ISSN 0543-5846 METABK 52(4) 561-564 (2013) UDC – UDK 669.18.498:64.011.338.94=111

# THE IMPACT OF THE ECONOMIC AND FINANCIAL CRISIS ON THE FOREIGN TRADE IN METALLURGICAL PRODUCTS

Received – Prispjelo: 2012-12-27 Accepted – Prihvaćeno: 2013-03-25 Review paper – Pregledni rad

The manifestation of the global financial crisis severely affected the foreign trade worldwide. The purpose of this paper is to highlight the impact of the financial and economic crisis on foreign trade at the level of countries and groups ofcountries that have global leadership in the area, with an emphasis on the metallurgical products. The analysis results show that this branch was affected to a higher percentage compared to the amount of the value of the trade in goods.

Key words: metallurgical products, foreign trade, financial and economic crisis

## **INTRODUCTION**

The modern world cannot be conceived without the existence and use of steel as demonstrated by its characteristics: very long lifetime; ensuring high energy efficiency of buildings, plants, machinery, equipment; its ability to be reused without loss of functional and qualitative parameters; contribution to reducing carbon emissions, both through the use of high performance steel and the possibility of building infrastructure elements (bridges) causing serious savings in covering distances between different cities and, thus, reduce CO2 emissions from cars; wide applicability in the production of almost all goods necessary for life.

Triggering one of the biggest crises that affected the world since 2008 have had negative effects not only in financial terms but also in economic terms, a direct impact on economic growth and hence on production, consumption, investment, trade and prices on international markets. The purpose of this paper is to present the situation on metallurgical products trade in the countries and groups of countries with tradition in this area before and after the 2008 crisis.

# THE EVOLUTION OF THE INTERNATIONAL TRADE IN THE PERIOD 2000-2011

The role of international trade in ensuring the economic development of different countries cannot be denied, given that many countries have a high percentage of Gross Domestic Product from the foreign trade activity. The most severe economic crisis in decades has affected, inevitably, also the world trade. The 2000 - 2007 period was characterized by an increase of 2,7 % against GDP, reduced demand in the developed economies generating a slight decrease in the last year of this period. According to World Trade Organization, the impact on world trade that started in 2008 was particularly strong, especially in the developing countries. Thus, the average growth rate of 14 % per year, registered during 2000-2008 was replaced by a contraction over 5% in 2009. Compared to 2008, in 2009 the decline in world trade in goods has resulted in a decrease of 22,36 %, meaning from 16100 billion to 12500 billion, representing the most pronounced decrease after the crisis of 1933.

The immediate reaction was to replace the liberalization with the protectionism, either in a visible manner (introduction of new import licensing systems in countries such as Argentina, India and Indonesia, increasing tariffs on some imported products, including iron and steel in Russia or Ukraine) either through subtle measures (U.S adopted Recovery and Reinvestment Act of 2009, which included a "buy American" clause to encourage the purchase of domestic products, model followed also by other countries - "buy Indonesian", "buy Victorian") [1].

Obviously, the adoption of protectionist measures is not a guidance internationally agreed, in recent decades has been actively fightingfor trade liberalization; in the context in which it is considered that this results in a significant improvement ofgrowth prospects for developing countries [2].

At the same time, there are many opinions that the protectionist barriers have no significant influence on economic development. Thus, some authors express their skepticism about the existence of a strong negative relationshipbetween trade barriers and economic growth. Without identifying evidence to suggest an association between trade restrictions and high growth

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rates, they suggest caution in interpreting the relationship between trade policy and economic growth [3].

A recent study estimated a reduced influence, of only one percentage point, of global trade barriers on imports made in 2009 [4]. In addition, the existence of regulations issued by the WTO has not allowed an expansion of protectionism. However, if to the issues mentioned can be added the possibility of unfair practice development it may be considered that the manifestation of a financial and economic crisis globally generates effects with direct or indirect repercussions on international trade and economic development. To highlight this point, we can follow the evolution of world exports and imports in the period 2002-2011 (expressed as a percentage over the previous year) presented in Table 1 and Table 2.

# THE IMPACT OF THE CRISIS ON THE FOREIGN TRADE IN METALLURGICAL PRODUCTS

Tests on the correlation between financial crises and international trade have highlighted a number of issues. Thus, a study conducted on a large set of countries for the period 1970-2009, revealed that imports (particularly those for durable goods and capital) are significantly affected by the occurrence of financial crises (in average with 19 % in the year following the crisis) while exports do not follow the same trend [6]. Also, currency crises negatively affect the trade flows recorded for a long time (exports remain below their natural level for 6 years after a currency crisis). [7].

