

**THE SINGLE MARKET AND THE DEVELOPMENT
OF «EUROPEAN CHAMPIONS»**

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ABSTRACT

This paper analyses the potential of the EU's «New Industrial Policy», suggesting that the European growth problem calls for a concentrated supra-national effort to promote the development of «European Champions», particularly addressing the current technological shortfalls of the Union. Spurred by the challenges of the global economy – the American leadership and the rise of the Asian Tigers – and its own Eastern Enlargement, the beginning of the twentyfirst century saw an end to the «suspension» of the EU Industrial Policy characteristic of the 1990s. The EU's sluggish productivity growth of the recent years and her distance from the new frontiers of technological innovation calls for a «rediscovery» of Alexis Jacquemin's 1987 insight. Given that leaving everything in the hands of the market will not necessarily lead to appropriate industrial reconfigurations – as required by changing global economic conditions – there is a need to formulate «[...] a concerted European industrial policy that will help overcome industry strategies along national lines». In other words, in this new economic setting, Member States should transcend their economic nationalism and concentrate on developing truly «European Champions», particularly in sectors where there is more intense R&D effort and where economies of scale and scope are important (we should label these of “Type I”). In order to do so, the EU must aim to particularly address its relatively low investment rate in knowledge and innovation, that is, to bring about a definite reinforcement of the third side of the European Industrial Policy «triangle» – Technology Policy, without weakening the other two – Competition Policy and Commercial Policy – that have already made significant headways during the 1990s. Going towards a basic taxonomy, a second type of European Champions emerges in the Single Market, mainly as the result of the current mergers-and-acquisitions (*M&A*) wave.

JEL CLASSIFICATION: L50; L52

KEYWORDS: EU Industrial Policy; European R&D; Competitiveness; Lisbon Strategy.

I. INTRODUCTION

Since 1990 European industrial policy has not been at the top of the political agenda with the impact noted over the last three years. At that time the European Commission presented a Communication entitled «Industrial Policy in an Open and Competitive Environment: Guidelines for a Community Approach» [COM(1990)556]. However, in December 2002 – here we are in the present days – the Commission issued a new paper entitled «Industrial Policy in an Enlarged Europe» [European Commission 2002*b*]. This was the first of a long series of new Community reports, which we will discuss further. Actually, in the first instance, the original Bangemann Communication – from the name of the Commissioner who was responsible for the dossier at the time – was followed by others through the 1990s.¹ Nevertheless, at least in this context, there is the distinct impression of unfinished business.

Europe was making headway in completing the two great and winning ideas for a *Single Market* (the «four freedoms» of circulation) and for the *European Monetary Union* (the convergence towards the «Maastricht criteria»). Despite the necessary integrations and improvements required, these achievements contributed to build the European economic structure we know today. In addition, it was at the turn of the twentyfirst century that the fundamental steps were being taken for what was to become the third great EU historical success: its *Enlargement towards the East* (the «unification of Europe»).

What remains to be understood, however, is what caused the sort of «suspension» of industrial policy we refer to and which lasted at least ten years. Was it because in those years united Europe was completing the fulfilment of three of its great ideas, as we just described? Or did it depend more on the fact that, for much of the 1990s, competition policy, liberalization and privatization were considered the best tools for public intervention in the economy?

If we take the first theory as valid, it is not surprising that we have to make a leap from 1990 – following our simple reconstruction – to 2002 to discover a decisive drive by Community institutions towards a (new) industrial policy: in the last decade United Europe has had other priorities («One market, one money»), and much was achieved. On the other hand, if we are curious about the second theory, we need to undertake patient investigation of how the European integration process came about: the ideas that influenced its progress, the institutions called upon to generate its growth. This essay² is an initial attempt in the latter direction.

In any case, aside from the preferred theory, there is another key factor: the economic context was different, at least in the early 1990s.

A revolution focusing on information and communication technologies (ICT) – and the America's new economic boom [Council of Economic Advisers 2001] – was just starting. The affirmation of new world economic major players – above all China, but more in general all the «BRICs countries» [Goldman Sachs 2003] – could certainly be glimpsed but still it had not produced in full its shattering effects can be observed today. We do know that all these phenomena completed their growth curve between the end of the 1990s and the beginning of the new century, thus fully revealing their effects. So, driven by this dual revolution (the New Economy and the Asian miracle), European economy – starting with the manufacturing industry – found itself dealing with quite long-term challenges, which had not occurred for some time.

As we mentioned, another big challenge was on home ground: the EU enlargement to embrace eight to ten Central Eastern European countries, as well as Cyprus and Malta. By simplifying a great deal, we can restrict eastward enlargement merely to its economic dimension, without neglecting its

¹ European Commission [1994], [1998].

² And more in general the book I have edited, *Le nuove politiche industriali nell'Europa allargata* [Mosconi 2005*b*], 2nd edition.

enormous importance in political, historical, cultural and institutional terms. Yet, if we consider the economic implications of the enlargement – especially against a backdrop of literature that has become quite boundless [European Commission 2001]³ – we will see that first of all there is a further extension of the Single Market, which has always been (from the Treaty of Rome onwards) the driving force of European integration and the growth of wealth in a united Europe.

The analysis of the links between «growth effects» and «European integration» was at the heart of the well-known textbook by Baldwin and Wyplosz [2004, chapter 7]. Building on the new theoretical foundations offered by endogenous growth models, the authors try to demonstrate how international economic integration – and European integration is an excellent example – stimulates economic growth «[...] by changing the rate at which new factors of production – mainly capital – are accumulated, hence the name ‘accumulation effects’». In turn, the creation of new «capital» must be considered as part of three categories: «[...] physical capital (machines, etc), human capital (skills, training, experience, etc) and knowledge capital (technology)». All three categories contribute to economic growth. What changes is their relative importance in the medium and long term: certainly, the accumulation of investments in physical capital is a significant growth factor. Nevertheless, as such investments face diminishing returns to scale – the argument goes – «[...] long-run growth effects typically refer to the rate accumulation of knowledge capital, i.e. technological progress». In the same perspective we could include the OECD [2003] works published within the extensive research project on «The Sources of Economic Growth in OECD Countries».⁴

To sum up these initial points, we could say that the challenge the EU is facing is twofold; firstly, the renewed American challenge, whose core is in hi-tech production, and secondly, the new Asian challenge, consisting primarily of large volumes and low costs, but also in growing technological improvement of production. In addition, the EU is dealing with the challenge – which is definitely European – of Enlargement, i.e. a bigger Single Market. According to André Sapir’s [Sapir 2005], this should be seen as a great opportunity – and not as a burden – for «[...] a pan-European industrial reorganisation», provided that Europe is able to transform «the enlarged European Union of 27+ members into a genuine Single Market, where goods, services, capital and labour are allowed to freely circulate [...] Giving countries the opportunity to exploit their full comparative advantage and companies the chance to restructure their activity on a pan-European scale, would much improve the attractiveness of Europe as place to create wealth and employment».

