

## VIII. POLICY INFLUENCES ON FOREIGN DIRECT INVESTMENT

### Introduction and summary

*Structural policies can influence foreign direct investment patterns*

Structural policies play an important role in determining foreign direct investment (FDI) in the OECD area. The Uruguay trade round, regional trade agreements and bilateral and multilateral investment accords have reduced direct barriers to FDI, and the current WTO trade negotiations aim at continuing this trend. However, restrictions to FDI are still significant in some countries and industries (see preceding Chapter). At the same time, there is growing recognition that labour market policies and product market regulations may have a significant indirect impact on the activities of multinational enterprises (MNEs).<sup>1</sup>

*This chapter suggests that...*

This chapter aims at identifying policy influences on bilateral and overall FDI patterns in the OECD area. It considers both explicit trade and FDI restrictions and domestic regulations that affect competition and labour market adaptability. On the basis of the results obtained in this analysis, the effects on FDI of policies aimed at further increasing border openness and easing domestic product and labour market regulations are then explored. The main findings are as follows:

*... foreign direct investment is hampered by trade and FDI restrictions...*

- FDI restrictions and, to a lesser extent, tariff barriers are estimated to curb significantly FDI stocks in protected countries. Limits to foreign ownership and governance discourage the activity of foreign affiliates, especially in some important non-manufacturing industries such as electricity, transport and telecoms. Therefore, progress towards reducing remaining border barriers, as has been proposed in the ongoing Doha trade round, would favour closer economic integration among OECD economies.

*... as well as by some product and labour market policies...*

- Restrictive product- and labour-market regulations can also act as barriers to FDI. Countries where domestic product-market regulations impose unnecessary costs on businesses and create barriers to entry tend to have lower stocks of foreign capital. Similarly, strict employment protection legislation (EPL) and high labour income taxation also seem to lower inward FDI positions.

*... and that it could be raised significantly by*

- The alignment of FDI restrictions and product market regulations on those of the most liberal country could significantly increase the

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1. The taxation of foreign affiliates' income is also likely to be an important determinant of FDI. This issue is scheduled to be addressed in a later issue of the Economic Outlook.

*reforms in these areas*

total OECD-wide inward FDI position, with gains for individual countries proportional to the extent of current restrictions. Substantial gains could also be obtained by further structural reforms in OECD labour markets.

### **Policy and other determinants of foreign direct investment**

*Non-policy factors only partially explain OECD patterns of FDI ...*

Recent OECD analysis (Box VIII.1) suggests that differences in bilateral FDI positions across Member countries are explained about equally by policy and non-policy factors (Figure VIII.1). Among the latter, transport and/or communication costs tend to deter FDI between distant countries,<sup>2</sup> while such investment tends to increase with the combined market size of partner countries, because its returns partly depend on the possibility to reap economies of scale. Differences in the supply of physical and human capital also affect bilateral FDI patterns because they influence relative production costs across countries.<sup>3</sup>

#### **Box VIII.1. Policies and FDI: the OECD empirical analysis**

The OECD has analysed the effects of policies on FDI using a large data set that covers bilateral FDI relationships between 28 OECD countries over the past two decades. The focus was on three sets of policies: explicit restrictions to trade and FDI; regulations affecting domestic competition; and policies that affect labour costs and the adaptability of labour markets. OECD countries' policies in labour and product markets were proxied by policy indicators described in OECD (1999; 2001). These were supplemented by indicators of non-tariff barriers (OECD, 1997), new indicators of tariffs (Bouet *et al.*, 2001) and FDI restrictions (see Chapter VII). The analysis relating policies to FDI controlled for a large number of non-policy-related factors, including geographical distance, market size, transport costs, differences in the availability of physical and human capital, and other country- and period-specific effects, including cross-country differences in cyclical positions.<sup>1</sup>

