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THE EXPECTED EFFECTS OF EU ACCESSION ON THE CHEMICAL INDUSTRIES OF THE VISEGRÁD COUNTRIES

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INTRODUCTION

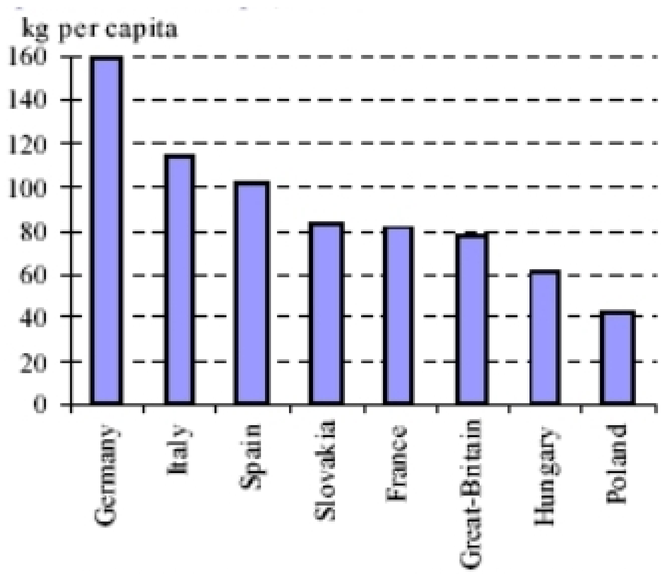
This paper[1] summarizes the main findings of the four country (Czech Republic, Hungary, Poland, Slovakia) studies, concentrating on the common trends that characterize the four accession countries, but focusing also at the major differences.

1. Effects on growth

In all of the four countries the large part of convergence has already taken place. This means that there won't be any dramatic changes connected to the accession except the higher rate of growth in the chemical industry than in Western Europe, which could originate mainly from three sources.

Firstly, in the long run GDP growth and chemical production show strong correlation, indicating that growth in the output of chemical products is double than that of the growth in GDP.

Figure 1. Per Capita consumption of plastics in Europe



Source: Association of the Hungarain Plastics Industry

Secondly, as economic performance improves in the Visegrád countries per capita consumption of chemical products is expected to approach the EU-15 level. These days the consumption is around the half of the leading European countries. However, this is not directly affected by the accession, the entry to the single market is likely to contribute to growth.

[1] Summary of the Studies of the Chemical Industry Section, AMCHAM-ICEG Conference on the Expected Effects of the EU Accession on the Visegrád Countries, March 20-21, 2003, Budapest

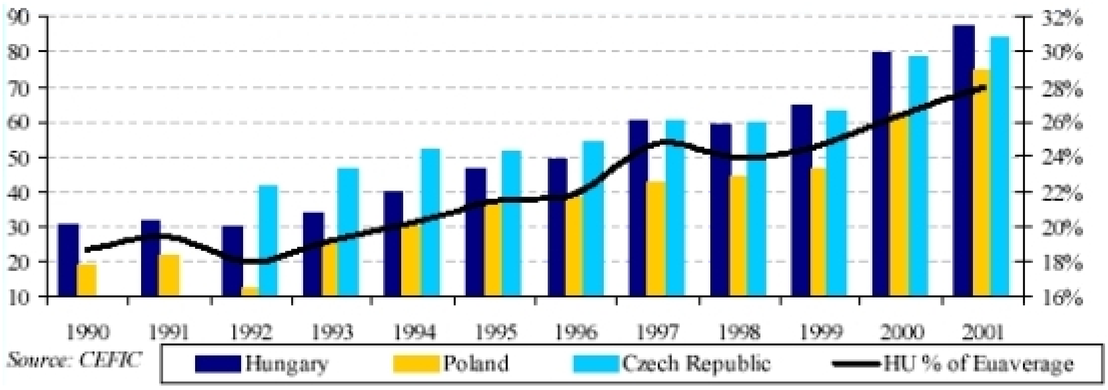
The third source is the higher foreign direct investment inflow, which is largely determined by the privatization of remained state owned assets. In this aspect there are sizable differences among the four countries, but they will be discussed later on.