The parallel between Eastern Europe and Asia is recurrent in the new Commission’s documents on industrial policy, especially where resounding worries were expressed by more than one head of State and government. We are thinking of initiatives, unveiled during 2003-2004 by President Chirac, the then Chancellor Schroeder and Prime Minister Blair, with regard to the risk of «de-industrialization» in Europe, also as a consequence of the continued flux of «de-localizations».

I.1. PAPER PLAN

The plan of this paper is as follows. Section II sets the groundwork by providing an overview of the main EU documents and studies that delineate the new European industrial policy. Section III provides a theoretical background to the debate by drawing from the insight of the late Professor Alexis Jacquemin that leaving everything in the hands of the market will not necessarily lead to appropriate industrial reconfigurations as required by changing global economic conditions. There is a need for strategic policy interventions that are able to assist European industry in adjusting to the challenges of the twentyfirst century.

Section IV reviews the main strengths and weaknesses of the European industrial sector, claiming that the latter constitute the *raison d’être* for renewing industrial policy on a European level. On the one hand, European industry remains a «dominant force» in international trade; its companies are global leaders in some important sectors; and the Eastern Enlargement offers new opportunities for pan-European reorganization of companies. On the other hand, however, the gap in the trend and level

³ See also F. Mosconi [2004a].

⁴ See also I. Visco [2004].

of EU productivity growth with respect to the US reflects a fundamental problem for the current and future competitiveness of European industry.

Section V outlines the main aspects of the Commission's new policy response to this competitiveness problem. According to Commission documents, the problem calls for: (a) a «horizontal» approach (i.e. framework conditions), but with «vertical» applications (i.e. some industrial sectors), (b) multiform links to other main Community policies (e.g. efficient markets, competition policy), (c) attention to potential de-industrialisation, and (d) to de-localisation of industry, particularly in high-technology, research intensive sectors.

In light of these economic trends, Section VI asks whether now is the right time to foster «European Champions», that is, to promote a concerted European industrial policy that transcends national lines. More specifically, it asks (a) whether there is still a need for *big* firms to control high-tech industries and the frontiers of technological progress, and (b) if there is still a significant role for manufacturing activities in our economies dominated by the tertiary sector. The answer it provides is positive on both counts. Section VII remarks on the methodological aspects of developing «European Champions». It notes that the rising forces of international competition, together with the privatisation and liberalization trends of the 1990s, prevent the development of new successful «National Champions». It argues that, thus, Member States should resist pressures of economic nationalism and see the EU as a whole as the natural landmark for tracing their research policies. In this context, the role of national governments – as well as that of the EU – should be limited to giving the market the best rules of the game and to boosting investment in knowledge at the European level.

Section VIII concludes, by drawing attention to the fact that in European tradition, industrial policy should be seen the result of a triangle formed by (1) *Competition policy*, (2) *Commercial policy*, and (3) *Technology Policy*. The core issue remains the same today, i.e. how to envisage new policies for the competitiveness of European industry, over the years of new technological revolutions and a growing extension of international markets? A suitable conclusion is that the new industrial policy in the EU must lean to a definite reinforcement of the triangle's third side, without weakening the other two, while using the «European Champions» as an essential means to reach this balance.

II. THE SOURCES OF NEW EUROPEAN INDUSTRIAL POLICY

The EU's documents are useful to distinguish what can be called the *new* European industrial policy from what the Nation-states and the then-EEC implemented throughout the early decades of the post-WWII period. Considering them, we will first make reference to fundamental documents beginning in December 2002; then we will discuss what approach emerges, on what principles it is founded and what nuances emerge.

Let us start by recalling the documents. The heading «Industrial Policy» currently covers four Communications by the European Commission, all presented in the 2002-2005 period:

- i) The first, already indicated as the start of this new story, was that dated December 2002 [COM(2002)714] [European Commission 2002*b*];
- ii) the second arrived in November 2003: «Some key issues in Europe's competitiveness - towards an integrated approach» [COM(2003)704] [European Commission 2003*b*];
- iii) whilst the third was dated April 2004: «Fostering structural change: an industrial policy for an enlarged Europe» [COM(2004)274] [European Commission 2004*b*];
- iv) finally, the fourth and most recent issued a couple of weeks ago (5 October 2005): «Implementing the Community Lisbon Programme: A policy framework to strengthen manufacturing – towards a more integrated approach for industrial policy» [COM(2005)474] [European Commission 2005*b*].

The Communications are supported by many extensive research projects that include *ad hoc* studies and presentation conferences – the first dated January 2003 – including speeches by President Prodi and Commissioner Liikanen. Even though this is quite an extensive selection of studies and analyses, the *corpus* of documents worth reviewing in the light of new industrial policy does not end

here. A useful integration certainly involves the annual *European Competitiveness Report*, a series inaugurated in 1999.

In the background there are also two main points of reference:

(1) the «Lisbon Agenda», an ambitious strategy for the modernization of the European economic and social models. Notwithstanding the Agenda's countless significant methodological problems [European Commission 2004*a*; 2005*a*], it is also argued that «the EU has achieved more than most people realise» [CER 2005]. The main picture that emerges from various studies so far is that there the Member States are divided into «heroes» and «villains» in terms of their compliance with the goals of the Lisbon Strategy.⁵

(2) the «Sapir Report» (*An Agenda for a Growing Europe*),⁶ an excellent attempt to update what the Report by Tommaso Padoa-Schioppa (*Efficiency, Stability and Equity*)⁷ laid down 15 years before, i.e. «[...]the intellectual foundation for the construction of a coherent economic edifice resting on three pillars: the Single Market, to improve economic efficiency; an effective monetary arrangements, to ensure monetary stability; and an expanded Community budget, to foster cohesion». In short, «Europe's growth problem» (Table 1) has been at the heart of the new Report, and as a consequence «growth must become Europe's number one economic priority».

TABLE 1 - EUROPE'S GROWTH PROBLEM

	1950-1973 «The Golden Age»	1973-1993 «The Fall»	1993-2000 «The Stabilisation»
Growth	4,6%	2,4%	2,4%
Cohesion			
• Unemployment	2%	8%	9%
• Public spending (% GDP)	< 35%	37% → 51%	51% → 46%
Stability			
• Inflation	4%	8%	3%
• Public deficit	< 2%	0% → 6%	6% → 0%

Source: adapted from A. SAPIR, *Enlargement and the Competitiveness of European Industry*, Paper presented at the 27th Italian National Conference on Industrial Policy and Economics, organised by «l'industria» and the Faculty of Economics, University of Parma, 26-27 September [Sapir 2003*b*].

So far we have passed in review the general context in which the new EU industrial policy must be considered, or rather, its «sources». In the next paragraphs, we will mention again both the four Communications of the European Commission presented in the 2002-2005 period, and some of the «Sapir Report» policy directions. On one hand, focusing on 2002-2005 Communications, we will try to clear up the approach to the industrial policy, which, although it is mainly horizontal, has also some vertical applications (in certain sectors). On the other hand, we will dwell upon «Sapir Report» – a six-point *agenda* – and demonstrate the importance of encouraging the «knowledge investments».

