

The Nature and Functioning of European Capitalism: A Historical and Comparative Perspective

by

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I

Introduction

This paper analyses how European capitalist economies have performed in the past, and examines the forces which have shaped their development. It does this in historical perspective, looking back over the five main phases of the modern capitalist era since 1820, and contrasts their experience with that of the United States and Eastern Europe.

Western Europe is the homeland of modern capitalism and can look back on centuries of economic progress. The 12 core countries had over four hundred years of modest (an average of about 0.2 per cent per annum) growth in income per head in the protocapitalist period before 1820. After 1820 the pace accelerated. From 1820 to 1870, GDP per capita rose by about 0.9 per cent a year, and twice as fast from 1870 to 1996. Their average income has risen about 15-fold since 1820. The 12 core countries produce nearly a fifth of world GDP, and have about five and half per cent of world population. Their total GDP in 1996 - 5.7 trillion dollars¹ - was 87 per cent of that of the USA, per capita income 74 per cent, and labour productivity 86 per cent.

The four peripheral countries - Greece, Ireland, Portugal and Spain made slower progress before 1950. Their average per capita income was then well under half of that in the core. In the past half century, their trade and political links with the core have been much closer, their

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¹ The dollar figures in this paper are benchmarked on 1990, with conversion of national currencies by purchasing power parities rather than exchange rates. These multilateral (Geary Khamis) converters are fully explained in Maddison 1995a, Appendix C. They give a more reliable indicator of the relative standing of countries than do exchange rate converters. In 1995, when the US dollar was at a postwar low, all of the core countries except Italy and the UK had very much higher per capita incomes with currencies converted at exchange rates rather than by the purchasing power converters. The average upvaluation was 36 per cent. The extreme case was Switzerland - higher by over 90 per cent; in Denmark and Germany it was over half. In Ireland and Spain, the PPPs were very similar to the exchange rates, and in Greece and Portugal real income was significantly higher with the PPP than with the exchange rate conversion. In 1985, by contrast, when the dollar was at its peak, the exchange rate valuation for the 12 core countries averaged 22 per cent below the PPP valuation, and the only case where the exchange valuation was then higher was Switzerland. All the periphery countries had an exchange valuation below the PPP valuation, with an average shortfall of 47 per cent.

growth has been faster, and their average income in 1996 was over 70 per cent of that of the core countries.

The six East European countries in our sample had an average income level in 1950 which was similar to that in the European periphery, but after several decades as command economies and seven arduous years of 'transition' to capitalism their average 1996 GDP per capita was just over a third of that in the periphery and a quarter of that in the core.

In the past decade or so, the European capitalist countries have had sharp rises in unemployment to levels well above those in the 1930s, and this is a clear indicator that their performance is below potential, but the situation is much worse in Eastern Europe where per capita output in 1996 averaged one fifth below the 1985 level.

In considering the experience of European countries, it is essential to keep American performance in mind. The USA (like Canada, Australia and New Zealand) inherited and adapted institutional arrangements, societal habits and language from what was then the most economically advanced of European nations, but its trajectory has been much more dynamic. In 1820, its economy was about a third the size of the UK. In 1996, it was almost as big as that of all the 16 European capitalist economies combined. An important part of the growth differential was demographic. US population rose 27 fold, that of capitalist Europe threefold from 1820 to 1996, but US per capita income and productivity also rose somewhat faster than in the advanced European countries. The USA overtook the UK as the productivity leader around 1890 and has since operated nearer to the technical frontier than all of the European countries. The productivity gap was particularly wide in the 1950s, after two world wars and other vicissitudes which held Europe back. Since then the core and peripheral countries of Europe have achieved significant catch-up which is still continuing.

The US economy is now operating near full potential, with a rate of unemployment less than half the average for the 16 West European countries, whereas in 1950-73, its unemployment rate was usually double that of Western Europe. American employment expanded from 41 per cent of population in 1973 to 48 per cent in 1996 compared with a fairly steady average of 42 per cent for the 16 European countries. This has been achieved with a rate of inflation which has generally been slightly below that of the European core, and much lower than the European periphery.

The most striking thing about US performance since 1973 has been the marked slowdown in the growth of labour and total factor productivity. The pace of advance has been slower than at any time since 1870. There have been various attempts to explain why this has happened, but it probably reflects a serious slowdown in progress at the technical frontier, which will have important world-wide implications if it endures. One cannot predict how long this slowdown

will last, but I do not think is an artifact of mismeasurement, as some have concluded from the Boskin (1996) report.²

The second part of this paper outlines some distinctive features of European capitalism which have influenced its performance. The third deals with changes in Western policy and performance from 1820 to 1973. The fourth analyses in more detail the latest phase of development from 1973 to 1996. The fifth assesses recent developments in Eastern Europe, and the sixth draws some conclusions about the major policy problems the capitalist countries face. The appendix to this paper contains an array of comparative quantitative indicators for the sixteen European capitalist nations, for 6 East European countries, for the USA and Japan.

² Boskin et al. (1996) concluded that the US cost of living index exaggerates price increases because it deals with a fixed basket of goods changed at rather lengthy intervals. They recommended replacement by an index in which the weights change every year in order to allow for the fact (a) that consumers can switch their pattern of consumption to cheaper goods when relative prices change; (b) that they can switch to cut-price retail outlets. They suggest that such a change in the technique of index construction might have led to a .5 per cent a year reduction in price inflation over recent years compared with the existing index. However, they base their figure on illustrative material and inference and it remains to be seen whether their estimate is realistic. They also suggest that the existing index measures quality changes 'inaccurately or not-at-all'. They suggest that if quality changes had been properly measured, price increases would have been lowered by .6 per cent a year. This part of their report is highly questionable because they virtually ignore the fact that the existing index does make substantial allowance for quality change, and they assume that quality change has always been positive. They suggest that the Bureau of Labor Statistics, which prepares the index, should incorporate new items like mobile phones at an earlier stage when their prices are higher, so that the index will incorporate more of their subsequent price fall. If this were done, it would bring US practice closer to that in the USSR, whose indices came in for severe criticism from Bergson and Gerschenkron for doing what the Boskin committee recommends. It seems likely that the Boskin committee is right to suggest that there is upward bias in the index because of its fixed weights, but the degree of bias seems likely to be more modest than they suggest. The US GDP deflator and its consumer component rose by less than the consumer price index in the period 1973-96 - rising by 5.07 per cent and 5.37 per cent a year respectively compared with 5.54 per cent for the consumer price index. The GDP deflator and its consumption component are now calculated by a chain-linked procedure, where the weights change every year. The existing consumer price index is politically important as it is used by the government to adjust pensions and income tax brackets. The Boskin report (to the US Congress) suggested that a new index on the lines it proposed could cut public spending by more than a trillion dollars over 1997-2008.

II

Distinctive Features of European Capitalism

West European countries have had a very long history of economic growth during which they developed an institutional basis favourable to technical progress, accumulation of physical and human capital, and relatively efficient allocation of resources. Much earlier than the rest of the world they created legal protection for property rights, ensured that contracts were enforceable, and minimised the influence of corrupt politicians, bureaucrats and criminals. They let private individuals and corporations make production decisions in the light of market forces, and allowed consumers reasonable freedom of choice. They developed techniques of corporate and financial organisation which tended to capture and promote the potential offered by technical progress. This is a somewhat idealized, generic description of these countries but it is a valid representation of the respects in which their situation differed from that in the command economies of Eastern Europe.

The European family pattern has been different from that in most other parts of the world. Smaller family size favoured investment in human capital and enhanced capacity to finance investment in physical capital. Fertility rates were lower than elsewhere, and dropped as mortality dropped. Since 1973 population has grown by only 0.3 per cent a year in the core and 0.6 per cent in the European periphery.

The advanced capitalist economies of Europe have had a high degree of interactivity. By comparison with most of the world they have had a long-standing openness to international trade, and in spite of having different languages, have had a relatively free traffic in ideas, though migration of labour and capital has until recently been quite limited. Openness to trade has brought gains in efficiency through specialisation, has enhanced the role of competitive market forces, and added to economic dynamism by providing ready access to new products and processes. In the nineteenth century, the Netherlands and the UK were committed to free trade, and the others were only mildly protectionist. There was a major setback from 1929 to 1950 when policies moved closer to the autarkic prescriptions of Hjalmar Schacht than to those of Adam Smith. After 1950, trade in goods expanded hugely as policy was liberalised. By 1996, the average export ratio in the core and periphery countries was about 30 per cent of GDP, compared with 16 and 9 per cent respectively in 1950 (see Table 13). However, these current price ratios are misleading, because export prices have risen a good deal less than the GDP deflators. If we measure the importance of trade in 1990 prices its relative role has grown a good deal faster. Table 13 shows a nearly fourfold proportionate increase in the role of trade in the core countries since 1950 and a more than sixfold increase in the periphery. Trade expansion has been a major element in the postwar acceleration of European productivity and the process of catch up with the United States.

There are of course black spots. The complex and costly apparatus of protection involved in farm policy has pampered and protected farmers, reduced farm efficiency and consumer welfare (see Table 20). Restrictions on competition in services such as telecommunications, transport and banking have had a similar effect.

The most fundamental characteristic of Western Europe which favoured development was the recognition of human capacity to transform the forces of nature through rational investigation and experiment. Thanks to the Renaissance and the Enlightenment, Western elites gradually abandoned superstition, magic, and submission to religious authority. The Western scientific tradition that underlies the modern approach to technical change and innovation had clearly emerged by the seventeenth century and began to impregnate the educational system. Circumscribed horizons were abandoned and the quest for change and improvement was unleashed.

The immediate pay-off from this change was rather meagre. Most innovation in the protocapitalist period came from practical experience and learning by doing. However, the potential for accelerating technical progress through application of the experimental approach was substantially augmented in the nineteenth century. The gradual infiltration of the scientific approach into education systems facilitated the absorption and adaptation of technical change.

In the course of the nineteenth century the main locus of technical progress moved from Europe to the USA. Since the 1890s, the USA has clearly been the lead country. From 1913-73 US performance was much faster than the UK had achieved in the nineteenth century (as measured by its rate of growth of total factor productivity). This acceleration was achieved by a massive and systematic R & D effort by corporations and government and was helped by unusual economies of scale in production of new standardised products. From 1913 to 1950, European policy and circumstance were not propitious for exploiting the opportunities of this new American technology, and a very substantial productivity gap emerged between Western Europe and the USA. Since 1950 there has been a very impressive process of European catch-up. The technological gap is now much smaller than in 1950, and Europe operates much nearer to the productivity frontier (see Table 6). In terms of labour productivity the leading European countries are Belgium, France, the Netherlands and Norway. Germany is popularly supposed to be the star performer, but it was never the European leader. Now that it has absorbed East Germany, its productivity standing is virtually the same as that of Ireland.

Over time the production structure of these countries has changed dramatically (see Table 4). In 1870 half the employed population of the core countries was employed in agriculture and about a quarter in industry and services respectively. The agricultural share has fallen dramatically and is now less than 5 per cent. The service share has risen to over two thirds. The industrial share was at a peak of around 38 per cent in 1950-73 but has now fallen back very

substantially and is not very different from what it was in 1870. Similar tendencies operated in the capitalist periphery, with some delay. In 1950 these countries had an employment structure similar to that in the core countries in 1870. Now they have converged much closer to the richer countries. Their lead sector is services, with a falling industrial share and little more than a tenth of the labour force in agriculture.