The results of the empirical analysis can be used to quantify the long-run effects of policies that remove direct and indirect impediments to FDI on OECD-wide FDI integration and individual countries' FDI positions. In practice, this is done using the estimated coefficients of policy variables to project the impact of changes in policies on FDI. The results of these simulations are only suggestive of what could happen under different policy scenarios, notably because the applied coefficients may be imprecise due to the difficulty of disentangling the pure effects of policy and non-policy factors in the empirical analysis. Moreover, the estimated models on which the simulations are based do not account for all possible interactions between policy changes and FDI flows among OECD countries. The quantitative effects highlighted in these simulations also partly depend on the configuration of policies and the distribution of FDI positions in the baseline scenario. Details on sources, methodologies and results can be found in Nicoletti *et al.* (2003).

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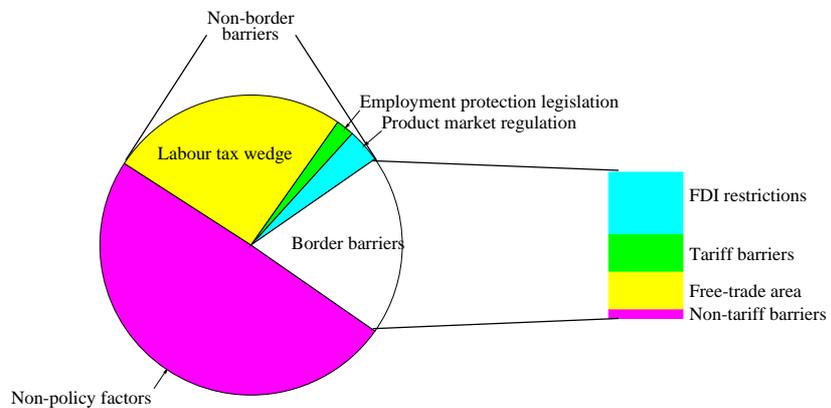
1. FDI can also be affected by strategic considerations related to expected developments in the behaviour of markets and other investors. These effects could not be accounted for in the analysis.

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2. Transport costs may affect the returns to FDI to the extent that it is aimed at re-exporting goods produced abroad back to the home country.
  3. The positive influence of dissimilarities in factor proportions on FDI aimed at fragmenting production into different stages is emphasised in Helpman (1984) and Helpman and Krugman (1985). On the other hand, FDI aimed at producing finished goods in local markets generally requires factor proportions to be similar (Markusen, 2002).

*... the rest being explained by differences in policies*

The most important policy effects on bilateral FDI patterns seem to come from border policies and labour market arrangements. Detailed analysis shows that the contribution of border policies is equally split between the impact of FDI restrictions and other openness factors, such as participation in free-trade areas and tariff and non-tariff barriers. The labour tax wedge is the most influential component of labour market arrangements, with EPL playing a lesser role. Finally, anti-competitive product market regulations were found to explain a smaller but still significant part of the deviations of inward FDI positions from the OECD average.<sup>4</sup>

**Figure VIII.1. Contributions of policies and other factors to explaining cross-country differences in bilateral outward FDI positions, 1980-2000<sup>1, 2</sup>**



1. The contributions are based on coefficients estimated in panel regressions of bilateral outward FDI positions on non-policy factors (distance, transport costs, market size, similarity in size and factor endowments, and other country and time-specific effects) and policy influences (FDI restrictions, tariff and non-tariff barriers, participation in free trade areas, and product and labour market arrangements). The regressions cover bilateral FDI positions between 28 OECD countries over the 1980-2000 period.  
 2. To compute the contributions, the absolute values of the deviations of the bilateral outward FDI positions from the OECD average, explained by each of the policy and non-policy factors, are averaged over the 1980-2000 period and summed over countries. These sums are then expressed as a percentage of the sum (over countries) of the period averages of the overall deviations of bilateral outward FDI positions from the OECD average.  
 Source: OECD.