But, first of all, we must return to the connection between the pace of economic growth and the forces acting in the contemporary industrial context. As a fundamental step, let us focus on Alexis Jacquemin's great work.

III. ALEXIS JACQUEMIN'S CONTRIBUTION

⁵ The 2005 CER Lisbon League Table reveals that the top five countries in terms of progress made since 1999 in overall performance are as follows: Sweden, Denmark, United Kingdom, Netherlands and Finland [CER 2005].

⁶ A. Sapir [2003*a*].

⁷ T. Padoa-Schioppa [1987].

Few topics have aroused such extensive debate amongst economists of various schools and beliefs as industrial policy regularly does. However, it is equally true that few essays like that by Alexis Jacquemin [1987, chapter 6] have offered a clear analysis of the various roles assigned to industrial policy. Professor Jacquemin wrote that the choice of a particular social model would largely depend on whether more stress is placed on the spontaneous setting of market forces or on the strategic behaviour of public and private actors.

The contrasting position between the two paradigms that Jacquemin called, respectively, «the efficiency of selection through market mechanisms» and «the role of strategic behaviour (private or public) affecting these same mechanisms» are the *leitmotiv* of his well-known essay on *The New Industrial Organization – Market Forces and Strategic Behavior*: a contrast that could not fail to have an effect on economic policy choices and on industrial policy in particular.

So – he argued – «for those who have full confidence in market mechanisms, the only real requirement is the existence of a healthy macroeconomic environment», whereas – he continued – «there is a whole tide of research questioning whether the market alone can efficiently accomplish selections leading to new industrial organisations». The author then developed the latter thought to arrive at the classic two-level argument that justifies an industrial policy:

- (i) «The long list of so-called market failures» (in this context R&D support in hi-tech sectors is openly mentioned);⁸
- (ii) «A second level of argument in favour of a positive industrial policy goes beyond the consideration of failures inherent in certain markets. It concerns strategies that deliberately influence the transformation and the industrial reorganization of sectors, and nations».

Alexis Jacquemin did not conceal his own preference. He also made use of numerous examples of those years (his overview takes into account the US, Japan and, above all, Europe), and he made severe criticism of the methodological approach «based on the idea that competitive processes ensure the survival of the fittest».

Lastly, he dedicated himself to a study of the «characteristics of an approach that allows for the existence of a strategic dimension in socio-economic behaviour». Over the years several of his intuitions have shown great foresight, for instance, his criticism of domestic policies of Member States that pursued the creation of «National Champions». On the other hand, the time lost by our European companies compared to those in America and Japan – writes Jacquemin in 1987 – «lead to the possibility of a concerted European industrial policy that will help overcome industry strategies along national lines, reduce barriers between national champions, and develop a large home European market for industrial applications».⁹

IV. IS THERE A PROPER FIELD FOR «EUROPEAN CHAMPIONS»?

When at the beginning of the twentyfirst century the European Commission began speaking of «European Champions on the global market» – early 2003, right after the first Communication on new industrial policy [European Commission 2002*b*] – it simultaneously identified a relevant playing field. In his speech President Prodi [R. Prodi 2003] provided an initial list, as follows:

- ✓ «*biotechnology*»;
- ✓ «*information and communications sector*» (where «our leadership in mobile telecommunications is under threat in a new battle over standards and operating systems»);
- ✓ «*renewable forms of energy*» («including the use of hydrogen as the alternative medium to store and transfee energy»);

⁸ «Public authorities – the argument goes — could then favour organizational forms that internalize the external effect of important technological choices and promote the emergence of poles of competition; through financial aids and specific public programs they would be required to support research and development in high-technology industries (microcomputers, aerospace, biotechnology) affected by important fixed and sunk costs [...]».

⁹ Emphasis mine.

- ✓ «defence industry» («still fragmented because of a failure of will to build a truly integrated European defence system»);
- ✓ «aerospace industry» («still split between civil and security applications»).

In fact, in the context we are looking at, other sectors gradually emerged from the Commission's documents on industrial policy. Summing-up from 2002 Commission's Communication:

- (i) European industry remains a «dominant force» in international trade: the EU's share in world exports was 18.4% in 2002 (down from 19.3% over the period 1991/95), while over the same period, the US share went down from 15.1% to 12.1% and Japan's share from 12.2% to 8.2%;
- (ii) EU companies have achieved a «global leadership» in some key sectors such as motor automobiles, aeronautics, or some categories of telecommunications equipment;
- (iii) Two outright «European Champions» – we shall add – like the Airbus Consortium and STMicroelectronics already exist;
- (iv) Finally, considering the implication of enlargement for industry, «significant, but unequal, progress has already been achieved», even if «sizeable differences still exist between the structure of the manufacturing industry in existing and in future Member States». Enlargement offers new opportunities for a pan-European reorganisation of companies (and quality upgrading is a phenomenon already in place in many Eastern European countries).

So, all is well that ends well? Things are never so simple, and alongside the unequivocal strengths of European industry, outlined above, we can also see some weaknesses that constitute the *raison d'être* for renewing industrial policy at European level.

As far as competitiveness of European industry is concerned, the performance is not entirely positive «in some of the highest value added segments of the economy» (e.g., Electronics and Office machinery and computer industries). In other words, the EU «tends to specialise in medium-high-technology and mature capital-intensive industries. If it is essential to keep the strengths in these sectors [...] the EU should seek to reinforce its position in enabling technologies such as ICT, electronics, biotechnology or nanotechnology».

More in depth, as the «Sapir Report» pointed out, Europe needs «to boost investment in knowledge» because nowadays «innovation is the driver of economic growth». The figure and the gap with the main competitor deserve attention [Sapir 2003a]. Firstly, the EU invests less of its resources in research;¹⁰ secondly, it registers fewer patents;¹¹ and establishes fewer new successful companies.¹² From here we could move on to educational attainment of the population: in our innovation-driven economies, «the US has a bigger share of population aged 25 to 64 years who have completed higher education than any EU Member State – over one-and-a-half times the current EU average».¹³ The US «already spends a higher share of GDP on higher education from public sources than the EU average»;¹⁴ but «the addition of very substantial private sources means that the US spends more than double the EU average on higher education and more than any Member State».¹⁵

In the same perspective, the «Stanford-Yale-Sussex» synthesis has made a step forward discussing the (real) existence of the so-called «European Paradox» [Dosi, Llerema and Sylos Labini 2005]: «The central point of the “paradox” is the claim that the EU scientific performance is “excellent” compared with its principal competitors, while Europe's major weakness lies in its difficulties in transforming the result of research into innovations and competitive advantages».

¹⁰ «In 1999, total US expenditure on R&D at 2.6% of GDP was over a third higher than that of the EU. Nearly all of the difference can be attributed to a substantially higher investment in R&D by business», [Sapir 2003a].

