



Vývoj ekonomického myšlení a manažerských přístupů v oblasti zvyšování výkonnosti

Economic Thought and Management Approach Development Towards Performance Improvement

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Abstrakt: Účinnost a výkonnost při provádění ekonomických činností prošla historicky mnoha fázemi. Odpradáva se lidé snažili o zdokonalování pracovních postupů. Současně se zlepšováním technických postupů vyvstala potřeba hlubšího pochopení ekonomických vztahů a řídicích procesů. Tato esej je zaměřena na vývoj ekonomického myšlení a manažerských přístupů souvisejících se zvyšováním výkonnosti a ekonomickým růstem

První část článku uvádí významné milníky vývoje starých civilizací, které napomohly k postupnému sociálnímu a ekonomickému rozvoji.

Další část se soustředí na vývoj ekonomického myšlení, které přispělo k pochopení a podpoře zvyšování produktivity a ekonomického růstu. Tato část dále představuje vývoj manažerských postupů důležitých pro zvyšování výkonnosti a uvádí hlavní osobnosti a teorie, které tito autoři rozvíjeli.

Tento příspěvek je součástí širšího výzkumu, který bude završen disertační prací v oblasti strategického řízení a jeho dopadu na moderní finanční řízení a řízení výkonnosti v mezinárodním podnikání.

Výzkum pro tento příspěvek je současně podložen osobními zkušenostmi z podnikatelského prostředí a výuky studií srovnávání ekonomických systémů i ekonomie samotné v mezinárodním měřítku.

Klíčová slova: vývoj ekonomického myšlení, ekonomický růst, manažerské postupy, zvyšování výkonnosti

Abstract: ISIT area is driven by overall needs to improve performance in business and other human activities. The following article focuses on development of economic thought and management approach towards performance improvement.

Effectiveness and efficiency in conducting economic activities has gone through many stages. Ever since the old ages people have been trying to gradually improve procedures in accomplishing their tasks. Along with improving technical procedures there was a need to deeper understand economic relationships and management processes. This essay will outline a development of economic thought and management approaches related to performance improvement.

Firstly, the article emphasizes importance of discoveries and achievements of the ancient civilizations that supported gradual social and economic growth.

The following part focuses on development of economic thought which helped to understand and improve productivity and support economic growth. The essay then introduces development of managerial approaches that are important for performance improvement. It will also introduce the most important theories and their authors.

This essay is a part of a wider research that will be concluded by a dissertation focused on strategic management and its impact on the advanced financial and overall performance management in international business.

My research is supported by my long term hands on international experience in business and teaching of comparative economics and economics itself.

Keywords: economic thought development, economic growth, managerial approaches, performance improvement

JEL Classification: B30, M21

Introduction

Effectiveness and efficiency in doing economic activities has gone through many stages. Ever since the old ages, people have been trying to gradually improve procedures to accomplish their tasks. It has always been important for people to explain economic motifs leading households to a decision how much to work, produce and utilize.

To accomplish that there has always been a need to understand the notions behind economic activities. Therefore, naturally theories trying to define and explain economic relationships and economic growth developed over the years.

This article will outline a historical development of economic theory supporting the performance improvement process from the old times to the current times. Following advanced practical achievements of the ancient civilizations a theoretical progress in the economy as a science will be outlined.

The article is a part of a wider research that will be concluded by a dissertation focused on strategic management and its impact on the advanced financial management and performance management, controlling, resp. in the international business.

My research is supported by my long term hands on international experience in business and teaching comparative economics and economics itself in Central and Eastern Europe, Central Africa, Middle East, Western Europe and the USA.

1. Performance Improvement

Definition

I want to thank Paul R. Gregory and Robert C. Stuart for their comprehensive research published in a textbook on comparative economics systems¹ and their other academic texts. The following parts of this article focus on performance definition and history by economic eras will to some degree be based on the facts from these sources.

The ***macroeconomic view on performance*** analyzes how economic systems are related to economic outcomes. Economic outcomes are a result of the economic system interacting with state policy, institutions, and the physical and social environment.

1) The history by technological eras is primarily based on Gregory, P. and Stuart, R., The Global Economy and its Economic Systems, South Western Cengage Learning, 2014, ISBN-13: 9781285055350

Performance criteria can then briefly be specified as follows:

- 1) *Economic Growth* that implies higher living standards and greater happiness on average.
- 2) *Static and Dynamic Efficiency*, where *static efficiency* is a measure of how well current factors are being used in current production, while *dynamic efficiency* is a measure of how well society improves its technology.
- 3) *Income Distribution*. Assuming diminishing marginal utility of consumption, a more equal society is superior to a less equal one, *ceteris paribus*.
- 4) *Stability* - the absence of significant fluctuations in growth rates, the maintenance of relatively low rates of unemployment, and the avoidance of excessive inflation.
- 5) *Viability*. A viable system is one which can continue to exist without fundamental change for an extended period of time. Gregory and Stuart assert that capitalism, which has existed for centuries, is viable, while the long-term viability of socialism is unclear.

How to define “good” outcomes is subjective; growth, quality of life, life expectancy, equality, and other measures can be used and weighed according to one’s preferences. For purposes of this article performance will be viewed from both the **microeconomic and macroeconomic points of view**. Therefore, performance will be primarily understood as an aggregate efficiency of economic activities conducted by individuals or entities, firms, resp. It is clear that after all the ultimate impact of individual entities’ performance interacts within the overall macroeconomic environment. Economic growth related topics towards the end of this article then relate to the macroeconomic and international economics environment.