In addition, the further introduction of the common currency is also expected to stimulate the long-term growth.

2. Effects on the labour market

The chemical industry is rather capital intensive and its contribution to employment in the manufacturing sector is typically lower than its contribution to output. Though significant layoffs and rationalizations have taken place in the region and the labour costs are rising, the overall picture is still of low wages and low production per employee compared to the EU. The average level of sales per employee is less than one third of the EU level.

Figure 2. Sales per employee less competitive even in CEE region



In the labour market wages will probably approach the EU levels in the long run while employment may decrease parallel with increasing productivity. In countries where the chemical industry has a slight overemployment like Slovakia, or where the privatization has not started yet in some sectors, like Poland, employment could decrease faster thanks to modernization pressures.

As for mobility and migration, due to higher level of qualification, workers in the chemical industry are among the best-paid in the economies. As a consequence there is no considerable pressure to change. Moreover because of the need of convergence and to produce goods with higher value added the demand on skilled employees will increase. And finally it is necessary to mention that most countries will not be fully admitted into Schengen on the day of entry, and some countries in the EU declared that they would protect their labour markets.

3. Effects on FDI flows

As it has been already mentioned, the chemical industry is generally a capital intensive sector. Therefore to carry out a green field investment is more expensive than making acquisitions of existing companies and reorganize them.

The main sources of FDI inflows to the accession countries highly depend on privatization and less on the capital investments of the foreign strategic owners in order to prepare their companies for the EU accession especially for the aspect of environmental requirements.

More closely the Visegrád countries show various pictures.

In **Hungary** the privatization process has already passed off, the barriers of investment flows have mostly been eliminated. In 1999 the share of state property corresponded to 12 percent only. Strategic investors are present in several sectors, bring know-how and capital and help to comply with EU requirements. As a consequence, the enlargement is not very likely to have strong effects on foreign direct investment flows from the EU to Hungary.

In **Poland** the privatization of heavy chemical industry plants is still to come. The success largely depends on the interest of foreign investors. Poland's membership in the EU by eliminating the last remaining barriers to capital movement will simultaneously diminish the degree of uncertainty associated with investing in Poland.

In the **Slovak Republic** the half of the 10 major chemical enterprises are in Slovak ownership. With the accession there could be a change in the opinion of domestic owners on keeping their estates which could rise the inflow of FDI.

In the **Czech Republic** most of investments have already taken place, except the privatization of Unipetrol. The most important form of FDI inflow into the Czech chemical industry was the creation of joint ventures with the multinational companies.

4. Effects on market structures

In terms of changes in the market structure the accession to the EU is an important impelling power since the final goal behind acquisitions in the region is to gain market share in accession countries. At the same time the forthcoming accession has geared the efforts for regional concentration and therefore this effect has already thrown out in the market structure.

As for Western European investors, they show a much lesser interest on the Eastern European region because of the shrinkage of their own market and the need of new markets rather than processing capacities. In this respect more promising investment prospects could be found in the Middle East. This relative lack of interest of Western European participants gives an opportunity for Central Eastern European market participants for the establishment of their own multinational companies.

The main factors accelerating the **vertical integration**, which drives petrochemical companies closer to local oil firms, are the needs to secure feedstock supply and to obtain competitive production capacity. As a result of this process Central Europe is also heading for an industrial structure already existing in the EU, characterized by strong ownership interpenetration between companies producing different elements of the chemical product chain.

The main reason for regional expansion derives from the optimal usage of capacities. Another factor accelerating this process is the EU enlargement, the regional companies tending to enforce their market position on this market, which will became soon part of the EU. In addition, privatization of oil and chemical companies is currently undergoing in Central European countries, allowing for **horizontal integration**.

The privatization in the region is still proceeding, however in Hungary that of the chemical sector has already passed off. Under **Poland**'s conditions the case of the heavy chemical industry plants the vertical integration or concentration based on specialized chemicals does not seem to be justified. Consolidation is to be followed by privatization with participation of strategic investors. Only some of the plants of the sector which are still controlled by the State and conducting small-scale production as assessed by global standards are scheduled to undergo vertical consolidation.