¹¹ «By the year 2000, even the best performing EU Member States could only manage half of the number of patents per million inhabitants as the US, and the EU as a whole only a quarter», [Sapir 2003a].

¹² «At the end of the 1990s 12% of the largest 50 US firms by market capitalisation had been founded less than 20 years previously against just 4% in Europe», [Sapir 2003a].

¹³ 50.3% compared to 37.3% for Upper secondary and Post-secondary, 37.3% compared to 23.8% for Tertiary, [Sapir 2003a].

¹⁴ 1.4% compared to 1.1%, [Sapir 2003a].

¹⁵ 3.0% compared to 1.4%, [Sapir 2003a].

Illustrating some of the strengths and weaknesses of European Science and Technology (S&T) system, the authors argue «that the paradox is nowhere to be seen».

The indicators range from «scientific excellence» (e.g., published research papers, impact of scientific output, individuals citations) to «R&D inputs and innovative outputs» (e.g., business enterprise R&D, world top R&D performers, knowledge workers, patent-based indicators), while a third set of elements come from the «structural weaknesses of European corporations and science-industry interaction» (production shares in several ICT sectors, performance in trade in major high tech sectors, performance of the top 250 ICT firms).

All the indicators mentioned above from both the «Sapir Report» and the «Stanford-Yale-Sussex» synthesis point in the direction of an issue that is the most revealing of the problem, i.e. *productivity* (its trend and its level). The gap still separating the EU from the US – a gap that has become larger since the mid-1990s – is the keystone to the building of this new industrial policy¹⁶.

It is significant to note that just a few months before the December 2002 Communication, which was mentioned repeatedly as the first act in this new series, the Commission actually defined and approved (21 May 2002) a Communication entitled: «Productivity: The Key to Competitiveness of European Economies and Enterprises» [European Commission 2002a], which analyses «recent slowing of growth in the EU productivity», which «is synonymous with falling competitiveness» and where the first indications for restoring satisfying rates of productivity growth are outlined, both for the manufacturing sector and for services. Whilst acknowledging that poor EU results are not caused by a single factor, the Commission's final observations conclude: «Nonetheless, it is popularly thought that ICT and innovation are playing a crucial role in accelerating productivity growth in several Member States and in the US».

Productivity levels and dynamics – as shown by economic theory – reflect the ability of a country (or in the Union's case, of a group of countries) to invest in physical, human and knowledge capital. The theory, but also the empirical evidence of our times, always point to R&D, technological innovation and human capital as the most important sources for productivity growth and, consequently, for overall economic growth. So it is no coincidence, returning momentarily to theoretical developments for industrial policy, if analysis in literature of market failures that require public intervention falls on R&D externality and creation of knowledge [Navarro 2003].

V. THE POLICIES FOR THE COMPETITIVENESS OF EUROPEAN INDUSTRY: SOME «STYLISTED FACTS»

Without pretence of completeness, the four European Commission's Communications on industrial policy (the now-familiar 2002, 2003, 2004 and 2005 editions) highlight the following aspects, which we will simply list for the time being:

- a) *A «horizontal» approach, but with «vertical» applications (i.e., for some industrial sectors):* «On the basis of the horizontal approach aimed at creating adequate framework conditions, a number of priorities should be identified with a view to facilitating the development of domains with a strong potential» [Dec. 2002];
- b) *Multiform links to other main Community policies* (e.g., markets that work well and competition policy; centrality of «knowledge»);
- c) *Is it (and will it ever be) true de-industrialisation?:* «On the basis of the data reviewed here, there is no evidence that the EU economy is showing signs of de-industrialisation. Nevertheless, it is possible that during a period of slow growth and poor productivity and innovation performance, conditions contributing to setting out such a process might emerge» [Nov. 2003];

¹⁶ See: *European Competitiveness Report 2003* [European Commission 2003]; M. O'Mahony, B. van Ark (Eds.) [2003]. Comparing the two economies – the Old Continent and the United States – overall (GDP growth, presence of the world's biggest businesses, stock market size, etc), Mario Draghi [2004] identifies «the most revealing comparison» of the difference between the two shores of the Atlantic as: «From the early twentieth century to present, eight times more Nobel prizes were awarded to American scientists than to scientists in the rest of the world. It is also a paragon that seems to point the way to which path we Europeans should follow».

- d) *The real impact of de-localisation*: «De-localisation has, indeed, been limited to low-technology, labour-intensive activities. However, such re-location is often accompanied by the retention of, or creation of new, jobs in Europe in service areas such as design, marketing and distribution [...] Europe must develop and strengthen further its competitive manufacturing base. To achieve this, it is necessary to raise its R&D and innovation performance, to strengthen its human capital base and to develop conditions supportive of enterprise and of productivity growth. However, other aspects of de-localisation, such as the migration of R&D activities, constitute genuine threats to Europe's future. Companies are conducting a growing share of their research outside Europe, particularly in high-tech, research-intensive sectors such as pharmaceuticals or biotechnology. These activities increasingly move to the US to take advantage of favourable regulatory, structural or finance conditions and of the availability of skilled workers» [Nov. 2003].

Each issue should deserve further examination and in chapter 1 of my book [Mosconi 2004] I sought to review them all. Here we will simply make a couple of remarks, beginning with a summary of the latest Commission's Communication – unveiled on 5 October 2005 — which «includes new horizontal initiatives and tailor-made initiatives for specific sectors» (Table 2).

TABLE 2 – A NEW INTEGRATED INDUSTRIAL POLICY

Seven major cross-sectoral policy initiatives	Seven new sector-specific initiatives
[1] An intellectual property right (IPR) and counterfeiting (2006)	[1] New pharmaceuticals Forum (first meeting in 2006)
[2] A high level group on competitiveness, energy, and the environment (end 2005)	[2] Mid-term review of life sciences and biotechnology strategy (2006-2007)
[3] External aspects of competitiveness and market access (Spring 2006)	[3] New High-Level Groups on the chemicals and the defence industry (2007)
[4] New legislative simplification programme (October 2005)	[4] European Space Programme
[5] Improving sectoral skills (2006)	[5] Taskforce ICT competitiveness (2005/2006)
[6] Managing structural change in manufacturing (ed 2005)	[6] Mechanical engineering policy dialogue (2005/2006)
[7] An integrated European approach to industrial and innovation (2005)	[7] A series of competitiveness studies, including for the ICT, food, and fashion and design industries

Source: European Commission, «Implementing the Community Lisbon Programme: A policy framework to strengthen manufacturing» [COM(2005)474], Brussels, 5.10.2005

In addition, we will indicate the usefulness of an «industry perspective» used once again by the Commission in its analyses, also making reference to a work by M. O'Mahony and B. van Ark [2003]. Of course, the manufacturing industry's share in the EU production fell from 30% in 1970 to 18% in 2001, with the parallel explosion of services that leapt from 52% to 71%. This, however, is the natural economic process of structural change that has always been typical of modern capitalism.