**Foreign direct investment thrives in free trade areas...**

The OECD analysis suggests that free-trade areas tend, on balance, to encourage FDI both among signatory countries and, in areas that are closely integrated, also with respect to third-party countries. By enlarging the overall size of the market, these agreements tend to increase the scope for reaping economies of scale through FDI aimed at accessing local markets (so-called “horizontal” FDI) for both signatory and non-signatory countries.<sup>5</sup> Moreover, the reduction in trade costs tends to

4. Policies can also affect FDI indirectly, through their effect on factor proportions, for example by improving the quality of a country’s infrastructure capital or the skills of its labour force.  
 5. This could partly explain the wave of within EU mergers and acquisitions that followed the Single Market Programme.

increase FDI flows that are aimed at re-exporting final or intermediate products into the home country or into other signatory countries (so-called “vertical” FDI).<sup>6</sup> These positive influences on FDI appear to outweigh the tendency of free-trade areas to lower the relative cost of supplying a foreign market via trade compared with local production, which would in principle depress FDI flows.

The European Union appears to have prompted particularly strong FDI responses among its members, perhaps due to the much closer integration in the EU single market than in other free-trade areas (such as NAFTA).<sup>7</sup> For countries that will join the European Union in 2004 FDI effects could be sizeable, with outward and inward FDI positions estimated to double relative to their average levels in the 1990s in some of these countries.<sup>8</sup>

*... reacting positively to both low tariffs and investment restrictions...*

Outside free-trade areas, OECD estimates suggest that tariff barriers between the host and investor country or between the host and third-party countries discourage foreign investment. This reflects the costs that tariffs impose on re-importing to the home country, or exporting to third-party countries, the final or intermediate goods produced by foreign affiliates.<sup>9</sup> Furthermore, as discussed in Chapter VII, FDI restrictions often set limits on investment by foreign companies, as well as on management and organisational choices of foreign affiliates in the host country.

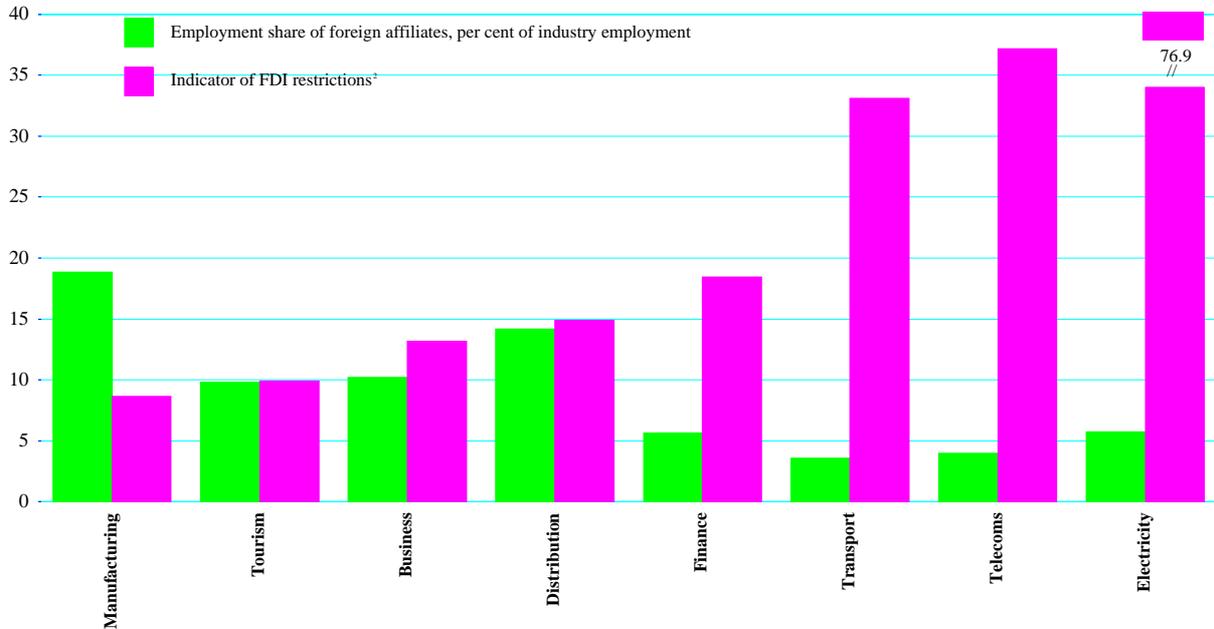
*... which encourage the activity of foreign affiliates*