Historical Evolution of Performance

1.1 History of Technology by Technological Eras, Ancient Economic Thought

The attempts towards a gradual performance improvement can be linked to the entire history of comparative economics study. There are more options how to characterize the economic growth periods in the history. One view on economic development is related to *technological advancement*. The following paragraphs outline a history of technology by technological eras. The primary source for this characteristic is a research of Gregory and Stuart.²

²) Gregory, P. and Stuart, R., *The Global Economy and its Economic Systems*, South Western Cengage Learning, 2008.

There is no doubt that during the 1st agricultural revolution, the *Neolithic* era between 8000 and 5000 BC people had to consider accomplishing activities needed to feed themselves. We can assume that the transition from hunting and gathering to agriculture in South Asia, North and Central Africa, and Central America happened in a rather *chaotic* way compared with later more advanced times.

After having discovered at that time the oldest written law in history, *Hammurabi Code* used in Babylonia (4500 - 2250), nowadays Iraq, it is interesting to realize that the people were by part on “responsibilities of farmers, herdsman, and gardeners”³ responsible for delivering a certain *quality of their work*.

Renaissance technology between the 12th to 14th centuries introduced major *technological advances* such as vertical wind mills, spectacles, mechanical clocks, building techniques - primarily gothic style - appreciated among others at medieval churches and castles, gunpowder, Gutenberg’s mechanical printing, and other accomplishments. Several of those mentioned and particularly greatly improved water mills, three-field crop rotation technique in agriculture, and much more advanced heavy ships invented by da Vinci contributed to the *overall efficiency* improvement in economic activities. At this period it was certainly very useful to follow the Roman and Byzantine antecedents and experiences from trading with the Islamic world, China and India early in history.

The *British Agricultural Revolution* accomplishments from the 1780s to the 19th century by introducing among others enclosure, further *mechanization of production*, four-field crop rotation, and selective breeding, helped drive the Industrial Revolution.

The *Industrial Revolution* between the 18th - 19th centuries contributed by *powered machine-based manufacturing* - steam power, water wheels, refined coal iron making techniques, all-metal machine tools, mechanization of textile industries, mining. We could observe dramatic increase in production capacity, trade expansion due to introduction of transportation - canals, improved roads and railways, and technology. This technological era means a real *considerable step towards performance improvement*.

The *Second Industrial Revolution* that started around 1850 meant a worldwide revolutionary change by introducing the combustion engine and electric power generation. The following technological eras from the 20th and 21st centuries such as:

Atomic Age, Jet Age, Space Age, and Information Age

are, no doubt, driven by a focused attempt to gradually *improve* performance in production, trade and *performance in many aspects*. A structured approach to the ove-

ning, 2014, ISBN-13: 9781285055350

3) The Laws of Hammurabi, George E. Vincent, American Journal of Sociology, Vol. 9, No. 6, May, 1904, pp. 737-754, the University of Chicago Press

rall effective and efficient management has been experiencing a rather complicated development. There is still a lot of room for further improvements in this field.

The economic research over years experienced various views on and discussions about economic growth. The *stages of economic growth* as suggested by Rostow's will be introduced later in the article as part of his growths theory introducing.

1.2 Development in the Economic Theory

“... the private interests and prejudices of particular orders of men... have given occasion to very different theories of political economy... These theories have had a considerable influence, not only upon the opinions of men of learning, but upon the public conduct of princes and sovereign states. (Smith, *Wealth of Nations* [1776/1976, p.11])”⁴

The following part of this article will emphasize key milestones, individuals, selected important categories and economic theories that lead to further performance improvement. This historical compilation and my own comments are based primarily on *The Global Economy and Its Economic Systems*⁵, and other sources from the economic theory.

Preclassical Economics

Mercantilism - 15th – 18th centuries

The ideas of mercantilism were primarily developed by people from the business sphere such as merchants and clerks. They focus on improvement of wealth and country strength by supporting „*international trade as the main source of wealth* but only when there is a favorable balance“⁶ (**Thomas Culpeper**, **John Locke** (1632 – 1704), **William Petty** (1623 - 1687), **Thomas Mun** (1571 – 1641).

They understood *profit as a non-contractual income* while other forms of income are generally contractual, such as wages, interest or rent. “These are the rules of the game. It is certainly not mandatory to be paid profit in return for owning and/or operating a business enterprise. Losses-due to inefficient management, insufficiency of demand,

4) „New Political Economics“ Then and Now: Economic Theory and the Mutation of Political Doctrine: A. M. C. Waterman, *American Journal of Economics and Sociology*, Vol. 61, No. 1, Special Issue: The New Political Economics: A Collection of Essay from around the World (Jan., 2002), pp. 13-51

5) *The Global Economy and Its Economic Systems*, Gregory, P. and Stuart, R., South Western Cengage Learning, 2014, ISBN-13: 9781285055350

6) *British Mercantilist Theories of Profit*, Harold B. Ehrlich, *American Journal of Economics and Sociology*, Vol. 14, No. 4, Jul., 1955, pp. 377-386

special industry conditions, general recession or depression, etc. also have to be expected.”⁷ **Richard Cantillon** (1680 - 1734) and **David Hume** (1711 - 1774) also belong to the group mercantilists.

Physiocracy

Physiocrats were following the Greek idea of “Government of Nature“, an economic theory based on the fact that the *wealth of nations* was derived solely from the *value of “land agriculture”* or “*land development*“. They were advocates of freedom by the phrase “*laissez faire*” – [let it be, let it go] and private ownership with *no state interventions*.

William Petty's (1623 - 1687) statement that the *source of nation wealth is in material production* - “work is the father, land is the mother”⁸ is a key milestone in the economic analysis. He also suggested that *the amount of work is the measure of value* of the goods. Francois Quesnay is considered to be another physiocrat.

Classical Economy

With the development of capitalism between the 17th – 19th centuries there was a need for development of *economy as a science*. Classical economists played a key role in this respect. With the development of economy as a science many economic categories have been defined. Since then economists have been discussing and shaping the meaning of those categories. It later became important for a systematic measurement and improvement of performance.