Discussing dynamics which are related to employment and production for an extensive set of manufacturing sectors covering the period 1979-2001, subdivided into a further two periods (1979-1995, 1995-2001), the 2003 Commission's Communication also states:

«Developments in EU industry competitiveness in recent years show considerable diversity. Productivity growth in manufacturing began to decelerate in the mid-1990s and it has since fallen behind the US. The sectors that have contributed to the widening of the productivity gap are mainly high-tech sectors. However, European ICT-producing manufacturing and services have performed extremely well, but productivity growth in ICT-using sectors has not accelerated as in the US. It is clear that ICT has been a key factor in sectoral productivity performance [...] The fundamental determinant of manufacturing output has been rapid productivity growth» (see also Table 3).

TABLE 3 – LABOUR PRODUCTIVITY IN EU-14 MANUFACTURING INDUSTRIES RELATIVE TO THE US (US = 100)

	1979-1981	1994-1996	1999-2001
Total manufacturing	84.6	88.0	80.3

Source: M. O'Mahony, B. van Ark [2003]

VI. AMERICAN LEADERSHIP AND «EUROPEAN CHAMPIONS» IN THE MAKING...

Dealing with all these trends, and in the light and shadow of the current competitive position of European industry on the global scenario, has the time really arrived – we may wonder – to open the age of the «European Champions»? In other words, picking up Alexis Jacquemin's insight, the age of «[...] a concerted European industrial policy that will help overcome industry strategies along national lines»? [Jacquemin 1987].

Several sector applications emerging from the new European industrial policy appear as signals pointing to that direction. Of course, not all industrial sectors necessarily need to produce new giants: there are a great many examples where the «medium» company size is the right one (for instance, in Italy, where the «seedbed» of about 3,900 *Medium Industrial Enterprises* registered by Mediobanca-Unioncamere [2004] has for many years been hallmarked as brilliant performance).

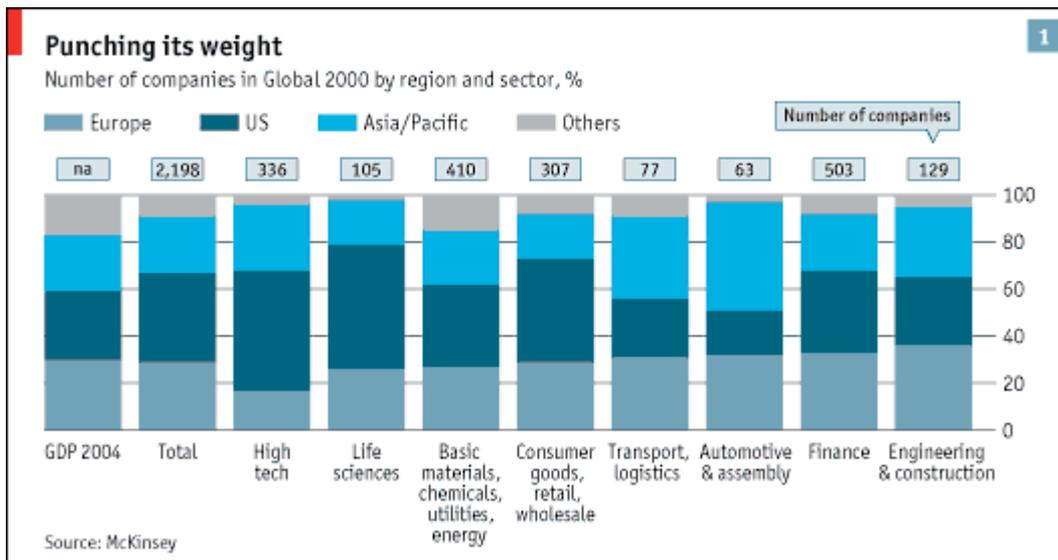
Coming back to the (new) «European Champions» and attempting some generalization, natural candidates appear in sectors where:

- (i) there is more intense R&D effort (and where, therefore, scattering research into as many channels as there are Member States brings the risk of no domestic business acquiring the critical mass necessary for generating inventions and innovations);
- (ii) economies of scale are important (and where, therefore, the failure to establish new European businesses hinders full enjoyment of the advantages of a continental market, moreover «enlarged» as it is now our case).

Europe is not at Year Zero on entrepreneurial dynamism: there is no lack of strengths, but there is still much to be done as the slow productivity growth demonstrated (table 3).

In its recent survey of “European Business” (February 10, 2007), *The Economist*, quoting an analysis by McKinsey, argued that «Europe has 29% of the world's leading 2,000 or so companies, broadly in line with its 30% share of world GDP. It punches its weight in most global industries except IT, where America is leagues ahead» (see next figure).

FIGURE 1



Source: The Economist, "Who are the Champions?", February 10th, 2007

In the same survey, referring to *Fortune's* rankings of world companies, the British weekly wrote again: «Europe has for many years played a large part in global business. A table compiled by *Fortune* magazine shows that half the world's 30 leading companies by revenue are European. But in two key sectors Europe trails badly: high-tech (which mostly means IT) and life sciences».

In the same vein, we should start from the "Global 500" of the *Financial Times* (see table 4), a fact that immediately catches the eye at least partially contradicts the optimistic picture presented by McKinsey-*The Economist*. In fact, grouping the "Global 500" (classified according to their «market value») by region (EU/Euro area, US and JAP), we can see that the incidence of European top firms in this list is less than proportional to Europe's weight in the "triad" GDP. In other words, whereas the EU's share of this GDP is 44.3%, the share of European companies in the "Global 500" list is only 27.4%. This relation for the US is 42.4% and 44.2%, respectively, whereas for Japan it is 13.3% and 9.6%, respectively. If we focus on the Euro Area only, hence excluding the United Kingdom, Sweden and Denmark from the EU list, Europe's weight in the "Global 500" drops even further.

We arrive at this conclusion in the following way: according to ECB's data (*Statistical Pocket Book*, March 2007) the combined GDP value of the EU (11.0), the US (10.5) and Japan (3.3) is roughly Euro 24.8 trillion. If we take this value to equal an index of 100, then we know that the EU's proportion of it is roughly 44.3%, the US's 42.4%, whereas Japan's is 13.3%. On the other hand, the number of EU firms in the "Global 500" list is only 27.4%¹⁷, which is significantly lower than its proportion of the combined EU, US and Japan GDP value(see table 4).

¹⁷ We can take EU (+Euro area), US and Japan GDP to equal 100 and doing the same with the "FT" *Global 500* where we can subtract from the full list the non-EU, US and Japan companies which make up 18,6% of total by market value.

Obviously, these findings depend significantly on the parameter used by the *Financial Times* to compile its ranking, i.e. stock market capitalization (market value), which rewards the countries with the Anglo-Saxon variety of capitalism. Nevertheless, the values presented here do seem to show that there are margins for the growth of a more market-oriented variety of capitalism in Europe.