The increase in investment flows resulting from lower FDI restrictions would translate into an expansion of the activities of foreign affiliates in the affected industries. While the industry distribution of FDI in OECD economies can be influenced by a number of policy and non-policy factors, on average, the presence of foreign affiliates (measured by their sectoral employment shares) is currently much larger in industries where FDI restrictions are relatively low, such as manufacturing and some competitive services (*e.g.* distribution, tourism and business services) (Figure VIII.2). Where barriers have been traditionally high and

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6. More precisely, horizontal FDI flows to foreign affiliates that replicate the production of some of the same goods and services in both the home and host countries, while vertical FDI fragments the production of a good or service into stages located in different countries.
  7. The finding that FDI is boosted by EU membership is consistent with related evidence by Pain (1997) and Pain and Lansbury (1997). Positive effects of EU membership on FDI from third-party countries were also found by Dunning (1997) and Barrell and Pain (1998). The lack of these effects in other free trade areas can partly be explained by higher average tariffs and stricter rules of origin.
  8. The gains are due to both increased transactions with other EU countries and (to a lesser extent) increased trade and investment flows from non-EU countries. However, these results are likely to overestimate the actual post-accession gains to the extent that FDI stocks have already been affected by the expectation of EU membership.
  9. On the other hand, high bilateral tariffs can generate so-called “tariff-jumping” behaviour by MNEs, aimed at bypassing border barriers by producing locally. The same kind of relationship could *a fortiori* be expected between horizontal FDI and non-tariff barriers, since the latter often raise absolute barriers to market access (*e.g.* quantitative restrictions). Indeed, empirical estimates suggest that, on average, non-tariff barriers have a positive effect on incoming FDI in OECD countries, while tariffs have a negative effect at the aggregate level, suggesting that the “tariff jumping” motive is weak.

widespread, such as in finance and especially network industries, the activity of foreign affiliates is still weak.

**Figure VIII.2. Foreign affiliates' activities and FDI restrictions in selected industries'  
OECD average**



1. For this figure, the indicator ranges from 0 (least restrictive) to 100 (most restrictive).  
2. See Chapter VII in this issue.  
Source: OECD.

***Foreign direct investment can be deterred by labour market policies...***

OECD empirical results suggest that labour market arrangements can influence the cross-country patterns of FDI as strongly as direct restrictions to trade and FDI. These arrangements are generally driven by policy objectives that are unrelated to FDI, but they have important side effects on the level and geographical allocation of FDI flows. Strict employment protection legislation and, especially, high labour tax wedges appear to divert FDI to locations where labour market arrangements are perceived as less costly. These results would seem to imply that, on average, the costs of job protection and labour taxation are not fully shifted onto lower (after-tax) wages.<sup>10</sup> The negative effects of strict employment protection legislation on inward FDI may also be due to the fact that this legislation is likely to affect not only the returns expected from foreign investment but also their variability (*e.g.* by influencing the capacity of foreign affiliates to respond to supply or demand shocks), thereby

10. In principle, higher non-wage labour costs should lead to a compensating reduction in wages in the longer term, the initial increase in total labour costs depressing labour demand and wages responding to the induced increase in unemployment. However, if wages are not downward flexible due to institutional rigidities (such as statutory or bargained wage flows or the workings of tax/benefit systems), the shifting of non-wage costs onto wages may be only partial, in which case labour will bear the cost in the form of higher unemployment.

increasing the risk that investors face in the host country.<sup>11</sup> Also, cost shifting in the face of high labour-income taxation may be particularly difficult for MNEs, whose employees have a higher cross-country mobility, especially at the highly-skilled and managerial levels.