The governments of European capitalist countries are big spenders. In the twentieth century social transfers have grown explosively and government consumption of goods and services has risen significantly because of increased commitments for health and education. A substantial part of the expansion occurred in the inter-war period, but between 1950 and 1996 (as can be seen in Table 5), government spending grew from about 30 to nearly 50 per cent of GDP. The proportion varies from 67 per cent in Sweden to 39 per cent in Ireland (see Table 6). Transfer payments average 24 per cent of GDP in the core countries, and 17 per cent in the periphery. The highest transfers are in the Netherlands and the lowest in Portugal and the UK, but in most European capitalist countries transfers are much more important than in the USA and Japan.

In the nineteenth century the classical economists (Ricardo, Malthus and J.S. Mill) felt that poverty relief would reduce incentives to work and save, and would encourage excessive population growth. Such views were generally accepted until the 1880s when Marshall and Sidgwick began to take a brighter view of welfare possibilities. Bismarck was the politician who pushed capitalism in a new direction. As the architect of German unification, he felt a need to consolidate his new creation and offset the social tensions which might arise from what was then the world's best organised socialist movement. This motive of system-legitimation became stronger in the interwar period with the creation of a competing social system in the USSR. After 1948, the cold war reinforced this motivation. Ludwig Erhard, the architect of Germany recovery, was a steadfast believer in market forces, but wanted capitalism to have a human face. In this respect, the attitudes of the European policy establishment were different from that in the USA, where socialist ideas had little influence, labour movements were weaker, and there was no apparent challenge to the capitalist order. In reformist socialist circles in Europe, the motive for supporting the welfare state was 'system-modification'. Fabian socialists saw the possibility of transforming the nature of capitalist society by expanding rights to vote, promoting income redistribution and public ownership. Over time there was pressure from a wide variety of populist politicians to transfer incomes on a much bigger scale to meet the claims of the different pressure groups they represented (see Maddison, 1984, for a more elaborate analysis).

The hard core of social security is provision of pensions. In 1994, 15.4 per cent of the population of the core countries was 65 years old or more, compared to 5.5 per cent in 1870. Virtually all of these are now covered by state schemes which provide at least a minimum welfare cushion, are nearly all fully indexed against inflation and in many cases related to previous earnings. Moreover, the age of retirement has dropped, as governments in the past two

decades (particularly in France and the Netherlands) felt that reduction in labour supply was a way of mitigating unemployment. Early retirement provisions and generous interpretations of what constitutes 'handicapped' status led to sizeable exits from the labour market well before the age of 65. In 1994 the male labour force was only 80.4 per cent of the population aged 15 to 64, whereas in the 1950s, the proportion was near to 95 per cent.

Apart from pensions, there are substantial transfer payments for family allowances, sickness and unemployment compensation, and assistance grants outside the orbit of social insurance.

Social transfers enjoy widespread political support as the beneficiaries are so numerous. They have also achieved Bismarck's initial objective, as capitalism is now not under serious challenge from socialist parties as it was in the past. The welfare state has added to the stability of the European economies by sustaining incomes in time of recession, and it has added greatly to the lifetime economic security of individuals. On the whole there is less poverty and less criminality in West European countries than there is in the USA, and this is due in substantial part to the availability of social security. Furthermore, the growth of the tax burden which is needed to finance government spending has not so far had the effect Colin Clark (1945) expected. He predicted that tax levies beyond a threshold of 25 per cent would end the capitalist accumulation process.

It is, however, paradoxical that state provision should have increased so much in economies where productivity and income from work have risen so much. There is a good deal of 'churning' in these systems. Heavy taxes and social security levies are collected by one part of the state bureaucracy, and handed back at some cost, often to the same people, by other bureaucrats. There is a substantial redistributive effect³, but all sorts of inequities, notches, and poverty traps are embedded in social security schemes. There is a strong case for targeting benefits more carefully to those who are in need, and for stimulating a bigger switch from social insurance to private pension schemes. Benefits may also induce dependency. The availability of child, housing, and supplementary income benefits has undoubtedly played a role in the growing incidence of single parenthood. The availability of benefits designed to alleviate European poverty attracts immigrants from even poorer countries. When social transfers are financed by

³ A recent OECD report (Atkinson, Rainwater and Smeeding, 1995, p.40) shows that in eleven core countries in the mid 1980s, the average ratio of disposable income per equivalent adult (after tax and transfers) in the top decile was three times that in the bottom decile compared with a ratio of nearly 6 in the USA. The most unequal core incomes were in Italy, the UK and France. In Ireland inequality was greater than in Italy. The survey also analysed changes in income distribution over time for periods of different lengths. For the UK the trend to greater inequality between 1978 and 1990 was very marked as a result of the Thatcher programme. There was a milder increase in Norway and the Netherlands. There was a significant decline in inequality in Finland and Italy, and a milder decline in France and Germany.

payroll levies, these deter entrepreneurs from hiring new workers; this tendency is reinforced where dismissal of redundant workers is rendered costly by job protection guarantees.

One must be careful not to exaggerate the impact that the welfare state has had in inducing dependency. In the past four decades there has been a decline in family size and an increase in temporary or part time job opportunities. The activity rate for women in the core countries has risen from about 40 per cent of the female working age population in 1950 to over 63 per cent in 1994. The gender breakdown of the labour force has become much more equal, and has increased the proportion of couples with two earners. This has compensated for the decline in male activity in the core countries. In the periphery male activity has fallen more than in the core, and female activity has risen much less.

Within the European capitalist countries there are large variations in the role of the state in the production process. Many governments still own, control, or subsidise important public enterprises. This is the case in France with its old Colbertist tradition, its postwar emphasis on planning, and a political class strongly infiltrated by the bureaucratic elite. Mitterrand doubled the already important public sector by far-reaching nationalisation of armaments, banking, chemicals, computers, electrical equipment, insurance and aircraft construction. Some of this was reversed when Chirac and Balladur were prime ministers, but government remains an important minority shareholder in enterprises which have been privatised, and there is still a large state enterprise sector. Railways, airlines, airports, ports, buses, gas, electricity, atomic energy, telecommunications, aircraft engines (SNECMA), electronics (Thomson CSF), some insurance, banking and armaments are still public. In the past, some of these enterprises worked very efficiently but the influence of militant trade unions and of elite networking allowed some enterprises to pile up huge losses, e.g. Air France and Credit Lyonnais.

At the other extreme, in the UK, the Thatcher government dismantled and deregulated drastically. Its actions included deregulation of financial markets; abolition of exchange controls; legal reduction of trade union powers; direct action to break union power in the miners' strike of 1984; increased freedom for entrepreneurs to hire and fire workers; massive reduction in the incidence of income tax on higher incomes; the sale of a large proportion of public housing; and a sweeping programme to privatise public enterprise in telecommunications, air and rail transport, coal and steel, production and distribution of gas, electricity and water.

In some countries, such as Austria, Italy and Spain, the public sector seems to be bigger than it is in France. In the Netherlands it is a good deal smaller. Privatisation is now generally given favourable consideration, partly because it is expected to increase economic efficiency, but also because asset sales can provide a significant flow of revenue in times of fiscal stringency. It therefore seems likely that there will be a gradual reduction in the role of

government enterprise over the long term, but it will probably not proceed at the same pace, or go as far as it has in the UK.

The impact of the Thatcher programme has been to redress some long-standing problems and make the UK function more like the US economy. It has clearly increased the efficiency of important industries, the labour market has been made more flexible, incentives to enterprise and competition have been increased by changes in the tax structure and deregulation. British productivity growth is now slightly above the average in the core countries, and has decelerated less than that of the other countries since 1973. However, French labour productivity has in the past grown faster than that of the UK, and it stands at a higher level. One cannot draw the conclusion that a full-scale Thatcherite revolution is a sine qua non of successful capitalist performance, but it is now widely understood that a substantial dose of this medicine is good for the health of an economy.

Since the second world war there has been close international cooperation in Western Europe. This contrasts sharply with the interwar period when the BIS (Bank for International Settlements) was the only vehicle for intercountry consultation. There were sharp conflicts over war debts and reparations in the 1920s, beggar-your-neighbour trade and payments actions in the 1930s.

European postwar cooperation was sparked by generous US aid in the Marshall Plan programme of 1948-52, which was given on condition that European countries reduce their trade barriers, and liberalise their payments systems. The motives for West European cooperation were strengthened by the Soviet takeover in Eastern Europe, and the mutual hostility between the two blocs during the cold war. The military aspect of this cooperation was NATO (created in 1949) as a transatlantic defence alliance. European economic cooperation also had a transatlantic character. The OEEC (Organisation for European Economic Cooperation), created in 1948, included 16 European countries with the USA and Canada as associate members, and in 1961 it became the OECD (Organisation for European Cooperation and Development) in which the USA and Canada were full members and which also included Japan. A major function of OECD was the articulate discussion of economic policy issues by high officials from Finance Ministries and Central Banks. These organisations not only helped to ensure freedom of trade and payments but prevented the hostile policies that characterised the interwar years.

In addition to the OEEC/OECD arrangements, there was closer integration between six countries (France, Germany, Benelux and Italy) in the European Coal and Steel Community. This was orchestrated by Jean Monnet, who felt that closer economic links between France and Germany were a fundamental prerequisite for future peace. The Monnet agenda involved expanding this type of cooperation across a wider spectrum of economic issues, and the EEC (European Economic Community) was created in 1958 as a customs union by the same six

countries. The UK had never shown serious interest in this project, and did not really expect it to get off the ground. However, once the EEC was created, the UK and other non-members, fearing trade discrimination, created EFTA (the European Free Trade Area) to reinforce their bargaining power with the six. In fact the two organisations were successful in reaching a mutual accommodation to avoid trade discrimination.

By the time the EEC was created, de Gaulle had returned to power in France. His ideas were quite different to those of Monnet. He did not want European cooperation to infringe national sovereignty, but saw the usefulness of the EEC as a vehicle for cooperation free from transatlantic or anglo-saxon contamination. The General twice vetoed British entry to the EEC (in 1963 and 1967) and he also left the NATO integrated military command in 1966. After his death, in 1973, the UK was admitted to EEC together with Denmark and Ireland and left EFTA (which continued as a rump organisation - with Austria, Norway, Sweden and Switzerland as members). Greece was admitted to the EEC in 1981; Spain and Portugal in 1986; in 1990 East Germany was incorporated in the Federal Republic and into the EC; Austria, Finland and Sweden in 1995. In 1987, the Single European Act changed the EEC into the EC (European Community) reflecting the broader federalist conception of its functions which was held by Commission President Delors. There was a further move in this direction in 1993 when ratification of the Maastricht Treaty converted the EC into the EU (European Union).