Table 4 – “FT Global 500”: a focus on Europe

		“FT Global 500” list*			GDP data†	
		N° of Company	Mkt Value (,000\$)	% of total (<i>mkt value</i>)	Value (Euro trillions)	% of region in the “triad” GDP
Europe	EU	139	6,945.0	27.4	11,0	44.3
	(Euro Area)	(89)	(3,734.0)	(16.6)	(8,0)	(32.3)
US		197	9,897.0	44.2	10,5	42.4
Japan		60	2,155.0	9.6	3,3	13.3

Source: *adapted from “Financial Times”; † adapted from ECB.

Continuing with the *Financial Times*, but passing from the country list to one of sectors, a clear picture of the present situation can be drawn by grouping the 37 single sectors – with a minimum discretionary margin– into some fundamental macro-categories at global level (see the following table). It is evident from the table that financial firms are most widespread in the “Global 500” list, followed closely by the high-tech sectors of ICT and Electronics, but also the Pharmaceuticals is in a good position; Oil, Gas and Electricity play a growing important role.

TABLE 5 – A FOCUS ON THE MAIN SECTORS

Macro-sectors	Sector	Number of companies	Market value \$m	% of total market value
Finance		114	5,272,805.20	23.5
	Banks	80	3,970,838.50	17.7
	Non-life insurance	20	854,592.60	3.8
	Life insurance	14	447,374.10	2
ICT & Electronics		89	4,292,345.80	19.1
	Hardware	23	1,259,890.50	5.6
	Fixed line TLC	18	911,769.10	4.1
	Mobile TLC	13	581,322.80	2.6
	Media	13	453,155.20	2
	Software	12	808,222.30	3.6
	Electronic equipment	10	277,985.90	1.2
Oil & Electricity		71	3,619,731.20	16.2
	Oil-Gas producers	37	2,518,334.80	11.2
	Electricity	21	618,891.70	2.8
	Multiutilities	8	304,478.50	1.4
	Oil equipment	5	178,026.20	0.8
Pharma & Healthcare		37	2,150,414.50	9.6
	Pharma-biotech	24	1,739,919.30	7.8
	Healthcare equipment	13	410,495.20	1.8
Automobiles & Parts		12	562,424.90	2.5

Aerospace & Defence		8	282,048.60	1.3
Chemicals		10	278,667.20	1.2

Source: author's elaboration on "FT" *Global 500*

At this point, it is advisable to make a more detailed comparison between the EU and the US, using their respective *Financial Times* "Top 500" rankings (see Appendix A). In doing so, we need to bear in mind the trends seen at the global level, in order to better understand the strengths and weaknesses of the European industrial structure, as seen – let us repeat this – from the point of view of its major players.

We can see that in the banking sector Europe is dominant both in terms of the number of big players (more than twice as much as in the US) and in terms of market value (almost twice as much as the US). This fact in itself is not surprising if we bear in mind the roots of the European model of capitalism are based in a strong banking sector. A greater balance between the EU and the US is evident in the number of big players in the insurance sector as a whole (life and nonlife).

As shown in the Appendix, the positions held by Europe in what we have called the "Oil & Electricity" macro-sector – also being characterised by a wave of *M&A* deals today – are excellent as well.

On the other hand, American leadership stands out in the "Pharmaceutical & Biotechnologies" sector, and is also extended to contiguous sectors (e.g., "Healthcare"), whereas positions are very similar in the more traditional "Chemicals" sector. The other macro-sector where the US is clearly dominant is the "ICT" one, considered in a broad sense through aggregations of a number of sectors. However, while American corporations prevail with regard to hardware, software and the media themselves, the situation is different in the telecommunications sector, where European operators are more significant both in the fixed line and in mobile telecommunications.

We conclude our quick comparison¹⁸ by looking at two quite significant manufacturing sectors – "Aerospace & Defence" and "Automobiles & parts" – and not only for historical reasons. With regard to the latter macro-sector, a clear European leadership emerges; in the former, the US prevails, although the performance of Europe's EADS, the Airbus's parent company, should not be overlooked.

Helping both Science and Business is possible and desirable. In this context – following G. Dosi *et al.* [2005] – to «re-discover the use of industrial policies as a device to foster a stronger, more innovative, European industry» is a suitable proposal, especially – the argument goes – «in order to strengthen the European presence in the most promising technological paradigms».

VII. ON THE METHOD: «EUROPEAN CHAMPIONS» OF «TYPE» I AND «TYPE II»

Helping both Science and Business is possible and desirable. In this context – following G. Dosi *et al.* [2005] – to «re-discover the use of industrial policies as a device to foster a stronger, more innovative, European industry» is a suitable proposal, especially – the argument goes – «in order to strengthen the European presence in the most promising technological paradigms».

Assuming that the development of «European Champions» is substantially desirable and of mutual benefit, there is still quite a significant issue in the background, which we may define as

¹⁸ Besides the exercise carried out by McKinsey (as reported in *The Economist*) and the one we carried out in this paper using *Financial Times* data, a number of other similar exercises could also be undertaken. As we mentioned earlier, the rankings of the main firms in the world are published by other authoritative media, such as *Business Week*, *Fortune*, *Forbes*, and by renowned think-tanks, such as, as far as Italy is concerned, Mediobanca's research arm ("Ricerche e Studi", R&S)

methodological. In the 1960s, when many European countries experienced the age of «National Champions», the economic context was quite different.

First of all, in many cases governments played a major role in the economy (extremely significant if we think of France and Italy) because many financial and industrial firms were state-owned. Secondly, in all of Continental Europe the stock exchange's role was not particularly significant in the allocation of resources. Although models of European capitalism have always appeared in various guises [Albert 1991; Hall and Soskice 2001], from a financial point of view they could all be termed «bank-oriented» (except, of course, for the UK). Thirdly, the borders of international competition were very different, played out then very much on the two sides of the Atlantic, whereas the extraordinary developments of Asia in recent decades (first Japan, then the «Four Tigers», now China and India, tomorrow who can tell...), can be termed global, to all intents and purposes.

The list of differences could continue at length, but the first two seem sufficient in this instance (we mentioned the third in the opening paragraphs). With regard to the first it should be said that privatization and, with some reserve, liberalizations took place throughout Europe in the 1990s. Entire industrial and financial sectors were dismissed from public to private hands, and many public utilities became competitive (TLC is the best case in point). With regard to the second, the growing role and importance – within certain limits connected to the process of privatization – of financial markets, (also in all European countries, but in different proportions). The combination brought about by these two facts excludes (or at least should exclude), by definition, the possibility of returning to the method that was popular during the season of the «National Champions», when the individual governments were those who decided the establishment of the latter by means of domestic assets which only they owned.

For each Member State, the EU as a whole has to become the natural landmark for tracing a new research policy. In the same way, companies must base their growth strategies on the Single Market, as it represents the ground on which they have to win the match. Actually, the Single Market still needs to be strengthened and completed by means of many Community efforts, particularly in the (wide) services sector, which amounts to 70% of EU's GDP [Sapir 2005].