In the **Czech Republic** the privatization of the state property shares in chemical industry was carried out by coupon privatization, public tender, direct sale or free transfer. In the process of privatization the majority of companies had been split into smaller entities before they were privatized. The new companies remained sufficiently strong/powerful and also commercial relations between them were mostly unaffected. The current trends in the Czech Republic confirm general world tendencies in chemical industry: concentration is being controlled by a closed number of great multinational companies producing broad range of products. The need of capital can arise some problems for small and medium sized enterprises due to their less economic power than large enterprises and insufficient legal, economic, technical and management capacities.

5. Effects on foreign trade

Hungary has a free trade agreement with the EU and has been progressively reducing import tariffs. Trade barriers and technical barriers have been removed for the majority of chemicals (there remained some modest levels of protection on detergents and ammonium nitrate, to be removed when Hungary joins the EU), thus industry is exposed to competition with EU producers. This means that the accession will probably not effect trade with EU significantly.

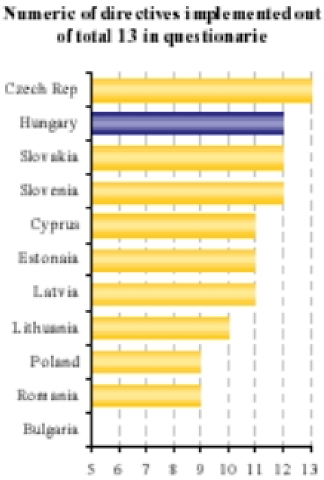
The fears that **Poland**'s entry into European structures might deprive the chemical sector of mechanisms of domestic market protection against foreign competition seem unjustified. Namely, trade protectionism has been largely eliminated from the Polish chemical sector's trade with the EU-15, revealing a substantial competitive advantage of the EU industry over Polish industry. A sizeable trade deficit on Poland's part is a consequence of that.

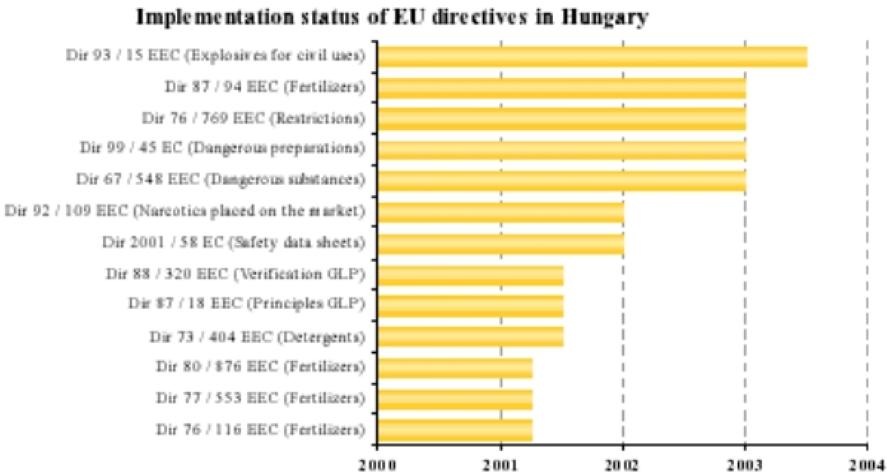
In 1995 the **Czech Republic** (CR) and the EU entered the Europe Accession Agreement establishing the free trade area between Czech Republic and EU and so fully liberated trade with industrial products. EU countries became the main business partners of Czech Republic. After EU accession CR will take a part in common commercial policy. This fact can have the following consequences:

1. Czech Republic’s access to all EU treaties that create customs unions, free trade areas and preferential tariffs regimes with third countries. This will result not only in easier access of Czech products on the markets of those countries but also higher degree of competition from their part on the Czech domestic market and so import of cheap chemical products from Asia, South America and others is expected.