It is useful to summarise the impact of EEC-EC-EU on the growth performance and functioning of European capitalism:

- (i) The customs union contributed a great deal to reduction of trade barriers and this was important in improving resource allocation, competition and consumer satisfaction. All customs unions are trade diverting as well as trade creating because they discriminate in favour of other members and against the outside world. However, the demolition of European trade barriers was accompanied by and created momentum for multilateral worldwide reduction of trade barriers in successive GATT rounds. As a result the external barriers of the Union were low and the net impact of the EU was certainly trade creating. The main exception was agriculture where the impact was trade diverting. Farm transfers cost 1.8 per cent of EU GDP in 1993. However, as can be seen in Table 20, EU countries are not alone in pampering farmers.
- (ii) The single market programme which became effective in January 1993 was supposed to broaden the scope for trade to all sectors of the economy, but its main impact was to eliminate remaining controls on capital movements (which Germany had abolished in 1958 and the UK in 1979). France and the other core countries did this in July 1990. Ireland, Spain and Portugal followed in 1992, and Greece in May 1994. Capital liberalisation had its greatest positive effect on resource allocation in British capital markets, but it also had

negative effects in increasing the scope for speculative movements. The creation of a customs union was itself more important than the abolition of capital controls in stimulating the most useful inflows of foreign long-term investment. The scale of American direct investment in Europe was much bigger than it would have been without the Union, and this is also true of Japanese investment (particularly in the UK). This US and Japanese investment was significant in promoting the transfer of technology. In the service sector, the single market programme has so far been relatively ineffective. About two thirds of core country GDP is derived from services, but service exports are less than 12 per cent of service output, whereas commodity exports are about 80 per cent of value added in the commodity sector. Substantial trade barriers remain in areas like telecommunications and air transport. Pressure for liberalisation in services has come more strongly from the newly established WTO (World Trade Organisation - the successor to GATT) than from the European Commission.

- (iii) The inclusion of the periphery in the process of European economic integration is in large measure responsible for its accelerated growth and significant catch-up in terms of income and productivity. The financial support they have received under structural and harmonisation programmes has also helped - most spectacularly in Ireland. Integration was important in the process of democratisation in Greece, Portugal and Spain when the military and fascist dictatorships ended.

- (iv) After the collapse of the Bretton Woods fixed exchange rate system, the European economy was plagued by currency instability which contributed to inflationary pressure and made governments very reluctant to use expansionary policies to combat unemployment. EU initiatives to create a zone of exchange rate stability in the EMS contributed to ease this problem, and by doing so, facilitated the growth process. However, a much more ambitious goal of monetary union was adopted in the 1990s. This pushed economic policy in a much more deflationary direction and is a major reason for the slowdown in growth and the rise in unemployment. It is not easy to predict what will happen if monetary union is established. It would involve a major change in the policy regime with asymmetric costs and benefits for different member countries. The risks are high in an economic grouping that has only the vestiges of a federal state. When East and West Germany were rejoined in 1990, their union was capped by adoption of a single currency. This union was a political imperative, but the rate of exchange was so favourable for the East that it created massive social problems. These were mitigated by huge social transfers from West to East. The West Germans were able to bear the cost of these, and to service East German government debt. There is also a fair degree of labour mobility between East and West Germany. None of these cushions is available if EMU fails to promote fuller employment. Mobility of labour within different countries of the EU is quite small because of language barriers and incompatibility of pension and social security

regimes, and the EU itself has negligible leverage over social expenditure or the fiscal revenues of its member countries.

- (v) A final point is the puzzling attitude of EU to the huge political changes in Eastern Europe. The original political motive for Western integration was to strengthen the long term prospects for peace by binding nations more closely together. At the time of the Cold War this integration was necessarily confined to the Western countries, but the situation changed completely in 1990. The East European countries regained their political freedom to cooperate with the West, the Warsaw Pact was completely dismantled, Russian forces completely withdrawn from Eastern Europe, Belarus and the Ukraine, and NATO is being expanded to include Poland, Hungary and the Czech Republic. The OECD has expanded to include Poland, Hungary and the Czech Republic. But the EU, instead of welcoming the East European countries as members, has been obsessed with closer integration within the West. Monetary union will make it more difficult to welcome the East European countries to the capitalist fold. Their accession has been treated as a matter of little urgency and the amount of financial aid has been very modest. In 1991-4, the EU spent \$1.1 billion a year on aid to Eastern Europe. In addition there were bilateral programmes, but the total was meagre, compared to the \$41.7 billion a year going to West European farmers, and \$22.6 billion a year in structural subsidies to areas of Western Europe which are much more prosperous than the East. Trade has expanded rapidly with Eastern Europe, but there are still 'sensitive' areas like agriculture, steel, textiles and chemicals where the opportunities are restricted. Closer integration with the East will require restructuring of the EU budget and voting rights (see Tables 20 and 21). This obviously implies some tight-fisted bargaining, but this is a venture where the economic, political and security benefits are likely to be far greater than the costs (see Baldwin, Francois and Portes, 1997).

III

Phases of Development and Fashions in Policy, 1820-1973

Within the capitalist epoch, the momentum of growth has varied considerably, and so have fashions in economic policy. One can distinguish five major phases since 1820. Our main interest is in the last phase from 1973, but it is worth saying something about the others in order to get some sense of perspective.

From 1820 to 1870 all the core countries had very substantial growth by all previous standards. The average pace was four times as fast as in the eighteenth century. The earlier notion that there was a staggered succession of take-offs in this group is not correct. The lead country, the UK, exercised a diffusionist influence through its policies of free trade.

The second distinctive phase, from 1870 to 1913, was one of faster technical progress and quickened per capita income growth. There were no major armed conflicts or great differences in economic regime. Virtually all the countries adopted the gold standard. There was international mobility of labour with large migration from Europe, and large export of capital to the rest of the world. At that time capitalist countries felt that their power and income would be advanced by colonial possessions. There was competition for power in Africa and in Central Asia - which to some extent operated as a safety valve for conflicts which might otherwise have occurred within Europe. At this time governments did not feel the need for activist policies to promote growth. They assumed that the free operation of market forces in conditions of monetary and financial stability would automatically lead to something like an optimal allocation of resources. There was limited suffrage, trade unions were weak, and wages were flexible. Low taxes and free labour markets were felt to be the best stimulus to investment. Domestic policy was generally inspired by principles of fiscal responsibility and sound money. There was no net change in the general price level from 1870 to 1913, prices fell to the 1890s, and rose somewhat thereafter. Taxes and government expenditure were low and generally in balance; spending was mainly confined to provision for domestic order and national defence. Social spending was small, generally covering only elementary education and preventive health measures. There were no international organisations like the OECD, IMF, BIS and GATT to manage a 'world system'.

Performance in 1870-1913 was probably close to potential. At that time, technical progress was not as fast as it was later to become, and Europe was exporting its surplus capital and labour mainly to areas of recent settlement where natural resource endowments were greater.

The two phases which followed were very different. In 1913-50, the European economies were deeply disturbed by wars, depression, beggar-your-neighbour policies, and the strains of adjusting to the cold war. It was a bleak age whose potential for accelerated growth was frustrated by a series of disasters. By contrast, 1950-73 was a golden age in which a backlog of missed opportunities was successfully exploited. The 60 years from 1913 to 1973 were abnormal. In some ways experience in 1870-1913 is more relevant in assessing the adequacy of performance since 1973. The latest phase is closer in respect of per capita income growth and policy aspirations than to the bleak age or golden age.

The years 1950-73 were a golden age of unparalleled prosperity. Per capita income rose by 3.8 per cent a year in the core countries and 5.2 per cent in the European periphery. GDP per man hour rose by 4.7 and 5.8 per cent respectively. There was a very significant degree of catch-up on US levels of performance. There were not only unusual opportunities for recouping the productivity backlog, but technical progress at the frontier continued to grow quickly. European savings rates were higher than ever before, and financed very high rates of domestic investment. Europe attracted very substantial net migration from the rest of the world.

There were major changes in policy which made it possible to seize these opportunities. The first of these was the remarkable revival of liberalism in international transactions. Trade and payments barriers enacted in the 1930s and during the war were removed. The new style liberalism was buttressed by effective arrangements for articulate and regular consultations between Western countries and for mutual financial assistance. Trade was freed by abolition of quantitative restrictions in OEEC, reduction of tariffs on a regional basis in the EC and EFTA, and, more globally, in GATT. They were a major force in sustaining demand and productivity growth and keeping prices in check.

The fundamental innovation in domestic policy was the commitment to full use of resources. In 1950-73 the average unemployment rate in the core countries was 2.4 per cent of the labour force, and in the periphery 3.6 per cent. In Scandinavia and the UK the gospel of fiscal activism and primordial commitment to full employment had been propounded by Keynes, Lundberg and Myrdal and gained wide postwar acceptance in academic, political and bureaucratic milieux. In France, the objective of full resource use derived from the strong commitment to growth and supply-side stimuli in the planning process. Germany gave greater emphasis to price stability and work incentives than to buoyant domestic demand, but proclaimed the full employment goal in its Stabilisation Law of 1967. In any case it achieved fuller employment than most countries by export-induced growth.

Until 1971 these countries had the dollar as their monetary anchor. The fixed rate exchange system derived from the wartime Bretton Woods commitments. Exchange stability was easier to attain in a period when there were significant controls on capital movements.

Policy was also helped by the moderation of price increases. The general goal of governments was not price stability, but to keep the pace of increase within limits that did not put too great a strain on competitiveness. When the outcome of demand management policy was unclear, the tendency was to take the upside risk. This was most clearly the case in France, which looked to devaluation as compensation.

The average rise in consumer price indices from 1950 to 1973 was about 4 per cent a year in the 16 countries (see Table 15). The rate of price increase might well have been faster at such high levels of employment, but stability was helped by the fixed exchange rate system, the impact of foreign trade in stimulating competition, the stability of primary commodity prices due to US farm surpluses and the large oil reserves and political weakness of Middle Eastern countries. Large flows of labour from farming and immigration helped to keep down wage pressure, and levels of social tension were low due to the expansion of the welfare state. Finally, expectations had not adjusted to continuous inflation. Friedman (1968) suggested that

expectations would become more adaptive and decidedly more explosive unless unemployment increased.

Eventually the collapse of the monetary anchor, the erosion of the special factors which mitigated price increases, and the OPEC shock all operated simultaneously in the early 1970s in a way that forced a change in the emphasis of domestic policy.

IV

1973-96: A Return to Capitalist Normalcy?

The latest phase of European capitalist development has been equal in length to the golden age but has shown much slower growth. In the 12 core countries, per capita GDP growth averaged 1.7 per cent a year from 1973 to 1996 compared with 3.8 per cent in 1950-73 (see Table 9). GDP growth averaged 2.1 per cent a year compared with 4.6 per cent in 1950-73 (see Table 10). Labour productivity growth decelerated from 4.7 to 2.1 per cent a year (see Table 11). The average rate of investment declined in all the countries. There was also a significant drop in population growth to 0.3 per cent a year in 1973-96 compared with 0.8 per cent in 1950-73, reflecting a widespread fall in fertility. The incidence of recession was bigger than in the golden age. There was a deceleration in foreign trade performance with export volume growing on average by 4.6 per cent a year in 1973-96 compared with 8.6 per cent in the golden age. The deceleration was biggest in Germany, and the UK was the only country where export growth accelerated (see Table 12).