Adam Smith (1723–1790) and **David Ricardo** (1772 – 1823) are considered the *founders of the Economic Science*. According to Smith the *source of wealth is productivity of labor*. He is the author of *invisible hand analysis* – a book “The Wealth of Nations” (1776), an advocate of market self-correcting mechanism by reaching *equilibrium of demand and supply without any state intervention*.

According to **Ricardo** the *source of wealth is the amount of labor*. He was an advocate of *free trade among countries* and introduced a concept of *comparative advantage*. Ricardo also supported specialization among individuals. In Ricardo’s “Corn-Ratio” Theory of Profits expressed in the ‘Essay on Profits’ and in letters to Malthus of 1814 and early 1815, a basic principle is that “it is the profits of the farmer that regulate the

7) British Mercantilist Theories of Profit, Harold B. Ehrlich, American Journal of Economics and Sociology, Vol. 14, No. 4, Jul., 1955, pp. 377-386

8) The Global Economy and Its Economic Systems, Gregory, P. and Stuart, R., South Western Cengage Learning, 2014, ISBN-13: 9781285055350

profits of all other trades...”⁹ Ricardo influenced his colleague Sraffa, and has many followers who discussed his theories in academia, as for instance Torrens (1815), de Vivo (1985), Hollander (1985), Peach (2001).

John Stuart Mill (1806–1873)

In his book *Principles of Political Economy* (1848) Mill, as other nineteenth-century writers, uses the *Political Economy* as a term (first used in 1611 in a treatise on government by L. de Mayerne-Turquet (Groenewegen 1987, pp. 904-906) referring to the study of what we today call *macroeconomics*. Its practitioners, such as Adam Smith, Mill, David Ricardo, and Karl Marx, were more philosophical and less empirical in their methods than modern economists. In this book, Mill examines the fundamental economic processes on which society is based: production, the distribution of goods, exchange, the effect of social progress on production and distribution, and the role of government in economic affairs.

Marxism

Karl Marx (1818 - 1883) along with **Friedrich Engels** (1820 - 1895) stands for the materialist concept of history, viewed history as continuous social evolution. Marx's *theory of change* says that old systems will inevitably be overthrown by new systems, as technological advancement changed the distribution and dynamics of power. *Labor is the only source of wealth* and the *worker in capitalism is a special goods*. According to the Marx's Communist Manifesto capitalism 'left no other nexus between man and man than self-interest, "cash payment" '. In "Das Kapital" Marx suggests that capitalism is limited and will break down. *Aggregate demand falls short of aggregate supply* and we can expect overproduction, underconsumption, and *disproportions*.

Marxism after Marx

Lenin and the **Bolsheviks** were the first Marxists to successfully institute a Marxist state ideology in Russia. The Bolsheviks advocated and used violent revolution to achieve their ends. In contrast, the European Marxist Reformers chose to work within existing political frameworks to achieve and pursue goals. The idea of socialism and its practical implementation was later addressed by several economists in the future as below stated.

One of influential critiques of Marxism, Rostow says that the most consequential *difference* between capitalism and socialism appears to be in the *human motivation*. Those of us who have experienced living through socialism can certainly confirm that it leads, among any other things, to inefficiency.

⁹ Ricardo and the Corn Profit Model: Samuel Hollander: Reply to Eatwell, *Economica*, New Series, Vol. 42, No. 166, May, 1975, pp. 188-202

Capital Theory and Growth

Joseph Schumpeter (1883 - 1950) argued that *creative destruction*, the process old firms and methods of production are replaced by new, more efficient ones, is the driving force behind capitalism. Like Marx, he believed that *capitalism would eventually yield to socialism*, but he did not present this event as a great moral victory for society. His ideas were also often criticized by Rostow.

Role of Government

Friedrich Hayek (1899 - 1992) and **Ludwig von Mises** (1881- 1973) emphasized the role of *free markets and property rights* in creating information and incentives that were necessary ingredients of a *prosperous economy*. Hayek stated that socialist experiments as USSR etc. would be abandoned. Mises argued early on (1922) that socialist economies would lack the necessary *information provided by price signals; allocation* would be arbitrary and *highly inefficient*. Hayek and Mises did not believe in neoclassical economics.

Hungarian economist **János Kornai** (1957 -) based on his personal experience described how planned socialism lead to an “economy of shortage.” He argued that the inefficient enterprises in socialist countries would not be replaced by more efficient ones, because they would be able to survive by drawing more resources from the state.

Mancur Olson (1932 – 1989) and **Peter Murrell's** (1950 -) in their *Critique of Socialism* argued that “distributional coalitions” would emerge at the expense of central power to obtain resources as well as their informational advantage to effectively seek rent. The resulting *inefficiency* would draw resources away from investment and cause *growth to falter*. The coalitions would provide built-in resistance to reform, thus, the socialist economy would eventually fail.

Following the above paragraphs on socialism it is appropriate to mention that performance and overall economic results of socialism as claimed by Marx and his followers, i.e. without market rules and private ownership, are relatively very poor. On top of that we cannot abstract from the unacceptable dictatorship features of socialism, communism resp.

Neoclassical Economy

In late 19th century (70s) *neoclassical economy* enhanced the economic theory by a more in-depth microeconomic *consumption based static approach*.

Alfred Marshall (1842-1924) and **Leon Walras** (1834-1910), originally both mathematicians, are considered the fathers of neoclassical microeconomic theory. Building on the work of Smith, Ricardo, and J. S. Mill, Marshall developed an analytical framework that still serves today as the structural basis of current economic theory and much economic policy. Both Marshall and Walras used mathematical models to explain the principles of supply-and-demand analysis. They enriched the best of classical analysis with the new tools of the marginalists to explain the forces that determine prices and the allocation of resources. Marshall stressed that equilibrium is possible under perfect competition and introduced the *Theory of Imperfect Competition* (1933). The neoclassical economists also focused on *economic balance*. Another member of the neoclassical mainstream was **Knut Wicksell**.