Nevertheless, the great wave of cross-border mergers and acquisitions (M&A) during this year can certainly be considered as one of the possible engine for new industrial growth strategies. Compared to past waves – as «The Economist» points out – these M&A are not only consequences of financial transactions, but they are mainly connected to some specific industrial strategies (core-business investments, the entry into new international markets, etc.).

In order to protect a series of industrial sectors from attacks of big foreign industries, the French government pretends to define them as «strategic». We believe that this list of «strategic» industrial sectors is not a good solution, especially if it reflects a nationalistic position. Indeed, at least two risks should be considered. First, the risk of undermining the Single Market and the «four freedoms» of circulation on which the former is based. Then, such a position is too different from the (still French) approach to the new industrial policy, which was traced by the Group chaired by J-L Beffa [2005]. That document encouraged trans-national cooperation in some high-tech sectors, very close to those of the initial European Commission list [Prodi 2003]. On the contrary, thanks to its recent project of law, the French Government intends to protect from foreigners several national industrial sectors, some of which are high-tech. If the first way may lead to great chances for the European industry, the second one certainly does not. Unfortunately, other recent facts, in Spain, Italy and Germany, seem to strengthen a French-like position.

But that is only one aspect of the whole situation. In the EU, together with the already mentioned *ante-litteram* «European Champions» (Airbus and STMicroelectronics), there is another industry whose evolution seems to really play on the continental home market (i.e., the Single Market). The reference is to the banking sector, as the model aggregation between UniCredit and HVB – which followed, in 2005, the takeover by Banco de Santander of Abbey National – demonstrates (today, the mega deal is between Barclays Bank and ABN AMRO, with an unsolicited offer on the Amsterdam-based bank from Royal Bank of Scotland/Fortis/Santander).

The structure of several European industrial and service sectors may undergo many other transformations, both as a consequence of the enlargement of the EU Single Market and as the result

of the great M&A wave. In this general reshuffle, the path towards «European Champions» is possibly less deterministic than that towards the «National champions» of the post-WWII period, but hopefully more suited to modern times. As Dani Rodrik puts it in his famous essay «Industrial Policy for the Twenty-First Century», in the new system the task of industrial policies – or what he also calls «policies for economic restructuring» – is «as much about eliciting information from the private sector on significant externalities and their remedies as it is about implementing appropriate policies... It is a discovery process – one where firms and the government learn about underlying costs and opportunities and engage in strategic coordination» [Rodrik 2004].

The role of national governments and, as we could add today, of supranational institutions like the EU, is exercised above all in developing the best rules of the game in consultation with private actors: think of the three outstanding issues of (i) European takeover bids, (ii) Financial Services Action Plan (FSAP), (iii) Community patents.

There is still scope for promotion of the most extensive partnerships, especially for R&D and innovation through shared cutting-edge technology projects. Then, of course, there is a role that States could play directly – when they still have shareholdings in industrial and services companies – conferring to the «European Champion» the national asset, which thus becomes part of a whole. However, common rules of the game are indispensable for really European businesses if they are to find the best terrain for growing and breaking down narrow national boundaries. Pan-European research projects are vital, then, for reaching the critical mass that is able to generate inventions and innovations, which have always been upstream of new industrial applications. Will the rest follow, a little like Napoleon's Intendance?

At this time both industry and finance are on the move. The market's role in the creation of «European Champions» is, and must continue to be, extensive, although the States must also play an intelligent role at an European level. Such a role must, first of all, be played in the definition of rules (we have just mentioned some of the most sensitive issues) at supranational level. Secondly, in – as the «Sapir Report» recommended — «boosting investment in knowledge (education, research and development)» [Sapir 2003, ch. 11]. In particular:

- i) increasing substantially «government and EU spending for research and postgraduate education, but at the same time putting the main emphasis on excellence when allocating the new additional funds»;
- ii) creating an «independent Agency for Science and Research (EASR), functioning on the model of the US National Science Foundation (but also the Nordic and British research councils) [...] Like the NSF, the EASR should focus on financing bottom-up academic research».

All in all, the case is for combining the resources that each Member State dedicates to research and higher education undertaken at national level and it presses for an extensive revision of the Union's budget to upscale investments in knowledge and innovation. Only this way can the EU hope to reduce the R&D gap that currently separates Europe and the US. The «European Champions» would play a fundamental role in this context, in leading the research and industrial projects on a supranational scale.

We should label this case and way as the «European Champions of Type I», because these big European players are likely to develop when there is focused private-public partnership in R&D-intensive industries or when economies of scale and scope are relevant. We argued in the previous sections that the insight of the late Professor Alexis Jacquemin [1987] on the need to formulate «*a concerted European industrial policy that will help overcome industry strategies along national lines*» – originally formulated in the mid-1980s – has become topical again. Such an insight is even more valid today, in the enlarged Europe of 27 Member States that offers firms the opportunity to reorganise their activities on a pan-European basis.

In fact, what we have just labelled «Type I» does not tell the whole story: what comes to mind is the wave of mergers-and-acquisitions (*M&As*) seen over the last couple of year and the major role

being played by (big) European industrial and financial companies¹⁹. It follows that a second type of «European Champions» ought to be envisaged which includes those large companies whose driving engine of growth and excellence has been the Single Market. In other words, «European Champions of Type II» are firms which more often than not have resulted from cross-border *M&As*. Motivated by the need to improve their competitive position through external growth – and to thus withstand the pressures brought on by a widening and deepening Single Market – these firms epitomise the «trend toward Europeanisation» [Véron 2006].

I have made, in a recent paper, an attempt at definition which goes as follow [Mosconi 2007]: Those major companies that have been able to come to terms with the single European market, even enlarged to the countries of Eastern and Central Europe. And these are large companies resulting from cross-border mergers that make it past the scrutiny of the market. Following this line, I then added a third part that referred to the individual companies participating in the new and larger society, which in fact extended to the country as a whole: No matter how big it is, it can only contribute to the creation of «European Champions» of this sort: but it must do so from a position of leadership in the areas in which the valued parts of its industry and of its service sector are concentrated.

IX. CONCLUSION: THE INDUSTRIAL POLICY «TRIANGLE»

At first glance, from 1990 through to early 2000 – which at the beginning of this essay I called a period of «suspension» of the EU's industrial policy – there were certainly some extraordinary achievements in the Union: the 1992-programme for the completion of the Single Market; the convergence towards Maastricht criteria and the birth of the euro; the historic enlargement towards the East.

Nowadays, on closer inspection, it is possible to sense a change of attitude in a significant part of the European elites: a change that first touched upon the economic role of the State. Hence, there is a short step to an «Industrial Policy in an Enlarged Europe» – as the first Commission's Communication [European Commission 2002*b*] stated.