The proportionate slowdown in the periphery was similar to that in the core countries in most respects, but the growth of GDP, per capita GDP and labour productivity continued to be significantly faster than in the core. Furthermore, their export growth did not slacken, and their demographic experience was different. In Ireland and Portugal, population grew at 0.7 per cent and 0.6 per cent a year in 1973-96, compared with 0.1 per cent in 1950-73.

The deceleration of performance in 1973 is less disappointing if it is compared with growth before the golden age. In the relatively prosperous and peaceful period 1870-1913 per capita income and labour productivity growth were slower on average than in 1973-96. Only Germany, Sweden and Switzerland failed to do better than in that earlier period, and in the German case this was due to the absorption of the low-income Länder of the former East Germany. The European economies also enjoyed greater conjunctural stability in 1973-96 than they did in 1870-1913.

It was inevitable that performance would decline significantly after the golden age. In that period, once-for-all opportunities for rapid catch-up with the US were available and were seized,

and the rate of technical progress in the lead country (as measured by US total factor productivity) was then very much faster than has since been the case. There was still significant catch-up in European income and productivity levels in 1973-96, particularly in the periphery.

The most disturbing aspect of performance after 1973 has been the staggering rise in the rate of unemployment (see Table 14). In 1996 the average in the core countries was 9.2 per cent, which is higher than that in the depressed years of the 1930s and nearly 4 times the rate in the golden age. Except for Denmark, the Netherlands and UK, the situation has been steadily worsening and shows signs of deteriorating further. In the periphery the situation is even worse, with an unemployment average of 12.9 per cent. In Spain (see Blanchard et al, 1995), nearly a quarter of the labour force are out of work. Unemployment on this unprecedented scale would clearly have created a major depression if the unemployed had not received substantial income support from social security.

A major reason for the rise in unemployment was the change in macropolicy objectives. Initially the change was dictated by events, but its continuance reflected a basic ideological switch.

Erik Lundberg (1968, p.37) characterised the 'establishment view' in the 1960s as follows: "In the postwar period, the achievement of full employment and rapid economic growth have become a primary concern of national governments. Such policy targets certainly did not -- guide government activities during most of the interwar period -- instead there were various policy aims that today would largely be considered as either intermediate, secondary, irrelevant or irrational targets, such as the restoration or preservation of a specific exchange rate, the annual balancing of the government budget, and the stability of the price level at a prevailing or previously reached niveau".

The establishment wisdom has now reverted completely to the old-fashioned religion. Full employment and rapid economic growth have been jettisoned and ancient goals have been embraced with crusading zeal (see Maddison, 1983, for a more detailed analysis of this change in establishment attitudes).

The initial switch in emphasis had considerable conjunctural validity. In the early 1970s, the Bretton Woods fixed exchange rate system collapsed. The dollar was floated in 1971 and policy makers felt disoriented without a monetary anchor. This happened at a time when there was already a climate of inflationary expectations. They were greatly augmented by the OPEC price shock (which also produced serious payments problems). It was felt that accommodation of inflation beyond a certain point would lead to hyperinflation, and that this would threaten the whole sociopolitical order. This was the razor's edge theorem. Income policies had been discredited so disinflation was given strong priority. It was not easy to break inflationary

momentum quickly. Further inflationary pressure was created by the second OPEC shock in 1980 and the surge in other commodity prices. With honourable exceptions like Tobin and Modigliani the Keynesians threw in the towel, and politicians sought intellectual sustenance from Friedman, Hayek and the neo-Austrians who regarded unemployment as a useful corrective. The rational expectations school further sapped confidence in the usefulness of discretionary policy action. The establishment decided that if simple rules were followed long enough the economy would be self regulating. Responsibility for economic policy action should move from Ministers of Finance to central bankers.

The switch from old to new modes of policy thinking was most dramatic in the UK - the former Keynesian heartland. Another major reversal occurred in France in 1983. After a couple of years of nationalising major enterprises, encouraging wage increases and three devaluations, the Mitterrand government embraced the new orthodoxy and France has since followed a policy of 'competitive disinflation' with defence of the exchange parity as the primary objective (see Blanchard and Muet, 1993, for a detailed analysis). With some delay, there was also a major change of objectives in Sweden. In other countries, the change has been less dramatic, but has nonetheless been substantial.

From 1983 onwards, these deflationary policies were quite successful. The rate of price rise dropped very sharply and the power of OPEC was broken through the impact of price increases in inducing energy economy and stimulating non-OPEC oil output.

In 1973-83, inflation in the core countries had averaged 9.4 per cent but in 1983-95 this was reduced to 3.8 per cent - significantly lower than in the golden age in most countries. For 1996, the average was 1.8 per cent. The periphery countries were less successful. In 1973-83 their average inflation rates were twice as high as in the core and the discrepancy was even bigger in 1983-96 (see Table 15).

At the end of the 1980s, the new orthodoxy was reinforced by incorporating the objective of monetary union. This was not a new idea. It had been advocated within the EEC by the 1970 Werner Report, but this objective was abandoned when the 'snake' system (precursor of the EMS) collapsed in 1976. The EMS was created in 1979 to establish an area of exchange stability. From 1987 to 1992 it achieved reasonable success. As a result, the objective of monetary union was disinterred and put forward in the Delors report of 1989. This reiterated the importance of policy objectives which Lundberg had qualified as secondary or irrational in 1968. It made no mention of employment or growth objectives, nor did it give serious consideration to the institutional, social and economic costs involved in enforcing convergence and conformity in price, wage, monetary and fiscal behaviour. Such convergence would of course have been expansionary if Greek standards had been the target, but it was clear that the new anchor was expected to be the DM. The major economic gain from union would be a

reduction in transaction costs and some possible improvement in economic stability. It was also alleged that it was necessary to 'complete' the single market.

The arguments for monetary union were set out more elaborately in the EC report *One Market, One Money* (1990). This was basically one-sided salesmanship, disguised as scholarship. It paid no serious attention to the costs and risks involved. Nevertheless the proposal was adopted by the EC in 1991 and the Maastricht Treaty of European Union was ratified in 1993. The European Monetary Institute was installed in Frankfurt in 1994 (with an endowment of 616 million ECU) to be responsible for creating a European Central Bank.

The guidelines for monetary union took it for granted that countries should converge towards German standards of price and exchange rate stability. Countries were required to hold their currencies within a narrow band for at least two years, to achieve a high degree of price stability, and to attain a 'sustainable fiscal position', i.e. keep fiscal deficits below 3 per cent of GDP, and to reduce public debt below 60 per cent of GDP.

The path to monetary union has not been smooth. In 1992 there was a major currency crisis. After a costly defence of their existing exchange rates, there were a number of devaluations and an exit of Italy and the UK from the EMS. In 1993 new pressures on the franc led the EMS authorities to widen the permitted fluctuation band from 2-1/4 to 15 per cent. The other Maastricht criteria have not been met by most of the potential members. It is therefore difficult to predict when or whether there will be a monetary union, who will be a member, and whether it will be as irrevocable as expected. However it is clear that official endorsement of the objective reinforced the deflationary bias in policy and contributed importantly to the increase in European unemployment.

Although the intent of government policy has been substantially deflationary for a prolonged period over the past two decades, fiscal freedom was substantially constrained by welfare state commitments. Thus we can see in Table 16 that budget deficits have been bigger since 1974 than in the golden age. When unemployment increased, transfer payments were triggered automatically. In many cases people who left employment and dropped out of the labour force also got substantial benefits, e.g. they were urged to retire early or to acquire 'handicapped' status. There was also a steady build up of pension benefits due to the ageing of population.

The deflationary intent of government policy can be seen more clearly in the level of real interest rates. These have been very much higher in the period of moderate price increases since 1982 than they were in the golden age and the years of high inflation 1974-81 (see Table 17). The combination of budget deficits and high interest rates can be seen in Table 18. Gross debt rose from an average of about 60 per cent of GDP in 1990 to 77 per cent in 1996, net liabilities

of government have risen a good deal more in proportionate terms. The combined domestic currency debt obligations of core country governments at the end of 1996 were just over 4.2 trillion dollars at the exchange rates then prevailing (see BIS, 1997). Private sector domestic currency debt was just over 3 trillion. It is not clear what will happen to governmental credit-worthiness and real interest rates if these assets are forcibly and simultaneously converted to Euros.

V

The 'Transition' in Eastern Europe

Postwar recovery and growth in Europe were strongly influenced by the cold war which split the continent into two clearly segregated groups. East European countries became command economies under Soviet tutelage, bound together in a system of controlled trade under CMEA arrangements, cut off from Western capital markets and a good deal of Western technology, squeezing domestic consumption to raise investment in heavy industry and to sustain a large military effort.

The Soviet bloc had its own system of national accounts which ignored a large number of so-called non-productive services and tended to exaggerate performance by understating inflation. Assessment of Eastern growth and levels of performance was problematic, and we have to rely on Western reestimation of Eastern performance on lines pioneered by Abram Bergson, and carried out in a continuous and intensive way by the US Central Intelligence Agency (see Maddison, 1995a and 1997). The measures we have suggest that Eastern European per capita income growth from 1950 to 1973 was fairly similar in pace to that in the core countries, but with a significantly lower proportion of output going to consumption. However, growth was slower than that in the European capitalist periphery. The average income level in the capitalist periphery was similar to that in Eastern Europe in 1950, but about 40 per cent higher in 1973.

After 1973, Eastern European economies started to falter seriously. By 1985, when Gorbachev came to power in the USSR, disillusion with command economies, and cynicism about the political system and quality of life was endemic in all the Eastern countries. Retail outlets and services were few. Bread and housing were heavily subsidised, but consumers wasted time queuing, bartering, or sometimes bribing their way to goods and services they wanted. Work incentives were poor, malingering on the job was commonplace. Microeconomic inefficiency was massive in the production process. There was a chronic tendency to use capital wastefully as it was supplied below cost. Average and incremental fixed capital ratios were higher than in capitalist countries, inventories were much higher, steel and energy consumption per unit of output was a multiple of that in Western countries.

Eventually, economic failure and the collapse of political legitimacy caused the USSR to split into 15 independent republics. In Eastern Europe, Soviet hegemony disappeared and Soviet military forces were withdrawn. Miraculously, this collapse occurred without violence between East and West, though there was armed conflict on ethnic and other issues between and on the borders of ex-Soviet republics (Georgia, Armenia, Azerbaijan, Kyrgyz Republic, Moldova, Tajikistan, Turkmenistan and Chechnya) and in ex-Yugoslavia.

As a consequence of the political changes, most of the Eastern countries abandoned the socialist command economy and embarked on a transition to capitalism. This involved a radical reorientation of foreign trade and major changes in the ownership, organisation and structure of the domestic economy. An important part of heavy industry production capacity was redundant once consumer demand became sovereign. Some of the capacity of light industry was outmoded through competition from more attractive foreign goods. Small scale service activities boomed. Shop space was limited but enterprising salesmen and pedlars sold their wares on the streets. These structural problems could not be solved quickly. Large scale privatisation was tried in virtually all the countries, but it was difficult to unload the huge stock of assets on a population with low financial resources and little experience as investors.