Keynesian Economy

In reaction to the nonrealistic theory of neoclassical economists, which stresses perfect competition, and to the Great Depression in the USA (1929 - 33) a new approach has been introduced by **John Maynard Keynes** (1883 - 1946). *With his aggregate demand based approach* he stated that market economy is unstable. He claimed a necessity of building a relationship between the market and the state and was an advocate of state intervention into economy. Keynes developed modern macroeconomics and suggested introducing and deploying of economic policies of governments. He also studied the causes of business cycles. Therefore, he was an advocate of *fiscal and monetary measures* to mitigate the adverse effects of economic recessions and depressions. His school of thought is known as Keynesian economics. Another important Keynesian economist is **Alvin Hansen**.

Even though Keynes brought up and strongly defended new very important views he admitted that “The Theory of Economics... is a method rather than a doctrine, an apparatus of mind, a technique of thinking” rather than “a body of settled conclusions.”¹⁰

All the above theories can be characterized by an attempt leading towards an *economic advantage*, i. e. *profit maximization*. “Both the labor and risk concepts of profit are to be found in the writings of the economists down to this day.”¹¹ There was a need to ultimately meet the problem in the separation of cost, speculative and monopoly profits.

The above text dealt with the development of primarily economic reasoning related to performance improvement. The following topics open up new dimensions of looking at a growth from not only economic point of view.

10) The Interrelation of Theory and Economic History: W. W. Rostow: The Journal of Economic History, Vol. 17, No. 4 (Dec., 1957), pp. 509-523

11) Legal Theories of Profit(s): C. J. Foreman, Political Science Quarterly, Vol. 33, No. 2 (Jun., 1918), pp. 184-209

Economic Growth Related Theory

Walt Whitman Rostow (1916 - 2003), the US conservative economist and political theorist introduced his **growth theory** and defined **five stages of economic growth** as follows: "It is possible to identify all societies, in their economic dimensions, as lying within one of *five categories*."¹²

- 1) *The Traditional (Feudal) Society* - developed within limited production functions, based on pre-Newtonian science and technology
- 2) *The Preconditions for Take-off* – transforming a traditional society by using modern science, fending off diminishing returns, as it happened in Western Europe in the late seventeenth and early eighteenth centuries
- 3) *The Take-off* - a rapid growth in a limited group of sectors with modern industrial techniques (cotton textiles - Britain and New England, railroads - US, France, Germany, Canada, Russia), modern timber-cutting and railroads (Sweden); agricultural processing, oil, import substitution industries, ship-building, military output
- 4) *The Drive to Maturity*- a long interval of sustained progress, extending modern technology over the whole economic activity (GB 1850, US 1900, Germany 1910, France 1910, Sweden 1930, Japan 1940, Russia 1950, Canada 1950)
- 5) *The Age of High Mass-Consumption* - where, in time, the leading sectors shift towards durable consumers' goods and services: three possible directions have been identified:
 - to offer, by public measures, increased security, welfare, and, perhaps, leisure to the working force;
 - to provide enlarged private consumption - including single family homes and durable consumers goods and services on a mass basis (US in 1920's);
 - to seek enlarged power for the mature nation on the world scene;

Rostow later suggested a follow up category, *Beyond Consumption*. It is characterized by a further development of other sectors, rising birth rates in rich societies, while the Soviet Union was dallying at the same time. Simultaneously, declines in birth rates in Japan and Italy in the 1950's, as new economic progress opens for large segments of the population.

12) W.W. Rostow, *The Stages of Economic Growth: A Non-Communist Manifesto* (Cambridge: Cambridge University Press, 1960), Chapter 2, „The Five Stages of Growth--A Summary,“ pp. 4-16

Rostow's model of growth utilizes “*six propensities* - a propensity is defined as expressing how a society will respond at a given moment to variations in income and/or profit possibilities.”¹³ By this model output depends on propensity to:

- develop fundamental science (physical and social)
- apply science to economic ends
- accept innovations
- seek material advance
- consume, and
- to have children

Rostow is convinced that his propensities should be **operational**. He **rejects economic explanations of the growth trends**, such as autonomous investment, and “emphasizes his belief that the real reason for long-term stability is that these propensities change only slowly.”¹⁴

He suggested the following *four sets of forces influencing economic growth*¹⁵ and *downturns* from various time related points of view:

- 1) *Very long run* - climate, geography, soil conditions – so slow change that they can almost be regarded;
- 2) *Long run* - quality of the labor force, political attitudes, the exhaustion of mineral resources, institutional changes, such as the growth of a trade-union movement - it may take up to a century or more for a change fully to be worked out;
- 3) *Medium term* - cyclical fluctuations, i. e. several cycles *in real income and employment* that effected trend movements in relative intersectoral prices, income distribution, new investment, and general prices. As Berrill argues, Rostow, in his *medium-term trends theory* “abstracted from institutional forces as governments’ controlling of international lending; tariffs, quotas, commodity agreements, etc. that help to thwart the normal influence of market demand on prices, capacity and investment. Rostow also *omits effects inside countries*, as the price mechanism being obstructed by trade-union strength,

13) The Process of Economic Growth. by W. W. Rostow, review by: Kenneth Berrill, The Economic Journal, Vol. 65, No. 259 (Sep., 1955), pp. 498-506

14) The Process of Economic Growth. by W. W. Rostow, review by: Kenneth Berrill, The Economic Journal, Vol. 65, No. 259 (Sep., 1955), pp. 498-506

15) The Process of Economic Growth. by W. W. Rostow, review by: Kenneth Berrill, The Economic Journal, Vol. 65, No. 259 (Sep., 1955), pp. 498-506

by oligopolistic non-price competition, and by the State through price support, investment planning and the rest. He assumes that such *institutional forces change sufficiently slowly to be allocated to long-run influences*.