The prolonged economic crisis in Europe – which was already under way when the European Commission approved the Communication in December 2002 – and the rapidity of technological changes induced a general rethinking of the classic instruments for steering the economy. In fact, despite significant successes at the «institutional» level, the EU has not been growing and introducing technological innovations at the necessary level. In some countries – beginning with the largest ones, which are those with the lowest growth rates – the idea that attitudes of radical closure towards industrial policy were slowing down rather than fostering structural transformations, began to emerge. The European Commission, as mentioned already, welcomed this stimulus, taking the opportunity to sketch the EU's new industrial policy.

Whereas at the height of the 1990s there was a general consensus about the capability of market forces to themselves find the most suitable answer to the growth problem, in recent years a new consensus has emerged, advocating renewed efforts to promote the strategic interaction between the public and the private sphere of the economy, between the State and the Market. To voice the issue in other terms, the last decade was one of outdated industrial policy, while this decade is targeting for a re-launch, although the form differs from that of the past.

¹⁹ Without going back over all the crucial events, we arrive at the end of 2006 and *The Economist* [2007] gives us a snapshot of what happened in a year that broke all records in M&A: the value of published operations reached the peak of 4 trillion dollars. Once again, as previously at the end of the first quarter of 2006, Europe as principal player is highlighted; the combined value of «European targets» totals approximately 1.6 trillion dollars – the most ever recorded – a figure that is slightly higher than the value of M&A operations that targeted American companies. Great Britain, Spain, France, Germany and Italy – to mention just the first five countries – stood out, even in different degrees, for the number of deals (from almost 2,500 in Great Britain to about 600 in Italy) as well as for the equivalent value (Great Britain is still the major contributor to Europe's excellent performance with over 300 billion dollars, but even the other big countries recorded between 100 and 200 billion in M&A deals).

Certainly there may be a rediscovery of the economic role of the State on the condition, we might add, that the privatizations and liberalizations of the 1990s are not to be considered accidents of history; the single market a useless device; competition policy and state aid regulations an annoying interference from «Brussels's bureaucrats», and so on.

An extensive report by the Conseil d'Analyse Économique (CAE), set up by the French Prime Minister's Office [Cohen and Lorenzi 2000], noted how – in European tradition – industrial policy was the result of a triangle formed by (1) «Competition policy», (2) «Commercial policy» and (3) «Technology policy». In fact, competition policy is leading to the so-called *level playing field* where firms may meet and compete on equal footing. For its part, Europe's commercial policy for international trade must continue to contribute to a growing openness of world economy and inclusion of new players, thus overcoming closure that is damaging chiefly for developing countries.

As we already know, both for the internal market (liberalization of public utilities as well as effective opening of other services) and for trade liberalization (barriers still existing in common agricultural policy), there is much to be done and barriers to demolish if a level playing field is really to be created. In general we can state that we cannot backtrack from what has been achieved: in other words, neither we can return to fragmentation of the single European market by building new barriers (or leaving in place those still in existence), nor we can return to protectionism, however the latter may be disguised. Moreover, the Union cannot return to a competition policy that is more acquiescent towards firms and States.²⁰

Here we open an important page regarding the relationship that Europe has historically developed between industrial policy and competition policy.²¹ In Giuliano Amato's words: «The starting point is competition policy, as European policy for building an integrated market, which is a legal and conceptual counter position to industrial policy as a national policy for creating and defending national industry. There was a phase when the two policies cohabited, mainly due to the temporary Europeanization of the latter, then in the 1980s competition policy, an integration tool, clearly prevailed» [Amato 2005].

Let us return to our core issue: how to envisage new policies for the competitiveness of European industry, over the years of new technological revolutions (ICT, of course, but also biotechnologies and life sciences), and growing extension of international markets on which to compete (with the «Asian miracle» that occurred when coping with an «enlarged Europe»). Policies that here in Europe, now more than in the past, call into play R&D investment, innovation, human capital. In a word: the third side of the above mentioned «triangle».

A suitable conclusion should be – to our mind – that the new industrial policy we are beginning to glimpse in the EU must lean to a definite reinforcement of the triangle's third side («technology policy»), without weakening the other two («competition» and «commercial» policies).

The «European Champions» should reveal to be essential means to reach that balance, as they are the result of an authentic supranational cooperation, which may develop in University research laboratories, but not only there. For instance, let us think of the great importance that a real network of «Centres of excellence» co-financed by the EU would assume, considering the increase of funds for research and innovation proposed by the Lisbon Agenda. The supranational cooperation is also encouraged by economic strategies which take the Single Market as their natural point of reference: from this point of view, the present M&A wave involving European firms must be carefully considered, if not as the only chance, certainly as a great opportunity, which cannot be missed.

²⁰ It is quite significant that the Commission's third Communication on the new industrial policy [COM(2004)274], issued on 20 April 2004, was flanked with another, connected Communication [European Commission 2004c], by the title: «A proactive competition policy for a competitive Europe» [COM(2004)293]. It underlines how «the existence of efficient competition in the EU's internal market contributes in a decisive manner to the competitiveness of European industry since it promotes improvement of productivity and innovation».

²¹ The relationship is the core of Giuliano Amato's «Jean Monnet Lecture», delivered at the University of Parma on 26 April 2004, and now published as chapter 2 in F. Mosconi [2005b].

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APPENDIX A
“FINANCIAL TIMES GLOBAL 500”
EU 500 AND US 500 (MARKET VALUE)

Main Sectors (alphabetical order)	EU500		US 500	
	N° of Co.	Mkt Value	N° of Co.	Mkt Value
<i>Aerospace</i>	7	109,466.30	10	257,530.10
<i>Automobiles & parts</i>	11	225,250.90	5	62,764.40
<i>Banks</i>	75	2,093,251.90	32	1,220,272.50
<i>Chemicals</i>	14	196,055.20	10	176,768.20
<i>Electricity</i>	21	406,828.50	23	316,433.80
<i>Electronic and electrical equipment</i>	3	133,575.60	7	98,697.20
<i>Fixed line telecommunications</i>	18	426,845.50	6	294,343.30
<i>Gas, water & multiutilities</i>	14	321,706.80	6	65,850.80
<i>Healthcare equipment & services</i>	8	62,772.70	28	554,011.70
<i>Industrial engineering</i>	14	131,796.80	7	136,364.00
<i>Industrial transportation</i>	13	180,662.70	8	194,581.80
<i>Life insurance</i>	13	268,161.20	9	144,966.70
<i>Media</i>	30	267,426.80	22	464,162.30
<i>Mobile telecommunications</i>	8	218,191.20	4	113,646.20
<i>Nonlife insurance</i>	17	369,131.90	22	584,569.20
<i>Oil & gas producers</i>	21	1,290,193.10	21	907,134.60
<i>Oil equipment & services</i>	3	21,772.40	18	313,671.80
<i>Pharmaceuticals & biotechnology</i>	15	726,145.80	20	1,019,535.80
<i>Software & computer services</i>	9	117,309.00	17	738,709.80
<i>Technology hardware & equipment</i>	8	217,168.20	42	1,087,585.80

Source: author's elaboration on “FT” data