The command economies had a strong preference for very large enterprises, partly because of a belief that this led to economies of scale, but also because it meant that enterprise managers could take over some of the burden of resource allocation from planners. In the USSR, the average industrial enterprise employed 814 workers in 1987. In Poland the number was not too different, and in Czechoslovakia it was more than double the Soviet average. By contrast, the average German and British manufacturing enterprise had 30 employees and in the USA, the average was 49. In Western countries there was a very wide spread around the average. The median firm employed 318 persons in Germany, 240 in the UK and 263 in the USA (half the enterprises are smaller than the median, half above this size). In socialist countries the size spread was much narrower and small firms were unusual (see Kouwenhoven 1996, p.25; Ehrlich 1985, p.290, van Ark 1993, Table 6.6, and Maddison 1995b on firm size).

In these circumstances, there were major managerial and technical problems in downsizing firms to a degree which is operational in a capitalist economy subject to market forces. The problem was further complicated by the fact that a major part of social security benefits was tied to the workplace. Firms provided housing, health, child care, and pensions. Conversion of this workplace benefit system to general social security coverage was a major financial challenge which most countries could not meet. As a result, old state firms are still encumbered with social liabilities which make them very difficult to sell, and 'workers' stay with such firms even when they receive no wages. It is clear that the transformation from a command to a capitalist economy cannot be achieved by waving the magic wand of market forces.

Another major problem of these economies has been macroeconomic imbalance and instability. The whole pattern of domestic and foreign trade prices had to be changed as subsidies and regulations were ended, and as new tax systems were developed. The income of new types of entrepreneurs was difficult for the tax authorities to monitor, so most governments had to finance part of their expenditure by printing money. As a result, there was a major upsurge in inflation which was particularly severe in the countries of the former Soviet Union, Rumania and Bulgaria (see Table 15). The pace of inflation had abated by 1996, except in Bulgaria, but the average situation, even now, would be regarded as dreadful in any Western country. The inflation process had some cathartic impact as it helped to reform the distorted price structure, but it also destroyed the savings of most of the population, and contributed to the incidence of poverty.

Average per capita GDP in four of the six countries shown in Table 7 hit its trough in 1993 and has since been rising. Real income in Bulgaria and Russia is still in decline. The 1996 average for six countries was nearly one fifth below the 1985 level. All of the countries had incomes below previous peaks; the best performance was in Poland, the Czech republic and Hungary, and, in our sample, the worst is Russia, where per capita output is more than 40 per cent below the 1989 level. However, the Russian situation is better than in the Ukraine, and most other former Soviet republics (see Table 3), though the reliability of the estimates for these states is even weaker than it is for Russia.

It is interesting to compare the situation in these former communist countries with that in East Germany which was incorporated into the Bundesrepublik in 1990. In other East European countries, the amount of Western aid has been relatively modest, and their access to Western markets is hampered by the EU's common agricultural policy and other restraints on exports of sensitive industrial products. East Germany, by contrast, has completely free access to German and Western markets and has received transfers of various kinds from the rest of Germany of more than half a trillion dollars since reunification. In 1994 (see Table 2) transfers amounted to almost \$105 billion, or about \$6750 per head of the population. In East Germany, the problems of transforming socialist firms into productive capitalist enterprises were more pronounced than elsewhere because the old enterprises had greater exposure to capitalist competition, and were incorporated in a monetary union which greatly overvalued the old Ostmark wages and assets. There was also more overt unemployment, as workers (as well as pensioners and other social categories) became eligible for West Germany's social security benefits. In 1995, East German employment was more than one third lower than in 1989 (see OECD, 1996, p.107). In real terms, residents of the East German Länder are much better off than they were in the DDR, but the average per capita GDP they produce is lower than that in the Czech republic.

VI Summary and Conclusions

Over this past half century, European capitalism has made enormous progress. The average productivity level has increased almost fivefold since 1950 - from 40 per cent of the US level to more than 80 per cent. The process was strongly convergent and equalising. The fastest growth occurred in those countries which were poorest in 1950.

For the first quarter century after the war, progress was unusually rapid because European countries were recouping opportunities squandered in two world wars and two decades of interwar hostility. It was possible to achieve a rapid narrowing of the productivity gap between themselves and the USA, because they had highly skilled and educated labour, mounted high levels of saving and investment and reopened their economies to international trade - which made a major contribution to improved resource allocation.

There is still scope for rapid growth in productivity by opening the service sector to greater competition, but it was inevitable that the pace of progress would slacken as Europe came closer to the productivity frontier. Nevertheless, the 1973-96 rate of advance was better than in 1870-1913 which is the best comparative yardstick we have for judging capitalist normality.

Over the next quarter century, it seems probable that West European productivity growth will continue to decelerate because of the slowdown in technical progress which is clearly evident in the USA. This possibility makes it all the more necessary to make full use of resources.

The most disturbing feature of European performance has been the progressive increase in unemployment. This is not a short-term blip. For the 12 years 1984-95, the average of the unemployment rates in our 16 countries was 8.7 per cent. In 1996, the average of the country rates was 10.2. For the 16 countries combined there were 19 million unemployed in 1996 - 10.7 per cent of their aggregate labour force of 179 million. The situation is worse than in the 1930s and about three times as bad as in the 1920s. This is not capitalist normality. It is the fruit of misguided European policy and has no counterpart in the United States. In 1996, there were only 7.2 million unemployed in America - 5.4 per cent of the 135 million labour force. The USA not only has much smaller unemployment, but has expanded employment faster than population. This is not due to demographic differences - the American age structure is similar to the European. American policy is job creating. European policy inhibits the growth of employment.

The difference between the functioning of European and American capitalism can be seen by comparing real income and productivity outcomes in the two areas. In the 16 European countries, productivity growth from 1973 to 1996 averaged 2.3 per cent a year, but per capita

GDP only 1.7 per cent (i.e. by 69 per cent and 49 per cent over the 23 years). In the USA, productivity grew half as fast as in Europe (by 1.2 per cent a year), but real income grew by 1.5 per cent a year - almost as fast as in Europe (i.e. by 24 per cent and 41 per cent over the whole period).

In order to understand the Europe-US dichotomy, one must consider the differences in social policy, labour market arrangements, and macropolicy aspirations.

Europe has a much bigger welfare state than the USA. Social transfers average 22 per cent of GDP in the 16 countries, compared with 13 per cent in America. As a result, Europeans have greater economic security and there is substantially less inequality and poverty. Without the welfare state, Europe would be in deep depression at present unemployment levels. There are of course problems which this large welfare state creates. The income cushion makes unemployment and exit from the labour force somewhat higher than it would otherwise be. It has also brought important fiscal problems, and tax structures that in some countries raise the cost of hiring labour. However, the larger size of the welfare state explains only part of the different functioning of European and American labour markets.

In many European countries, labour markets are highly regulated, with minimum wages, constraints on the freedom of enterprises to fire redundant workers, restrictions on working hours and other regulations which are intended to prevent downsizing and protect those who already have jobs (see Siebert, 1997). In conditions of sustained labour slack they discourage employers from hiring workers and discriminate against the unemployed. Practice in public enterprises mimics that in bureaucracy - with an aspiration for lifetime job security, long vacations, status and perquisites. In some hopelessly uneconomic enterprises, jobs are protected by huge subsidies - e.g. German coalmines.

In addition to this many governments have misused the welfare state by policies to reduce the labour supply. Hundreds of thousands of people have been shifted from payrolls to social security well before retirement age. A very large number have been classified as handicapped for similar reasons.

Although labour market and microeconomic policies have been highly interventionist and frequently aimed at preserving jobs, European macropolicy has added substantially to unemployment. Since the mid 1980s it has been much more deflationary than was warranted by the state of the European economy. It has been obsessed with the dangers of inflation and has abandoned the commitment to high levels of employment which characterised the postwar golden age. The European economy would have been sounder with more flexible labour markets, less micro-meddling, and more expansionary macropolicy.

Some shake-up in policy objectives and weaponry was inevitable given the shocks of the 1970s. Policy makers had to cope with the collapse of the Bretton Woods fixed exchange rate mechanism; with major exchange rate volatility and a great wave of inflation; they had to deal with the OPEC shocks by economising on energy and finding new sources of oil supply. In dealing with these new challenges it was entirely justifiable to have a decade of deflationary policy. In fact, there was a large measure of success in handling most of these problems by the mid 1980s, but, in the process, a new ideology had emerged. The policy establishment had been traumatised by the possibility of hyperinflation which was seen as a threat to the socio-political order. European policy makers sought intellectual sustenance from Hayek and the neo-Austrians who regarded unemployment as a useful corrective. The establishment was persuaded by the rational expectations pundits that discretionary policies were either impotent or harmful. The new consensus held that the economy would become self-regulating by adherence to simple rules of sound money and fiscal prudence. Those who helped to forge this new consensus wanted a restoration of the policy regime which proved successful in 1870-1913. They forgot the massive changes in the sociopolitical order which distinguish Europe today from the world of Mr. Gladstone. At that time, there was limited suffrage, no social security, low taxes, trade unions were weak, there was a large supply of casual labour, and wages were downwardly flexible (see Matthews, 1968). It was then much more reasonable to aspire to zero inflation than it is today.

A major new element has been the drive for monetary union. This has greatly reinforced the deflationary emphasis of macropolicy. The hope is that monetary union will bring other Europeans to behave like Germans, in their response to the new macroeconomic order. This is a narrow technocratic view of how European economies function and can be made to function. It ignores the fact that there are still big intercountry differences in social dynamics and political cultures. If monetary union is established, those who run the European Central Bank will have to make some accommodation to these pressures. Otherwise, the union is likely to collapse.

Table 1
Levels of Macroeconomic Performance in 1996:
Advanced Capitalist Economies and Eastern Europe

	GDP (million 1990 int.\$)	Population (000s at midyear)	Per Capita GDP (1990 int.\$)	Annual Hours Worked Per Head of Population
Austria	144,767	8,063	17,951	725
Belgium	180,363	10,158	17,756	595
Denmark	103,988	5,251	19,803	797
Finland	81,351	5,128	15,864	680
France	1,063,034	58,387	18,207	592
Germany	1,427,416	81,902	17,428	682
Italy	964,276	57,348	16,814	641
Netherlands	287,146	15,518	18,504	592
Norway	97,483	4,380	22,256	715
Sweden	156,212	8,893	17,566	675
Switzerland	144,294	7,125	20,252	854
UK	1,019,315	58,832	17,326	664
<i>Total/Average</i>	5,669,645	320,985	17,663	684
Greece	114,775	10,482	10,950	641
Ireland	56,842	3,593	15,820	622
Portugal	119,310	9,930	12,015	832
Spain	515,679	39,270	13,132	614
<i>Total/Average</i>	806,606	63,275	12,748	677
USA	6,297,105	265,485	23,719	766
Japan	2,470,900	126,183	19,582	964
Bulgaria	35,697	8,300	4,301	n.a.
Czech Republic	81,861	10,300	7,948	n.a.
Hungary	63,100	10,200	6,137	n.a.
Poland	230,446	38,600	5,970	n.a.
Rumania	70,002	22,500	3,111	n.a.
Russia	609,735	148,000	4,120	n.a.
Slovakia	37,375	5,400	6,920	n.a.
<i>Total/Average</i>	1,128,216	243,300	4,637	n.a.