2. Access to common customs tariff, EU common customs tariff differ only slightly from current Czech customs tariff and it applies to several non-European countries so no substantial change in flow and structure of the export of chemical products is expected.

6. Legislative impact of accession





Source: CEFIC (Making the enlarged internal market for chemicals reality. Conference on November, 2002)

Hungarian chemical companies generally meet the EU requirements, and the Hungarian legislation affecting the chemical industry made more progress than the implementing of other general issues. According to the last country report "Significant progress was also made in the area of environment, notably through the adoption of legislation on Environmental Impact Assessment, on water, waste, industrial pollution control and risk management, on chemicals and on radiation protection. The administrative capacity in this sector was also improved, but needs further strengthening, in particular as regards the clear distribution of tasks between the ministries involved."

The works on harmonization of the **Czech** legislation have made a significant progress. In most cases it is a continuous process, where new EU regulations are implemented. In the sphere of environmental regulation, Environment chapter has been provisionally closed. The Czech Republic has been granted transitional arrangements for packaging and packaging waste (end 2005) and urban waste, water treatment (end 2010). In order to complete preparations for membership, the process of harmonization is continuing and at present the highest importance is given to finalizing transposition and implementation, ensuring the provision of the necessary financial means and strengthening overall administrative capacity, in particular at the regional and local levels.

Accession to EU will strengthen the enforcement of law and will have positive effect on the operation of the Czech judicial and administrative bodies (EU supervision). On the other hand serious problems can arise for SMEs. They do not have enough capital and human resources to face new requirements not only on ecological limits, but also on quality standards and the management concerning safety and the environment.

Since the **Polish** chemical industry has largely been applying obsolete environmental protection technologies which do not meet EU standards, the implementation of these regulations are bound to incur high costs. Since this problem relates primarily to already existing industrial plants, Poland has been granted a three-year transitional period to implement the Directive for the existing industrial plants.

As for the ration of recovery of materials from wastes it is necessary to develop a system of waste collection and sorting, as well as to build waste processing plants and incineration plants. Given the incurred costs, Poland has been granted in this field a five-year transitional period, too.

In the field of air pollution emissions, in 2002 the European Commission adopted a new directive introducing, as of 2005, more restrictive standards for emissions of sulphates and nitrates. In November 2002 Poland was granted at this time a five-year transitional period for implementation of new standards.

7. Policy recommendations

In **Poland** restructuring and privatization of the heavy chemical industry plants is an obvious necessity and it also seems that carrying out a comprehensive strategy is already delayed, in particular taking into account Poland's approaching membership in the EU structure, and the possible intensification of the competitive pressure.

Policy measures related to the individual sectors according to the **Czech** study are:

- Support of entrepreneurial activities in industry and industrial services, including SMEs with facilitating access to capital and improving access to more information.
- Restructure the industrial production base while adhering to the principle of sustainable development.
- Enhance the competitiveness of chemical production by the way of increasing the effectiveness of production, upgrading the technical standard of production and increasing the market share.
- Develop the human resources in industry
- Support the research and development and the industrial co-operation, as an important factor of growth, also respecting environmental protection.

Recommendations according to the **Slovak** study are:

For corporate sector:

- Move the attention to middle and long term strategy
- Invest into new technologies in time
- prepare skilled workforce
- eliminate over-employment

For general policy makers:

- Eliminate the barriers of entrepreneurship in Slovakia
- Education system must be reformed
- Support re-investing profit by tax-cuts

8. SWOT analysis of the chemical industries of the Visegrád countries in the mirror of accession

Strengths	**Weaknesses**
· relatively low labor costs · skilled and adaptable workforce · tradition of chemical production	· much lower labor productivity than EU countries · dependence on imported feedstock · dominance of products with low value added
Opportunities	**Threats**
· liberalization of the market · increasing foreign investment inflow · the expected strong growth of demand for most chemical products · reduction of transaction costs and improvement of competitiveness in connection with expected introduction of the Euro	· urgent need for taking up costly environmental investments · possible outflow of skilled labor force after accession · gaining competitive pressure from EU companies · increasing labor costs

prepared by Péter Sulán