategy supported by Stiglitz was clearly different to that promoted by the IMF and its supporters. The failure of many countries in the attempt to successfully change to a market economy provided a new view of what influences the functioning of market economies.



Stiglitz had the possibility to research one of these views during the period he worked as chief economist of the World Bank. However, wide agreement was gradually reached on the importance of the institutional infrastructure and the danger of rapid privatization in the process of transformation to a market economy. Stiglitz was deeply convinced that government has to play an important role in the economy. In his work on the economy of the public sector, he attempted to clarify how the government can perform this role as effectively as possible. One of the important questions he was concerned with in this context, was the problem of how to achieve the redistribution of income in a way, which minimizes loss of effectiveness, which cannot be prevented and are connected with tax breakdowns.

A further important point in Stiglitz's scientific work in the area of imperfect information is the organization of markets. Markets with imperfect information are also usually described as monopolistic competition.

The economics of the public sector

A new stage in the professional life of J. Stiglitz began at the beginning of the 1990s. He became a member of the administration of the American President Clinton, and later chairman of the council of economic advisors. The extent of the legal power connected with this position included not only macro-economic measures, but also policy in every sphere of the economy. He was also concerned with the details of environmental problems. According to his own words, one of the important achievements of this stage of J. Stiglitz's career is his definition of the new economic philosophy of the so-called "third way", which emphasized the important, but limited role of the government, and that unsatisfied markets often do not function well, but the government was not always able to correct limitations of the market. The research in which Stiglitz participated over 25 years provided the intellectual background for this "third way". His work about information asymmetry also emphasized the importance of stimuli and contradictions between government officials and especially professional politicians and those they have to serve – the citizens.

When Clinton was elected president for the second time, he asked Stiglitz to remain chairman of the council of economic advisors for a further period. However, Stiglitz accepted the offer of the World Bank to become "senior vice president" for development policy, as well as chief economist.

Stiglitz's contribution to monetary theory

Stiglitz criticizes the IMF for mechanically promoting the liberalization of capital flows and applying its

views as if they were Pareto dominant, that is, the policies, which should raise the living standards of all, so there should be no compromises.

Short-term capital is especially harmful. It prefers countries, which guarantee high profits. The result is that the domestic currency strengthens unhealthily, but capital immediately leaves the country, because it does not want to pay for a financial crisis.

Stiglitz points out that foreign capital most prefers the areas where it is least needed. Economic booms especially attract investors. When recessions begin, capital leaves, the crisis deepens and capital strengthens the economic cycle.

The IMF mainly analyses macro-economic indicators: inflation, budget deficits and balance of payments deficits. If crisis threatens a country, the fund recommends introduction of a restrictive anti-inflation policy of reduced expenditure and reform of the financial system. Stiglitz considers this recipe harmful. According to him, the protective activities of the fund are the most harmful. Assistance to threatened countries enables them to maintain a high exchange rate until rich investors have removed their money and deposited it in safer places. The crisis in the East Asian economies further sharpened Stiglitz's disagreement with the policies of the IMF. The approach of the IMF to solving this crisis was not in harmony with his findings from the areas of information asymmetry and bankruptcies, central government and finance.

J. Stiglitz analysed the causes of the origin of the financial crisis in Argentina and also criticized the recommendations of the IMF in this case. He criticized the introduction of the "currency board" system for the following reasons:

- Fixation to a currency such as the dollar is a very risky policy. Argentina already had to abandon this method of currency fixation years ago,
- A one-sided emphasis on inflation, without regard for unemployment or economic growth is risky,
- Argentina was praised for enabling foreign entities to own banks. A more stable banking system was created in the short term, but it did not lend to small and middle-sized companies. Growth does not happen without financial institutions, which lend to domestic companies,
- The IMF bears a large part of the blame for the Argentinian crisis by insisting on a restrictive policy.

Stiglitz also predicts the reaction of the IMF – accusations of corruption and failure to implement the necessary measures.

A further idea, which J. Stiglitz brought into the discussion of the search for new innovative approaches to financing economic development, is a new form of global currency, similar to special drawing rights (SDR). SDR is global money issued by the IMF. The member countries receive it and exchange it for the



dollar and other hard currencies. According to Stiglitz the essence of the system would be simple: The countries of the world deposit financial reserves every year for unforeseeable events. These resources cannot be used to finance the investment the poor countries need. If a new "global currency" was introduced, countries could hold their reserves in this currency instead of in dollars. According to Stiglitz, this money could be transferred to developing countries to finance development programmes. The IMF, which also issues SDR, or a new institution should issue this "global money". A group of administrative funds for the areas of education and health would be created at the same time. Countries would compete for projects

This scheme would not be inflationary. Global money would compensate for inflationary prejudices, which are a result of the fact that the part of state revenue deposited as a reserve is never reflected in overall global demand.

A conclusion could state that the scientific research of J. Stiglitz was strongly influenced by his experience of life. The dominant theme of his scientific works is the implications of economic information for the macro-economics and especially for monetary theory.

Another important area of his research is his still continuing analysis of the appropriate role of the state in the economy, especially the combination of measures of the government in the areas of economic effectiveness, social justice, individual responsibility and other liberal values.

He does not consider himself to be an enemy of the free market. He also defends his spiritual father John Maynard Keynes against such accusations. He writes: Keynes was above all a radical conservative. He fundamentally believed in the market, although with the reservation that the market will be effective only when the government can correct its mistakes.

The most important works of J. Stiglitz:

- The Roaring Nineties, W. W. Norton & Company, forthcoming in October 2003.
- Towards a New Paradigm in Monetary Economics, with Bruce Greenwald, Cambridge University press, forthcoming in May 2003.
- Globalization and Its Discontents, W.W. Norton & Company, June 2002.
- Economics, Third Edition, with Carl E. Walsh, W.W. Norton & Company, April 2002.
- Principles of Macroeconomics, Third Edition, with Carl E. Walsh, W.W. Norton & Company, March 2002.
- The Rebel Within. Joseph Stiglitz and the World Bank, edited by Ha-Yoon Chang, Authem Press, February 2002.