Source: 1990 GDP levels from Maddison (1995a), except for Germany, Ireland, Norway and USA which were revised because of changes in national estimates. 'International' dollars derived from Geary Khamis PPP converters (Maddison 1995a, p.172). GDP and population for OECD countries updated to 1995 from OECD, *National Accounts 1960-1995*, vol.1, 1995-6 GDP volume movement from OECD, *Economic Outlook*, June 1997. 1995-6 proportionate population movement assumed to be same as in 1994-5. East European 1990 GDP levels from Maddison (1995a). Russian GDP and population from Table 3 below. Most East European GDPs updated from 1990 to 1993 from World Bank, *World Tables 1995*, 1993-6 from OECD, *Economic Outlook*, June 1997, pp.84, 91, 105 and 118. Czech, Hungarian and Polish GDP 1990-5 from OECD, *National Accounts 1983-95*. The 1990 decomposition of Czech and Slovak 1990 GDP from Maddison (1995a), p.141. Area totals in the third column are weighted averages. East European populations from World Bank, updated from INED, *Population et Sociétés*, July/August 1997. Fourth column described in source note for Table 6, divided by population, area averages are arithmetic.

Table 2
The Impact of German Reunification

	GDP (million 1990 int.\$)	Per Capita GDP (1990 int.\$)	Per Capita Expenditure (1990 int.\$)	Population (000s)
<i>West Germany</i>				
1989	1,118,468	18,021	17,042	62,063
1990	1,182,262	18,691	17,597	63,254
1991	1,242,097	19,385	18,201	64,074
1992	1,263,835	19,484	18,179	64,865
1993	1,239,208	18,906	17,539	65,545
1994	1,266,743	19,228	17,814	65,879
<i>East Germany</i>				
1989	n.a.	n.a.	n.a.	16,399
1990	n.a.	n.a.	n.a.	16,111
1991	85,961	5,403	10,584	15,910
1992	93,449	5,941	12,348	15,730
1993	102,812	6,572	13,102	15,645
1994	113,718	7,322	14,070	15,531
<i>Whole Germany</i>				
1989				78,677
1990				79,364
1991	1,328,058	16,604	16,686	79,984
1992	1,357,284	16,841	17,028	80,595
1993	1,342,020	16,531	16,686	81,180
1994	1,380,461	16,954	17,097	81,423
1995	1,407,708	17,238	17,397	81,662
1996	1,427,416	17,428	n.a.	(81,902)

Source: GDP and gross domestic expenditure in constant prices for West Germany 1989-94, and whole Germany 1991-95 from OECD, *National Accounts 1960-1995*, Paris 1997; percentage change in GDP 1995-6 from OECD, *Economic Outlook*, June 1997, Annex Table 1. 1990 benchmark GDP and gross domestic expenditure levels estimated using the Geary Khamis PPP converter (2.052 marks/\$) from Maddison (1995a), p.172. Population from OECD and German statistical office.

Table 3
The Impact of Soviet Disintegration

	GDP (million 1990 int.\$)	Per Capita GDP (1990 int.\$)	Population (000s)
<i>USSR</i>			
1988	2,007,280	7,032	285,463
1989	2,037,253	7,078	287,845
1990	1,987,995	6,871	289,350
1991	1,686,868	5,793	291,200
<i>Russian Federation</i>			
1990	1,042,484	7,036	148,164
1991	990,360	6,677	148,326
1992	846,758	5,710	148,295
1993	773,090	5,224	147,997
1994	675,681	4,567	147,938
1995	648,654	4,383	148,000
1996	609,735	4,120	148,000
<i>Ukraine</i>			
1991	257,079	4,984	51,586
1992	222,942	4,326	51,534
1993	204,883	3,974	51,551
1994	165,955	3,231	51,370
1995	146,041	2,857	51,120
1996	118,293	2,319	51,000

Source: USSR from Maddison (1995a). Russian Federation and Ukraine 1991 GDP levels in 1990 international dollars from Maddison (1995a) p.142. 1991-4 Russian real GDP movement (revised estimates) from World Bank/Russian Goskomstat, *Russian Federation: Report on the National Accounts*, October 1995, p.xxi. 1994-6 movement from OECD, *Economic Outlook*, June 1997, p.118. Russian population 1991-4 from World Bank, *Statistical Handbook, States of the Former USSR*, 1995, Washington DC, p.418. 1995-6 derived from *Population et Sociétés*, July-August 1997. Ukraine GDP volume movement and population 1991-3 from World Bank, *World Tables 1995*, 1994-6 GDP movement from OECD, *Economic Outlook*, June 1997, p.120. 1993-6 population extrapolated from *Population et Sociétés*.

Table 4
Proportion of Employment by Major Economic Sector
(percent of total employment)

	Agriculture Forestry & Fishing	Industry	Services
<i>12 Core Countries of Capitalist Europe</i>			
1870	50.2	26.4	23.4
1950	24.7	38.1	37.2
1973	9.7	38.5	51.8
1995	4.5	27.3	68.2
<i>4 Countries of Capitalist Periphery</i>			
1950	49.7	22.3	28.0
1973	27.0	32.3	40.7
1995	11.3	29.7	59.0

Source: Core countries 1870-1973 from Maddison (1991), pp.248-9, 1995 from OECD, *Quarterly Labour Force Statistics*, 1, 1996. Periphery 1950 from Mueller (1965), p.39, 1973 and 1995 from OECD, *Labour Force Statistics*, and *Quarterly Labour Force Statistics*.

Table 5
Total Government Expenditure as Percent of GDP at Current Prices, 1913-1996

	1913	1938	1950	1973	1996
France	8.9	23.2	27.6	38.8	54.5
Germany	17.7	42.4	30.4	42.0	49.0
Netherlands	8.2a	21.7	26.8	45.5	49.9
UK	13.3	28.8	34.2	41.5	41.9
<i>Arithmetic Average</i>	12.0	29.0	29.8	42.0	48.8
US	8.0	19.8	21.4	31.1	33.3
Japan	14.2	30.3	19.8	22.9	36.2

a) 1910.

Source: 1913-73 from Maddison (1995a), p.65; 1996 from OECD, *Economic Outlook*, June 1997, Annex Table 28.

Table 6
Categories of Government Current Expenditure as a Proportion of GDP, 1994
(percentages of GDP)

	Government Consumption of Goods & Services	Interest Payments	Subsidies	Transfer Payments	Total Current Expenditure
Austria	18.8	4.1	2.7	22.2	47.8
Belgium	15.0	10.2	2.7	26.7	54.6
Denmark	25.5	7.1	3.8	24.7	61.1
Finland	22.4	5.1	3.1	27.2	57.8
France	19.6	3.8	1.6	26.0	51.0
Germany (West)	17.7	3.4	1.6	22.9	45.6
Italy	17.1	11.1	2.2	20.5	50.9
Netherlands	14.2	6.1	2.6	30.3	53.2
Norway	21.5	3.1	4.2	19.1	47.9
Sweden	27.3	6.9	5.3	27.1	66.6
Switzerland	14.1	2.1	0.9	19.8	36.9
UK	21.6	3.3	1.1	16.3	42.3
<i>Arith. Average</i>	19.6	5.5	2.7	23.6	51.4
Greece	18.5	16.1	0.9	17.2	52.7
Ireland	15.5	5.7	1.1	16.9	39.2
Portugal (a)	18.1	6.9	1.3	16.2	42.5
Spain	16.9	5.1	2.0	18.6	42.6
<i>Arith. Average</i>	17.3	8.5	1.3	17.2	44.3
USA	16.1	4.5	0.5	13.1	34.2
Japan	9.6	3.7	0.7	13.0	27.0

a) 1993.

Source: OECD, *National Accounts 1982-94*, Vol.2, Paris 1996, Ireland, Norway, Portugal and USA from 1997 edition, Table 1 for GDP, Table 6 for general government expenditures.

Table 7
Categories of Government Revenue as a Proportion of GDP, 1994

	Total Current Revenue	Social Security Levies	Direct Taxes	Indirect Taxes	Other	Net Borrowing
Austria	47.3	13.2	13.2	16.3	4.6	- 0.4
Belgium	50.9	15.8	17.9	12.9	4.3	- 3.7
Denmark	59.1	1.7	31.5	18.1	7.8	- 2.0
Finland	53.1	15.4	17.3	14.6	5.8	- 4.7
France	46.8	19.3	9.5	14.1	3.9	- 0.7
Germany (West)	45.9	17.0	11.2	13.7	4.0	1.4
Italy	44.9	13.2	14.9	11.7	5.1	- 4.4
Netherlands	52.0	19.6	14.1	13.0	5.3	- 0.01
Norway	50.3	10.1	15.8	16.3	8.1	2.5
Switzerland	36.7	11.8	14.8	6.2	3.9	- 1.8
Sweden	57.7	13.7	21.4	15.0	7.6	- 7.7
UK	37.3	6.3	12.6	14.2	4.2	- 3.8
<i>Arith. Average</i>	48.5	13.1	16.2	13.8	5.4	- 2.1
Greece	42.2	12.9	7.7	19.4	2.2	- 8.4
Ireland	39.2	6.9	15.5	14.3	2.5	- 0.1
Portugal (a)	39.8	13.6	9.4	13.6	3.2	- 2.6
Spain	39.1	13.1	11.5	10.2	4.3	- 3.5
<i>Arith. Average</i>	40.1	11.6	11.0	14.4	3.1	- 3.6
USA	31.6	7.6	13.1	8.5	2.4	- 2.7
Japan	32.2	9.5	10.5	7.9	4.3	5.7

a) 1993.

Source: OECD, *National Accounts 1982-94*, Vol.2, Paris, 1996, Ireland, Norway, Portugal and USA from 1997 edition, Table 1 for GDP, Table 6 for detail of general government revenue. Negative sign in last column means government net borrowing.

Table 8
Labour Productivity (GDP per Hour Worked), 1870-1996
(1990 international dollars per hour)

	1870	1913	1950	1973	1996
Austria	1.39	2.93	4.07	15.27	24.76
Belgium	2.12	3.60	6.06	16.53	29.83
Denmark	1.51	3.40	5.85	15.94	24.86
Finland	0.84	1.81	4.00	13.42	23.32
France	1.36	2.85	5.65	17.77	30.74
Germany	1.58	3.50	4.37	16.64	25.54
Italy	1.03	2.09	4.28	15.58	26.21
Netherlands	2.33	4.01	6.50	19.02	28.60
Norway	1.18	2.38	5.88	15.27	31.14
Sweden	1.22	2.58	7.08	18.02	26.01
Switzerland	1.75	3.25	8.75	18.28	23.72
UK	2.61	4.40	7.86	15.92	26.09
<i>Arith. Average</i>	1.58	3.07	5.86	16.47	26.74
Greece	n.a.	n.a.	2.58	10.77	17.09
Ireland	n.a.	n.a.	3.80	10.06	25.45
Portugal	n.a.	n.a.	2.58	9.86	16.43
Spain	n.a.	n.a.	2.60	10.86	21.39
<i>Arith. Average</i>	n.a.	n.a.	2.89	10.39	20.09
USA	2.27	5.14	12.72	23.71	30.96
Japan	0.46	1.03	2.03	11.15	20.31

Source: 1870-1973 from Maddison (1995a) p.249, except for Norway and USA, where GDP levels were revised (see note to Table 1). 1996 derived from GDP levels shown in Table 1, with employment from OECD, *Quarterly Labour Force Statistics*, second quarter 1997, Paris, except for Belgium, Denmark, Netherlands, Greece and Ireland which were from OECD, *Labour Force Statistics 1974-1994*, Paris, 1996 with some extrapolation from 1994 to 1996. The hours estimates have to be merged from a number of national sources, and were in most cases not available for 1996. Working hours per person employed were therefore assumed to be the same in 1996 as in 1992 (from Maddison 1995a, p.248). These figures are adjusted to eliminate the effect of changes in territorial boundaries, except for Germany 1973-96.