- 4) *Short-term* analysis - similar to the medium, cycles depend on conditions in individual sectors of the economy; investment in each sector depends on the relationship between demand and capacity; when the capacity limits are achieved investment into other sectors starts.

Rostow attacked the Marxists, the classical economists and the secular stagnationists. Among others, he argued with Schumpeter, Kuznets, and Kondratieff, who is “regarded as the father of the notion that capitalist economies are subject to cycles some fifty years in length.”¹⁶

By Rostow, men seek not only economic advantage, but also personal and national power; not only adventure but security and continuity of social and cultural experience; not only personal expression, but the joys of family and individuals. The sectors of society interact: cultural, social, and political forces have an impact on the evolution of societies, including their economic evolution. They are not a superstructure derived from the economy.

This rather extensive introducing of the Rostow growth theory was meant to underline the reasoning behind an approach that suggests that economic growth does not seem to be depending on economic determinants only.

There are other not purely economic but rather multidisciplinary and management based approaches that are also essential to performance improvement. Due to size limitations those will not be elaborated on in this article.

Other capital theory and growth focused economists are **Joseph A. Schumpeter**, **Frank H. Knight**, **Sir Roy Harrod**, and an earlier mentioned **Sir John R. Hicks**.

A deeper understanding of both micro- and macroeconomic topics is impossible without a deeper knowledge of the economic thoughts history. “A standard microeconomic theory mostly represents a neoclassical approach. Current macroeconomics need to consider a variety of approaches. Primarily, however it involves a confrontation of neoclassical and Neokeynesian thoughts. Neokeynesian approach is often interpreted as a special case of neoclassical theoretical system.”¹⁷

16) Kondratieff, Schumpeter, and Kuznets: Trend Periods Revisited: W. W. Rostow: The Journal of Economic History, Vol. 35, No. 4 (Dec., 1975), pp. 719-753

17) Širůček Pavel, Podkladové studijní materiály z ekonomické teorie - část makroekonomická, VŠE, Praha

1.3 Development of Managerial Approaches

The below paragraphs outline the key steps leading towards development of management theories leading to performance management improvement. It includes outstanding individuals, their statements and relevant accomplishments. Those who contributed to the concept of performance improvement have proven themselves in several areas such as physics, mathematics, economics, management, military leadership and others. This historical descriptive part is primarily based on a research conducted by Roger D. Chevalier.¹⁸ It is a compilation of numerous historical facts and my own comments. Not all detailed partial parts of the text will be cited with references.

New inventions are typically following previous inventions of those who worked hard before us. In the words of Sir Isaac Newton, “If I have seen further it is by standing upon the shoulders of giants.”¹⁹ The foundations for the systematic and systemic approaches we use today to improve workplace performance were developed by several such giants. The below important individuals have contributed to the performance improvement.

William Thompson (*Lord Kelvin*) (1824-1907), Irish, British is primarily known a physical scientist, engineer, and inventor;

His statement “If you cannot measure it, you cannot improve it”²⁰ has been used by managers until today. His work laid the groundwork for Deming and Juran in the use of *statistical analysis to improve quality*. He was behind establishing international standards for electrical, electronic, and related technologies.

Henri Fayol (1841-1925), French;

He said: “To manage is to forecast and plan, to organize, to command, to coordinate and to control.”²¹

Fayol saw a manager’s job as planning, organizing, commanding, coordinating activities, and controlling performance. All of these features still play a crucial role in modern management procedures. His 14 principles of management were published in 1917 in *Administration industrielle et générale*, and translated into English as late as 1949 as *General and Industrial Management*.

18) Chevalier, Roger D, CPT. Performance Improvement 47.6 (Jul 2008): 5-11

19) Chevalier, Roger D, CPT. Performance Improvement 47.6 (Jul 2008): 5-11

20) Chevalier, Roger D, CPT. Performance Improvement 47.6 (Jul 2008): 5-11

21) Chevalier, Roger D, CPT. Performance Improvement 47.6 (Jul 2008): 5-11

Frederick Winslow Taylor (1856-1915), a *father of performance improvement*, efficiency engineer;

He said:

“In the past, man was first; in the future, the system will be first.”²²

“Hardly a competent workman can be found who does not devote a considerable amount of time to studying just how slowly he can work and still convince his employer that he is going at a good pace.”²³

Taylor's *Scientific Management* emphasized that the prosperity of the employer cannot last without prosperity of the employee, and vice versa. He was a pioneer of the industrial revolution who was searching for ways to improve workplace performance by finding the “one best way” to do a given task. His book, *The Principles of Scientific Management*, was published in 1911. “*Taylorism*” influenced such industrial giants as Henry Ford as well as the overall development of the US economy and society in 1920s. It also impacted “the science of household management”.

Taylor set the tone for a phenomenally successful national effort to maximize worker, managerial and industrial productivity, also by introducing standardization - weights for loaves of bread, quality, and packaging. These changes immeasurably facilitated distribution, retailing and accounting.