Banking crises manifested on importers markets adversely affects exports of partner countries (especially those that are dependent on income from foreign trade) [8]. Credit conditions remain an important channel through which the financial crisis affects the trade volume. Countries where rates are higher and credit conditions tighter have less exports achieved during the financial crisis (especially in the sectors financially vulnerable) [9].

The trade of metallurgical products followed the trend of the corresponding goods (Table 3 and Table 4).

The study concerns the following groups of products: semi finished and finished steel products; ingots and semis; long products; flat products; tubular products.

Thus, it can be noticed not only the volume of exports but also that of imports with metallurgical products at the global level have recorded an emphasized decline in comparison with that afferent to merchandise: -24,39 % / -22,92 % in the case of exports at the level of the year 2009 - 4,82 % / -23 % in the case of imports in the same year (Figure 1). It must be noticed that the sinusoidal aspect has continued so that, in the year 2010, it has been recorded a revival at the level of exports and imports with metallurgical products, about 19 % and 10,05 % without reaching the level from 2008.

As a matter of fact, neither in the year 2011, with the exception of Japan and USA from the countries and groups analyzed, it has not been recorded a level higher than that of the year 2007, in what regards exports (the situation is almost similar in case imports, Japan and Asia recording increasescompared with the year 2007). These aspects result from Table 5.

China remains one of the most affected countries from the point of view of the trade with metallurgical products, fact which states the problems concerning the

Table 1 The evolution of merchandise exports in the period 2002-2011 at international level and on countries or groups of countries / %

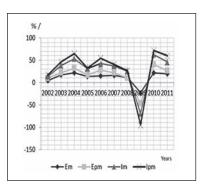
Exports	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011
World	4,86	16,85	21,51	13,85	15,48	15,61	11,52	-2,92	21,78	19,51
EU 27	6,8	19,38	19,48	8,05	12,93	16,46	10,77	-22,41	12,2	17,1
CIS	6,15	27,02	36,43	29,45	25,38	20,77	34,98	-35,9	30,85	33,85
Asia	7,96	18,28	24,07	15,33	16,85	15,81	14,08	-17,65	30,52	17,68
China	22,35	34,59	35,39	28,42	27,17	25,95	17,22	-16,01	31,3	20,31
Japan	3,27	13,21	19,89	5,17	8,7	10,45	9,39	-25,68	32,56	6,84
US	-4,93	4,56	12,43	10,57	13,85	11,91	12,12	-17,97	21,04	15,81

Source: own processing by using [5]

Table 2 The evolution of merchandise imports in the period 2002-2011at international level and on countries or groups of countries / %

Imports	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011
World	3,99	16,68	21,62	13,5	14,58	15	15,58	-23	21,41	19,23
EU	4,81	20,28	19,92	19,92	14,42	16,20	12,25	-24,64	13,04	16,53
CIS	10,08	27,23	30,76	24,64	29,75	35,45	31,95	-33,34	24,6	30,37
Asia	6,45	19,15	25,84	16,13	15,38	14,56	19,76	-19,61	32,15	22,63
China	21,19	39,83	35,96	17,59	19,92	20,8	18,45	-11,18	38,68	24,99
Japan	-3,4	13,56	18,7	13,49	12,25	7,45	22,54	-27,61	25,73	23,18
US	1,78	8,56	17,08	13,56	10,69	5,33	7,37	-26	22,66	15,06

Source: own processing by using [5]



 $E_m$ - exports of merchandise,  $E_{pm}$ - exports of metallurgical products  $I_m$ - imports of merchandise,  $I_{pm}$ - imports of metallurgical products

#### Figure 1 Tendencies of exports and imports of merchandise and metallurgical products at international level in the period 2002-2011

concentration of the industry structure and employment. Also, this situation demonstrates the degree of commercial dependence of China on other countries. In exchange, Japan, although it has recorded a decrease not only at the level of imports but also at the level of exports in 2009, in the years 2010 and 2011 the exports with metallurgical products have known an important growth (this situation is specific to the US).

#### CONCLUSIONS

The influence carried out by the international financial crisis but also by a series of internal and external factors has generated a fast decrease of the prices used on the international market, with direct consequences on the production level and implicitly, on exports. Hence, the global merchandise exports in terms of volume have recorded a decrease of 12,1 % in the year 2009 in comparison with the previous year, the year 2010 showing a revival of 14 % and in 2011 of 4,9 % (without reaching the level of the year 2008). US and China, followed by Germany and Japan are in the top of the biggest merchandise traders at the level of the year 2011.