Table 9
Growth of Per Capita GDP in Constant Prices
(annual average compound growth rate)

	1820-70	1870-1913	1913-50	1950-73	1973-96
Austria	0.7	1.5	0.2	4.9	2.0
Belgium	1.4	1.0	0.7	3.5	1.8
Denmark	0.9	1.6	1.6	3.1	1.7
Finland	0.8	1.4	1.9	4.3	1.7
France	0.8	1.5	1.1	4.0	1.5
Germany	1.1	1.6	0.3	5.0	1.2
Italy	0.6	1.3	0.8	5.0	2.1
Netherlands	1.1	0.9	1.1	3.4	1.6
Norway	0.5	1.3	2.1	3.2	3.1
Sweden	0.7	1.5	2.1	3.1	1.2
Switzerland	n.a.	1.5	2.1	3.1	0.5
UK	1.2	1.0	0.8	2.4	1.6
<i>Arith. Average</i>	0.9	1.3	1.2	3.8	1.7
Greece	n.a.	n.a.	0.5	6.2	1.5
Ireland	1.2	0.5	0.5	3.1	3.9
Portugal	n.a.	0.5	1.2	5.7	2.0
Spain	0.5	1.2	0.2	5.8	1.8
<i>Arith. Average</i>	0.9	0.9	0.7	5.2	2.3
Capitalist Europe	0.9	1.3	1.1	4.1	1.7
USA	1.3	1.8	1.6	2.4	1.5
Japan	0.1	1.4	0.9	8.0	2.5
Bulgaria	n.a.	n.a.	0.3	5.2	-0.9
Czechoslovakia	0.6	1.4	1.4	3.1	0.3
Hungary	n.a.	1.2	0.5	3.6	0.4
Poland	n.a.	n.a.	n.a.	3.4	0.5
Rumania	n.a.	n.a.	n.a.	4.8	-0.5
USSR/Russia	0.6	0.9	1.8	3.4	-1.7
<i>Arith. Average</i>	0.6	1.2	1.0	3.9	-0.3

Source: Maddison (1995a), p.62 revised and updated to 1996. GDP to 1995 from OECD, *National Accounts 1960-1995*, Vol.1, Paris 1997, with 1995-6 volume change from OECD, *Economic Outlook*, June 1997. Population from Maddison (1995a) to 1990; 1990-5 from OECD *National Accounts 1960-1995*, Vol.1, Paris 1997. It was assumed that the 1995-6 population change was proportionately the same as in 1994-5. The figures in this table are corrected to eliminate the effect of territorial change except for the 1973-96 movement for Germany (which reflects the addition of the new o-income Länder and East Berlin - see Table 2 above) and Russia 1973-96 (where the income fall is cushioned by the comparison of the higher income Russian republic figures for 1996 with the USSR average for 1973).

Table 10
Growth of GDP in Constant Prices
(annual average compound growth rates)

	1820-70	1870-1913	1913-50	1950-73	1973-96
Austria	1.4	2.4	0.2	5.3	2.3
Belgium	2.2	2.0	1.0	4.1	1.9
Denmark	1.9	2.7	2.6	3.8	1.9
Finland	1.6	2.7	2.7	4.9	2.1
France	1.3	1.6	1.1	5.0	2.1
Germany	2.0	2.8	1.1	6.0	2.0a
Italy	1.2	1.9	1.5	5.6	2.3
Netherlands	1.9	2.2	2.4	4.7	2.3
Norway	1.7	2.1	2.9	4.1	3.5
Sweden	1.6	2.2	2.7	3.7	1.5
Switzerland	n.a.	2.4	2.6	4.5	1.0
UK	2.0	1.9	1.3	2.9	1.8
<i>Arith. Average</i>	1.7	2.2	1.8	4.6	2.1
Greece	n.a.	n.a.	1.4	7.0	2.2
Ireland	0.7	0.5	0.4	3.2	4.6
Portugal	n.a.	1.3	2.2	5.7	2.7
Spain	1.1	1.7	1.0	6.8	2.3
<i>Arith. Average</i>	0.9	1.2	1.3	5.7	3.0
USA	4.2	3.9	2.8	3.9	2.5
Japan	0.3	2.3	2.2	9.2	3.2

a) Figure would be 2.5 if acquisition of the new Länder and East Berlin were included.

Source: Maddison (1995a), Appendix B, pp.148-53 updated to 1995 from OECD, *National Accounts 1960-1995*, vol.1, Paris, 1997, with estimates for the 1995-96 volume change from OECD, *Economic Outlook*, June 1997. The figures are adjusted to eliminate the effect of frontier change.

Table 11
Growth of Labour Productivity
(annual average compound growth rates)

	1870-1913	1913-50	1950-73	1973-96
Austria	1.7	0.9	5.9	2.1
Belgium	1.2	1.4	4.5	2.6
Denmark	1.9	1.5	4.5	2.0
Finland	1.8	2.2	5.4	2.4
France	1.7	1.9	5.1	2.4
Germany	1.9	0.6	6.0	1.9
Italy	1.7	2.0	5.8	2.3
Netherlands	1.3	1.3	4.8	1.8
Norway	1.6	2.5	4.2	3.1
Sweden	1.8	2.8	4.1	1.6
Switzerland	1.5	2.7	3.3	1.1
UK	1.2	1.6	3.1	2.2
<i>Arithmetic Average</i>	1.6	1.8	4.7	2.1
Greece	n.a.	n.a.	6.4	2.0
Ireland	n.a.	n.a.	4.3	4.1
Portugal	n.a.	n.a.	6.0	2.2
Spain	n.a.	n.a.	6.4	3.0
<i>Arithmetic Average</i>	n.a.	n.a.	5.8	2.8
USA	1.9	2.4	2.7	1.2
Japan	1.9	1.9	7.7	2.6

Source: Derived from Table 6.

Table 12
Growth in Volume of Merchandise Exports
(annual average compound growth rates)

	1820-70	1870-1913	1913-50	1950-73	1973-96
Austria	4.5	3.5	-3.0	10.7	6.4
Belgium	5.4a	4.2	0.3	9.2	4.2
Denmark	1.9b	3.3	2.4	6.9	4.3
Finland	n.a.	3.9	1.9	7.2	4.0
France	4.0	2.8	1.1	8.2	4.4
Germany	4.8c	4.1	-2.8	12.4	3.9
Italy	3.4	2.2	0.6	11.6	5.5
Netherlands	n.a.	2.3d	1.5	10.4	3.8
Norway	n.a.	3.2	2.7	7.3	7.0
Sweden	7.0e	3.1	2.8	6.9	4.2
Switzerland	4.1	3.9	0.3	8.1	2.6
UK	4.9	2.8	0.0	3.9	5.3
<i>Arith. Average</i>	4.4	3.2	0.7	8.6	4.6
Greece	n.a.	n.a.	n.a.	11.9	5.9
Ireland	n.a.	n.a.	n.a.	6.8	9.9
Portugal	n.a.	n.a.	n.a.	5.7	8.3
Spain	3.7f	3.5	-1.6	9.2	8.9
<i>Arith. Average</i>	3.7	3.5	-1.6	8.4	8.3
USA	4.7	4.9	2.2	6.3	5.6
Japan	n.a.	8.5	2.0	15.4	5.3

- a) 1831-70;
b) 1844-70;
c) 1840-70;
d) 1872-1913;
e) 1851-70;
f) 1826-70.

Source: Maddison (1995a), pp.74 and 236 updated from 1992 to 1996 from OECD, *Economic Outlook*, June 1997, Annex Table 39. The figures are not adjusted to exclude the impact of frontier changes.

Table 13
Ratio of Merchandise Exports to GDP 1913-96

	1913	1950	1973	1995	1913	1950	1973	1996
	(at current market prices)				(at 1990 prices)			
Austria	8.2	12.6	19.0	21.3a	8.5	5.2	16.2	39.8
Belgium- Luxembourg (b)	50.9	20.3	47.5	59.4	23.1	16.9	51.0	84.2
Denmark	26.9	21.3	21.9	28.3	13.3	12.5	24.6	41.9
Finland	25.2	16.6	20.5	31.6	25.7	19.2	31.1	47.7
France	13.9	10.6	14.5	18.6	8.2	7.7	15.4	26.5
Germany	17.5	8.5	19.7	21.7	15.6	6.2	23.8	32.7
Italy	12.0	7.0	13.4	21.9	5.0	3.6	12.8	25.9
Netherlands	38.2	26.9	36.8	49.5	19.0	12.5	41.7	59.0
Norway	22.7	18.2	22.2	28.6	14.1	13.1	26.5	56.4
Sweden	20.8	17.8	23.2	34.7	15.3	15.6	31.4	56.2
Switzerland	31.4	20.0	23.2	25.5	35.3	15.5	33.7	48.6
UK	20.9	14.4	16.3	22.0	17.7	11.4	14.0	30.8
<i>Arith. Average</i>	24.1	16.2	23.2	30.3	16.7	11.6	26.9	45.8
Greece	n.a.	4.2	7.4	9.5a	n.a.	0.9	4.7	10.6
Ireland	n.a.	18.6	30.8	68.7	n.a.	11.5	22.2	83.8
Portugal	n.a.	13.3	14.1	22.7	n.a.	5.8	5.7	19.6
Spain	n.a.	1.2	5.4	16.4	n.a.	3.0	5.0	20.9
<i>Arith. Average</i>	n.a.	9.3	14.4	29.3	n.a.	5.3	9.4	33.7
USA	6.0	3.6	8.0	9.0	3.7	3.0	5.0	9.7
Japan	12.3	4.7	8.9	8.0	2.4	2.3	7.9	12.5

a) 1994;

b) Belgium-Luxembourg have reported combined exports since their 1922 customs union.

Source: First 2 columns from Maddison (1991) p.326 except for the periphery countries which are from OECD sources; third and fourth columns from IMF, *International Financial Statistics* and OECD *National Accounts*. Columns 5-8 derived from sources cited in Table 11 for exports at 1990 constant prices and exchange rates; the denominator is GDP in 1990 international dollars, using the Geary Khamis PPP converters. The 2 sets of ratios differ from each other for two reasons: a) export prices have risen less over the long run than GDP deflators, so current price ratios understate the change in relative volumes; b) in 1990 the purchasing power of currencies was lower than the exchange rate against the dollar in all the European countries except Greece and Portugal; this raises the ratios on the right hand side for 14 of the 16 European countries and Japan.