Tomáš Bata (1876-1932), Czech;

Bata's motto is: “Our customer is our Master”.²⁴

He also said:

“A good shoe for the average man.”²⁵

“The customer's wish is sacred.”²⁶

Bata was Henry Ford's follower in the territory of at that time the Austro-Hungarian Empire that became Czechoslovakia in 1918. He came with a lot of innovations leading towards performance improvement worldwide in the shoemaking industry such as the specialization of workers, using of production lines, establishing “*Bata system*” (1923) when operations are organized in autonomous workshops with employee profit sharing. He introduced the planning of all activities, economic units using internal trans-

22) Chevalier, Roger D, CPT. Performance Improvement 47.6 (Jul 2008): 5-11

23) Chevalier, Roger D, CPT. Performance Improvement 47.6 (Jul 2008): 5-11

24) www.bata.cz

25) www.bata.cz

26) www.bata.cz

fer pricing, responsibility and accountability of managers, and weekly management accounting. He strictly required order and discipline.

By introducing the “*Baťovka*”, the first fabric shoe and constant innovation of footwear he was able to meet customers’ needs. The company achieved an extraordinary level of efficiency and was able to expand production and sales worldwide.

Tomas Bata firmly believed business should serve the public. His company established communities around its plants by building housing, schools, and hospitals. By 1939 Bata operated 63 companies in various industries with footwear remaining the core business with 60 million pairs sold per year in more than 30 countries. Bata became one of the *first truly global* entrepreneurs.

Henry Gantt (1861-1919)

He said: “Whatever we do must be in accord with human nature. We cannot drive people; we must direct their development.”²⁷

A colleague of Frederick Taylor, Gantt broke down all of the tasks in the “*process*” of building navy ships during World War I and *diagrammed them* using the charting method, which became a powerful planning and evaluation tool for managers. He was a pioneer for “*pay for performance*,” seeing the advantages of giving bonuses for improved productivity. These accomplishments have become very important bases for the future enhancement of management methods that are nowadays used in a sophisticated and computerized form. Process based management is now the fundamental approach for all advanced entities in all sectors.

Max Weber (1864-1920)

He said: “Only by *strict specialization* can the scientific worker become fully conscious, for once and perhaps never again in his lifetime, that he has achieved something that will endure.”²⁸

Weber studied the Prussian army and described the “rational-legal authority” model of an ideal bureaucracy as having a clearly defined hierarchy, division of labor and specialties, impersonal relationships, competence as the basis for personnel decisions, and records being kept on all actions. Weber’s ideas, based on his study are very important for building a *rational organization structure*, a thing that all entities worldwide have been dealing with until today to optimize performance.

27) Chevalier, Roger D, CPT. Performance Improvement 47.6 (Jul 2008): 5-11

28) Chevalier, Roger D, CPT. Performance Improvement 47.6 (Jul 2008): 5-11

Frank (1868-1924) and **Lillian Gilbreth** (1878-1972)

Frank Gilbreth once showed a *process chart* to a company president, who responded that he had no intention of following anything as convoluted as that. Frank interrupted him: “You don’t understand, this is how you’re doing things now!”²⁹ From my experience, this is a situation that we can face quite often in many companies, including international ones.

The Gilbreths were also associates of Frederick Taylor, who used motion studies to improve performance by improving ergonomics and finding “the one best way.” The most famous of their studies led to *doubling the productivity* of bricklayers. The Gilbreths also introduced the idea of *rest periods* to limit on-the-job fatigue and invented the *process chart* used to describe how manufacturing organizations did their work.

Mary Parker Follett (1868-1933)

She said:

“We can never wholly separate the human from the mechanical side.”³⁰

As a social worker by profession, she was a pioneer by focusing on such issues as *leadership*, power, situational constraints, conflict resolution, empowerment, teams and networked organizations, the importance of *relationships* within and among organizations, authority, and control.

Elton Mayo, Fritz Roethlisberger, and William J. Dickson: (1927-1932)

They ran The Hawthorne Studies, a study based on application of ‘scientific management’ to determine the optimal environmental and physical conditions for manufacturing telephone switching equipment. They ended up identifying the *psychological aspects of worker performance* at their workplace.

Abraham Maslow (1908-1970)

He said:

“If the only tool you have is a hammer, you tend to see every problem as a nail.”³¹

Classic economic theory, based as it is on an inadequate theory of *human motivation*, could be revolutionized by accepting the reality of higher human needs, including the impulse to self actualization and the love for the highest values.

29) Chevalier, Roger D, CPT. Performance Improvement 47.6 (Jul 2008): 5-11

30) Chevalier, Roger D, CPT. Performance Improvement 47.6 (Jul 2008): 5-11

31) Chevalier, Roger D, CPT. Performance Improvement 47.6 (Jul 2008): 5-11

Maslow is perhaps best known for the adaptation of his *hierarchy of needs* that describes seven need levels organized in terms of their importance: physiological, safety, belonging, esteem, self-actualization, aesthetic and spiritual needs having importance to individuals as well. He is best known as the father of *humanistic psychology*, which holds that behavior is driven by individual needs.

Frederick Herzberg (1923-1990)

He said: “True motivation comes from achievement, personal development, job satisfaction and recognition. Management gets the workforce it deserves.”³²

In 1968 Herzberg described “*motivator factors* (achievement, recognition, enjoyment of the work itself, responsibility, opportunity for advancement, and personal growth) that were related to Maslow’s higher level needs and satisfied workers on the job and *hygiene factors* (organizational policies and procedures, quality of supervision, relationships with co-workers, salary, security, status, work environment and impact of the job on personal life) that were related to Maslow’s lower level needs and maintained workers on the job.”³³

Strategic Management Development

W. Edwards Deming (1900-1993)

He expressed several of the following crucial ideas:

“If you can’t describe what you are doing as a process, you don’t know what you’re doing.”³⁴

“We should work on our process, not the outcome of our processes.”³⁵

A system is a network of interdependent components that work together to try to accomplish the aim of the system. A system must have an aim. Without the aim, there is no system.”³⁶

Deming is a crucial contributor to the *process based strategic management* approach and solving innovation needs. He focused on systematic assessment, *statistical methods*, analysis of variance and hypothesis testing to gain continuous improvement. His focus was on one very important aspect of performance improvement, *quality*. He is one of the several references used in the development of *Six Sigma*. Deming has con-