The diminution of the financial flows generated by the performance of foreign trade operations, the decrease of demand at the global level, with direct implications over the trade volume or the reduction of the growth rate of exports with finished products show only a few effects of the global crisis in the trade area. The protectionist measures have not delayed to appear, although the negative effects recorded after the adoption of any action measures similar to those from 1930 have made their presence felt after a long period of time. The social prob-

Table 3 The dynamics of exports with metallurgical products in the period 2002-2011 / %

Exports	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011
World	5,17	4,68	10,55	3,34	12,26	6,13	-1,6	-24,39	19	7,06
EU	2,84	1,73	10,20	0,82	10,03	3,83	-2,11	-28,74	19,68	8,27
CIS	6,37	2,19	7,62	-0,78	6,39	-2,48	-4,21	-9,31	0,74	-3,49
Asia	9,26	4,73	18,97	6,91	30,27	15,46	-6,12	-28,27	31,82	8,87
China	-9,3	32,14	132,05	36,75	89,19	28,42	-15,09	-57,48	74,15	15
Japan	19,2	-4,07	3,05	-7,86	7,85	2,47	3,71	-9,31	28,32	-4,88
US	-2,53	36,36	0,71	20,32	1,67	1,48	22,11	-21,88	27,75	12,26

Source: own processing by using [5]

#### Table 4 The dynamics of imports with metallurgical products in the period 2002-2011 /%

Imports	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011
World	2,88	8,02	11,04	1,51	12,36	3,67	0,79	-24,82	10,05	13,99
EU	0,32	3,86	9,9	-0,76	22,43	9,57	-7,26	-36,81	24,66	10,58
CIS	-18,11	69,68	12,43	41,9	27,19	27,94	-9,85	-29,26	17,45	25,19
Asia	19,46	8,17	4,68	-2,16	-9,56	8,12	5,26	-10,78	5,27	6,14
China	14,24	47,61	-23,11	-17,82	-30,08	-10,30	-9,04	43,45	-23,21	-4,93
Japan	-21,46	1,87	28,51	23,63	-14,48	6,67	-5,92	-31,99	46,32	25,36
US	8,39	-28,68	50,88	-7,96	39,88	-35,17	-11,01	-37,08	47,05	19,37

Source: own processing by using [5]

#### Table 5 Dynamics of exports (E) and imports (I) with metallurgical products, calculated as an index with fixed base / %

Country/	20	08	20	09	20	10	2011		
Group	E	I	E	I	E	I	E	I	
World	-1,6	0,79	-25,6	-24,2	-11,4	-16,6	-5,2	-4,9	
EU	-2,1	-7,2	-30,2	-41,4	-16,5	-26,9	-9,6	-19,2	
CIS	-4,2	-9,8	-13,1	-36,2	-12,4	-25,1	-15,5	-6,2	
Asia	-6,1	5,2	-32,6	-6,08	-11,2	-1,13	-3,3	4,9	
China	-15,1	-9	-63,9	30,4	-37,1	0,19	-27,7	-4,7	
Japan	3,71	-5,9	-5,9	-36,02	20,6	-6,3	14,7	17,3	
US	22,1	-11,1	-4,6	-44,01	21,8	-17,6	36,81	-1,7	

Source: own processing by using [5]

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lems but also the political aspects have determined a defense reaction materialized in commercial protectionist measures. Even if previous studies have not identified a clear connection between protectionism and the economic growth, this fact must not be generalized.

The trade of metallurgical products experienced a more pronounced decline compared to the trade in goods, metallurgy was adversely affected by the reduction in the growth rate of exports of processed products. If it is considered the wide array of use of metallurgical products in all fields, it is assumed that the growth of world trade in these goods is a sensitive tool for dimensioning the global economic growth. In addition, the specific features of metallurgy (clear orientation towards exports, the high degree of integration of production and the level of concentration, use of raw materials especially from import) determine its sensitivity to fluctuations recorded both in demand and prices at the international level.

Therefore, reducing the negative effects of crises manifested in the economic and financial field, can be achieved through increased labor productivity and competitiveness based on lowering the specific consumption of raw materials and material.

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- Note: The responsible for English language is S.C. Purtrad S.R.L., Târgu Jiu, Romania