Table 14
Unemployment as a Percentage of the Labour Force, 1920-96

	1920-29	1930-38	1950-73	1974-83	1984-95	1996
Austria	6.0a	12.8	2.6	2.3	5.0	6.2
Belgium	1.5b	7.9	3.0	8.2	11.3	12.9
Denmark	8.1	10.9	2.6	7.6	9.9	8.8
Finland	1.6	3.7	1.7	4.7	8.9	16.3
France	1.7c	3.5d	2.0	5.7	10.4	12.4
Germany	3.9	7.9	2.5	4.1	7.9	10.3
Italy	1.7e	4.8f	5.5	7.2	9.8	12.1
Netherlands	2.3	7.8	2.2	7.3	7.4	6.7
Norway	5.6b	7.3	1.9	2.1	4.2	4.9
Sweden	3.2	5.0	1.8	2.3	4.0	8.0
Switzerland	0.4e	2.7	0.0	0.4	1.8	4.7
UK	7.5	10.4	2.8	7.0	9.0	7.4
<i>Arith. Average</i>	3.6	7.1	2.4	4.9	7.5	9.2
Greece	n.a.	n.a.	4.6g	3.2	8.2	10.4
Ireland	n.a.	n.a.	5.2g	8.8	15.3	11.3
Portugal	n.a.	n.a.	2.4g	6.5	6.4	7.3
Spain	n.a.	n.a.	2.9g	9.1	20.1	22.7
<i>Arith. Average</i>	n.a.	n.a.	3.6g	6.9	12.5	12.9
USA	4.8	18.2	4.6	7.4	6.4	5.4

- a) 1924-9;
b) 1921-9;
c) average of 1921, 1926 and 1929;
d) average of 1931, 1936 and 1938;
e) 1929 only;
f) 1935-6 not available;
g) 1960-73.

Source: First 12 countries 1920-73 from Maddison (1991) Appendix C; 1974-83 from OECD, *Labour Force Statistics*; 1984-96 from OECD, *Economic Outlook*, June 1997, Annex Table 21. European periphery 1960-83 from OECD, *Labour Force Statistics*, 1984-96 from OECD, *Economic Outlook*, June 1997.

Table 15
Average Rates of Peacetime Change in Consumer Price Level, 1870-1996
(annual average compound growth rates)

	1870-1913	1920-38	1950-73	1973-83	1983-95	1996
Austria	0.1a	2.1b	4.6	6.0	3.0	1.9
Belgium	0.0	4.4c	2.9	8.1	2.8	2.1
Denmark	-0.2	-2.0	4.8	10.7	3.4	2.1
Finland	0.6	0.5	5.6	10.5	4.1	0.6
France	0.1	3.6	5.0	11.2	3.3	2.0
Germany	0.6	-0.1d	2.7	4.9	2.4	1.5
Italy	0.6	0.3	3.9	16.7	6.1	3.8
Netherlands	0.1	-2.9	4.1	6.5	1.9	2.1
Norway	0.6	-3.1	4.8	9.7	4.6	1.3
Sweden	0.5	-2.7	4.7	10.2	5.8	0.8
Switzerland	n.a.	-2.8	3.0	4.3	2.9	0.8
UK	-0.2	2.6	4.6	13.5	4.8	2.4
<i>Arith. Average</i>	0.2	-0.1	4.2	9.4	3.8	1.8
Greece			3.7	18.8	16.2	8.2
Ireland			4.3	15.7	3.6	1.7
Portugal			3.2	22.6	11.8	3.1
Spain			4.6	16.4	6.5	3.6
<i>Arith. Average</i>			4.0	18.4	9.5	4.2
USA	-0.6	-2.0	2.7	8.2	3.6	2.9
Bulgaria					33.1	311.0
Czechoslovakia					8.9	8.5
Hungary					17.1	20.9
Poland					62.5	19.4
Romania					44.1	57.0
USSR/Russia					99.2	22.0
<i>Arith. Average</i>					44.2	73.1

- a) 1874-1913;
b) 1923-38;
c) 1921-38;
d) 1924-38.

Source: 1870-1973 from Maddison (1991), p.174; 1973-83 from Maddison (1995a), p.84; 1983-96 from OECD, *Economic Outlook*, June 1997, Annex Table 16. East European countries 1983-93 GDP deflators generally from World Bank, *World Tables 1995*; 1994-5 from OECD, *Economic Outlook*, June 1997, Annex Table 14 for Czech Republic, Hungary and Poland and p.118 for Bulgaria, Romania and Russia. Czechoslovakia 1983-92 from IMF, *International Financial Statistics*, 1993 assumed to have shown the same increase as 1994.

Table 16
Average Government Fiscal Outcome as Percent of GDP

	1960-73	1974-81	1982-89	1990-95	1996
Austria		-2.0	-1.5	-3.5	-3.9
Belgium		-7.1	-8.9	-6.0	-3.4
Denmark		-1.4	-2.1	-2.6	-1.6
Finland		2.3	3.0	-3.5	-2.6
France	0.5	-0.9	-2.4	-3.9	-4.2
Germany	0.6	-3.1	-1.7	-3.0	-3.8
Italy		-11.3	-11.2	-9.9	-6.7
Netherlands	-0.5	-2.8	-5.2	-3.8	-2.4
Norway		2.9	4.7	0.6	5.9
Sweden		-0.2	-0.9	-5.8	-3.6
UK	-0.8	-3.9	-1.7	-5.0	-4.4
<i>Arith. Average</i>	-0.1	-2.3	-2.3	-4.2	-2.8
Greece		n.a.	-9.9	-12.6	-7.4
Ireland		n.a.	-8.7	-2.3	-0.9
Portugal		n.a.	-6.3	-5.6	-4.0
Spain		-1.8	-4.7	-5.3	-4.5
<i>Arith. Average</i>		n.a.	-7.4	-6.5	-4.2

Source: General government financial balances from OECD, *Economic Outlook*, June 1997, Annex Table 30 for 1979-96, earlier issues for 1978-81. 1960-73 from Maddison (1991), p.183.

Table 17
Long Term Bond Yields in Real Terms

	1960-73	1974-81	1982-89	1990-96
Austria	n.a.	3.00	4.08	4.43
Belgium	2.41	2.95	5.65	5.25
Denmark	1.15	5.20	7.30	6.33
France	1.64	0.00	5.37	5.91
Germany	3.72	3.51	4.83	4.13
Italy	1.32	-2.43	4.94	6.15
Netherlands	1.09	2.47	5.54	5.29
Sweden	1.36	-0.14	4.71	5.98
UK	2.52	-1.20	4.60	4.77
<i>Arithmetic Average</i>	1.90	1.48	5.22	5.36
USA	1.45	1.37	5.82	4.04

Source: Nominal bond yields, 1960-81 from IMF, *International Financial Statistics*; 1982-95 from OECD, *Economic Outlook*, June 1996 for 1982-9, 1990-6 from June 1997 issue, Annex Table 36. GDP deflators from OECD, *National Accounts*, various issues and OECD, *Economic Outlook*, June 1997, Annex Table 14.

Table 18
General Government Financial Liabilities, Gross and Net, 1982-96
(percent of GDP)

	Net Liabilities			Gross Liabilities		
	1982	1990	1996	1982	1990	1996
Austria	23.3	38.6	50.5	41.8	58.3	69.8
Belgium	93.1	120.1	127.4	102.5	129.7	130.1
Denmark	38.1	34.0	46.2	67.0	68.0	74.8
Finland	-28.1	-36.1	-7.8	16.9	16.9	61.4
France	2.1	16.3	39.3	34.2	40.2	63.0
Germany	16.3	20.7	48.1	39.0	45.5	64.9
Italy	62.3	84.4	111.7	65.3	104.5	125.2
Netherlands	30.9	36.9	47.6	56.5	78.8	78.5
Norway	-4.3	-32.4	-27.6	38.4	32.5	40.1
Sweden	4.2	-8.1	26.2	61.7	44.3	79.8
UK	37.3	18.8	44.2	53.2	39.3	61.3
<i>Arith. Average</i>	25.0	26.7	46.0	52.4	59.8	77.2
Greece	n.a.	n.a.	n.a.	29.8	90.1	111.9
Ireland	n.a.	n.a.	n.a.	83.3	96.3	76.5
Portugal	n.a.	n.a.	n.a.	44.3	65.2	67.6
Spain	13.0	31.7	52.9	30.4	50.3	74.6
<i>Arith. Average</i>	n.a.	n.a.	n.a.	47.0	75.5	82.7

Source: OECD, *Economic Outlook*, June 1997, Tables 34 and 35.

Table 19
Net Receipts from EC Budget in 1991 as Percent of GDP

Ireland	6.43	Belgium	0.29
Greece	4.18	UK	-0.08
Portugal	2.43	Italy	-0.14
Luxembourg	1.82	Netherlands	-0.23
Spain	0.49	France	-0.25
Denmark	0.33	Germany	-0.63

Source: Artis and Lee (1994), p.381 for Community expenditure. Country contributions to EC budget from UK White Paper, *Statement on the 1994 Community Budget*, HMSO, March 1994. GDP from OECD, *National Accounts 1960-94* with dollars converted at 1.2405 to the ECU from IMF, *International Financial Statistics*. In 1991 about 59 per cent of disbursements went to agriculture, about 30 per cent to structural operations and internal policies, about 4.4 per cent for foreign aid, and 7.2 per cent for administration and reserves.

Table 20
Agricultural Transfer Payments, 1993

	Total Transfers per Full-time Farmer Equivalent US \$	Agricultural Transfers as Percent of GDP
European Community (12 countries)	15,400	1.8
Austria	17,000	2.3
Finland	24,200	3.9
Norway	38,900	3.5
Sweden	24,500	1.1
Switzerland	29,600	2.4
USA	34,700	1.4
Japan	23,200	1.6
Australia	2,900	0.4
New Zealand	1,000	0.3

Source: OECD (1994) pp.124-5. These sums represent 'producer subsidy equivalents', calculated by a complex standardisation procedure intended to provide a comprehensive tally of all elements of subsidy in comparable form across countries.

Table 21
Votes in EU Council of Ministers 1996

	Votes	Population (000s)	Inhabitants Per Vote (thousands)
Austria	4	8,063	2,016
Belgium	5	10,158	2,032
Denmark	3	5,251	1,750
Finland	3	5,128	1,670
France	10	58,387	5,839
Germany	10	81,902	8,190
Greece	5	10,482	2,096
Ireland	3	3,593	1,198
Italy	10	57,348	5,735
Luxembourg	2	416	208
Netherlands	5	15,518	3,104
Portugal	5	9,930	1,986
Spain	8	39,270	4,909
Sweden	4	8,893	2,223
UK	10	58,832	5,893
Total	87	373,171	4,289

Source: Votes from *The Economist*, 3.3.96, p.25. Population from Table 1 above.

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