32) Chevalier, Roger D, CPT. Performance Improvement 47.6 (Jul 2008): 5-11

33) Chevalier, Roger D, CPT. Performance Improvement 47.6 (Jul 2008): 5-11

34) Chevalier, Roger D, CPT. Performance Improvement 47.6 (Jul 2008): 5-11

35) Chevalier, Roger D, CPT. Performance Improvement 47.6 (Jul 2008): 5-11

36) Chevalier, Roger D, CPT. Performance Improvement 47.6 (Jul 2008): 5-11

tributed by “explaining the fundamental philosophies of **Total Quality Management (TQM)** in simple and effective manners.”³⁷

“TQM emphasizes

(1) *improving performance throughput, inventory, and operating expenses*, and

(2) *focusing on process constraints* in which improvements will translate directly to profitability (Eliyahu Goldratt (1984, 1990)).”³⁸

In the late 1980s, TQM became very popular, but it has faded considerably in the past few years. TQM programs were somewhat narrow focusing on their own goals and objectives with less links on the business goals.

Joseph Juran (1904-2008), Romanian born American, electrical engineer

He said:

“Commitment is the daily triumph of integrity over skepticism.”³⁹

“Fanaticism: Redoubling your efforts after your objective has been forgotten.”⁴⁰

“Intrinsic is the belief that quality does not happen by accident, it must be Planned!”⁴¹

Juran stressed managing to *improve quality* and adding the human element to quality management. He introduced in 1954 the management dimensions of *planning, organizing, and controlling* and focused on the responsibility of management to achieve *quality* and the need for *setting goals*.

His concept more closely incorporates the viewpoint of the *customer*. He is prepared to measure everything and relies on *systems* and *problem-solving techniques*. Unlike Deming, he focuses on *top-down management and technical methods* rather than worker pride and satisfaction.

Juran promoted a concept known as *Managing Business Process Quality*, a technique for *executive cross-functional quality improvement*. Juran has a broader concept than Deming, while Deming’s focus on statistical process control is more technically oriented.

37) <http://totalqualitymanagement.wordpress.com/category/introduction-to-total-quality-management/>

38) The Next Phase of Total Quality Management: TQM II and Focus on Profitability, Robert Stein; Marcel Dekker, 1994

39) Chevalier, Roger D, CPT. Performance Improvement 47.6 (Jul 2008): 5-11

40) Chevalier, Roger D, CPT. Performance Improvement 47.6 (Jul 2008): 5-11

41) Chevalier, Roger D, CPT. Performance Improvement 47.6 (Jul 2008): 5-11

Following experiences with strategy from military activities and efficiency improvement from many areas there was a natural need for a more structured approach in management. As a result of that strategic theory experienced a dramatic improvement during the 20th century.

Peter Drucker (1909-2005)

He expressed several very important ideas:

“There is nothing so useless as doing efficiently that which should not be done at all.”⁴²

“Efficiency is doing things right; effectiveness is doing the right things.”⁴³

“Company cultures are like country cultures. Never try to change one. Try, instead, to work with what you’ve got.”⁴⁴

“So much of what we call management consists in making it difficult for people to work. The productivity of work is not the responsibility of the worker but of the manager.”⁴⁵

“Think through the overall mission of a business. Ask the key question: What is our Business?”⁴⁶

Drucker was the foremost author and management science advocate of the 20th century who very much contributed to the *strategic management* theory and practice development. Drucker improved the work environment, increased productivity, and changed the way in which organizations around the world are led and managed. Strategic management framework that he intruded has been taught and used worldwide.

Strategic Management approach using a **Strategic Management Framework**⁴⁷ became a basis for a structured performance management development. The practice of *Performance Management* (PM) has evolved since the early ‘90s. There are several methods to improve performance. Performance Management can be defined as a set of management processes, often supported by information technology, that help to improve the management, strategy execution and decision making in organizations. Performance management processes help companies define strategic objectives, measure performance, analyze, report and thus manage performance as well as align people and culture.

42) Chevalier, Roger D, CPT. Performance Improvement 47.6 (Jul 2008): 5-11

43) Chevalier, Roger D, CPT. Performance Improvement 47.6 (Jul 2008): 5-11

44) Chevalier, Roger D, CPT. Performance Improvement 47.6 (Jul 2008): 5-11

45) Chevalier, Roger D, CPT. Performance Improvement 47.6 (Jul 2008): 5-11

46) Chevalier, Roger D, CPT. Performance Improvement 47.6 (Jul 2008): 5-11

47) Strategic Management: Concepts and Cases, Fred R. David, 13th ed., Pearson Prentice Hall, 2009, ISBN-13: 978-0-13-601570-3

Value Based Management (VBM)

VBM provides a framework to value business units as external shareholders do. It connects shareholder value to company strategy and performance measures at all levels of the company and quantifies the “drivers” of shareholder value. It enables to benchmark comparable values and helps understand ways for performance improvement. VBM directs management processes towards focusing on decisions and actions that create and monetize value. Companies that manage based on value generation and its strategic implications demonstrate superior stock market performance.

Compared to VBM the ***Balanced Scorecard (BSC)*** is a strategic performance management framework that allows organizations to develop, measure and manage the delivery of their strategy from a broader perspective. BSC enables designing of a system composed of both hard and soft measures in a balanced way. The BSC concept was initially introduced by Robert Kaplan and David Norton in a Harvard Business Review Article in 1992. As it has been mentioned earlier in this text many performance improvement related aspects have been invented at times of Taylor, Bata and others. Strategy based comprehensive approach Balanced Scorecard is a real complex advanced way of managing performance. As the most widely used performance management approach it is utilized in business companies, public sector, NPOs and various entities of different size and specialization.

This article focuses on historical background of performance improvement and is a part of a wider research related strategy and performance management that will be concluded by a dissertation. Therefore, Balanced Scorecard as well as other theories, techniques and procedures in this article will be limited to the above introduction.

Gradual performance improvement has always primarily been a result of a combination of *economic and management functions*. Strategy, nowadays on top of all these functions, is followed by core business and infrastructure functions as R&D, marketing, production, sales, risk management, financial management, management accounting / controlling, human resources management, ISIT and others. Development of economic theories and their use has always been determined by the *economic systems and local cultural and behavioral conditions*. Other factors influencing the performance improvement from the institutional and economic points of view are military power, environmental quality and democratic political *institutions*.

Other Performance Related Theories

Along with the continuing academic research and management discussions *new alternative profit related as well as non-profit theories* have been introduced.

Behavioral Theory (*A Behavioral Theory of the Firm* by **Cyert and March**, 1963) is an important contribution for the research in organizational studies in management, economics, political science, and sociology. It focuses on a small number of rather complex key “economic decisions made by the firm, internal allocations, market strategy decisions, and process-oriented models of the firm.”⁴⁸

William Baumol (1922 -), Neo-Keynesian economist, contributed by his “*Sales-Maximization Theory*”, his first precisely formulated theory of *business behavior* of a firm *other than profit maximization*. Of his sales maximization hypothesis, he writes: „This hypothesis, which is substituted for the usual profit maximization premise is, at best, only an approximation to a set of complex and variegated facts. There seem to be no simple methods whereby it can be tested by statistical or other standard techniques of empirical investigation. Nevertheless, I do not believe that it can be summarily rejected.”⁴⁹ According to this hypothesis firms *maximize revenue as a precondition of profit maximization*. Implication of Baumol’s sales maximization hypothesis was reviewed by numerous authors and has been accepted as a valuable contribution to economic theory.

All the above mentioned theories dealt with for profit entrepreneurship and in a broader sense its relation to economic and management aspects of performance improvement. It should not be forgotten that the **Non-for Profit (NPO)** sector plays a crucial role in the world economy. In fact, the impact of NPOs on business life practice is important. “Some of the nowadays well doing businesses were originally started as NPOs. The concept of entrepreneurship and thus naturally performance driven based approach is not limited to the for-profit sector; it is a general principle which can be applied to the non-profit sector as well.”⁵⁰ From my experience, business experienced managers play a very important role in starting and running NPOs in an efficient and advanced way.

Customer Value Management is a way how to manage based on the feedback on quality of the product. It is based on “creating clear and useful measures and methods for using customer-value information to drive the improvement of business results through appropriate changes to internal business processes.”⁵¹ Customers’ opinions are measured, evaluated and used to drive a business.

It is important to manage the *provider – customer relationships*. Since the early 1980s, the concept of *relationship marketing* has been becoming important. Building long-term relationships with the customers is dependent on optimization of the Customer

48) Historical Roots of the „A Behavioral Theory of the Firm“ Model at GSIA: Mie Augier and Michael Prietula, *Organization Science*, Vol. 18, No. 3, Behavioral Theory of the Firm (May - Jun, 2007), pp. 507- 522

49) Baumol W. J. *Business Behavior, Value and Growth*, Macmillan, 1959

50) Badelt, C. and Weiss, P. (1990b) Nonprofit, for-profit and government organisations in social service provision: comparison of behavioural patterns for Austria, *Voluntas*, 1, 1, 77-96

51) *Managing Customer Value*, by Bradley GALE, New York: Free Press, 1994, xxii + 424 pp

Lifetime Value (CLV).⁵² *Customer Value Analysis (CVA)* which involves a structural analysis (i.e., perceived quality and perceived price) based on the *Value Proposition*, i.e., the communication of the unique benefits and utility obtainable only from the focal product in contrast to those from its competitors (Drucker, 1985; Porter, 1985, 1998; Slater and Narver, 1998). A firm's ability to create value helps to achieve *Competitive Advantage*. Customers can become "co-producers of value" (Prahalad and Ramaswamy, 2000; Ramirez, 1999).⁵³ Competitive advantage helps to achieve *market share maximization*.

Abbreviations used:

- BSC - the Balanced Scorecard performance management approach
- CLV - Customer Lifetime Value
- CVA - Customer Value Analysis
- ISIT - Information System and Information Technology
- ISPI - International Society for Performance Improvement, founded in 1962
- NPO - Non-for-Profit Organization
- PM - Performance Management
- R&D - Research and Development
- VBM - Value Based Management

Conclusion

This essay highlights the key elements in economics and management reasoning influencing improvement of effectiveness and efficiency in conducting economic activities. It outlines a history of the performance improvement process from the old times to modern management era of the 21st century.

Firstly, the article introduces discoveries and achievements of the ancient civilizations that supported gradual social and economic growth. The following part focuses on development of economic reasoning which helped to improve performance. The article emphasizes that despite the economic growth is closely linked to the economic theory and is effected by development of economic factors other non-economic influences as managerial approaches are also very important.

This essay is a part of a wider research that will be concluded by a dissertation focused on strategic management and its impact on the advanced financial and overall performance management in international business.

52) Customer lifetime value: stochastic optimization approach W-K Ching*, MK Ng[†], K-K Wong[†] and E Altman[‡], University of Hong Kong, Hong Kong, China; and 2INRIA, Sophia-Antipolis Cedex, France

53) Customer Value Analysis in a Heterogeneous Market Author(s): Wayne S. Desarbo, Kamel Jedidi and Indrajit Sinha Source: Strategic Management Journal, Vol. 22, No. 9 (Sep., 2001), pp. 845-857, Wiley Stable

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