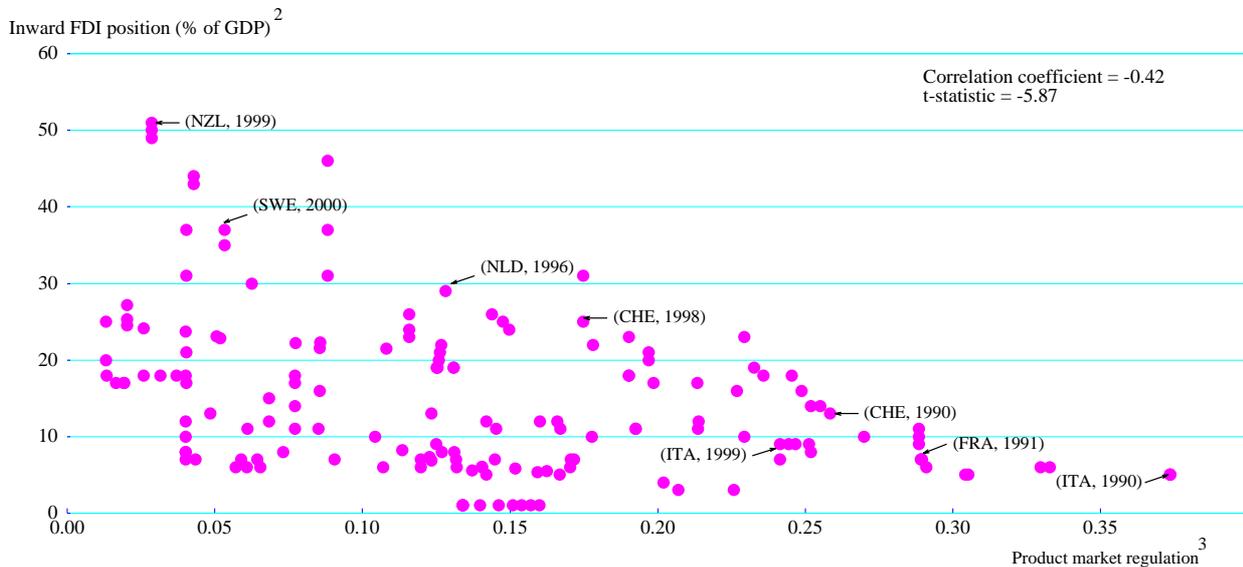
Labour market arrangements in the home country can also affect, in conflicting ways, the amount of outward FDI by resident MNEs. On the one hand, MNEs may have incentives to localise production in other countries, where labour market rules and taxation are less stringent. On the other hand, strict provisions may prevent firms from doing so, by hindering their potential for reorganising production or growing in size. OECD estimates suggest that the latter effect dominates, with strict labour market arrangements at home curbing outward FDI as well.

*... as well as by a lack of competition in product markets*

Product market regulations can raise production costs or entry barriers for MNEs both at home and in host country markets. Such regulation generally does not discriminate between local and foreign firms, but it has distorting effects on FDI flows because it affects market access and the relative rates of return expected from investing in different locations. As shown in Figure VIII.3, there appears to be an inverse relationship between the strictness of regulations and inward positions.<sup>12</sup> Indeed, detailed empirical analysis suggests that regulations that curb competition or impose unnecessary costs on the firms involved in bilateral FDI transactions make the host country less attractive for international investors located in countries where regulations are laxer. Thus, the deterring influence of barriers to entry and cost-increasing regulations appears to outweigh other potential effects, such as the incentives that lack of competition in the host country may create for FDI aimed at acquiring (or merging foreign parents with) local firms endowed with market power.

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11. Since MNEs can choose *ex ante* where to locate their investment, they may still tend to move where the risk/return ratio is lowest. It is also possible that foreign investors may find the implications of restrictive EPL provisions more difficult to ascertain than domestic investors (due to an asymmetry of information) and hence face higher costs.
  12. While regulations that bar entry or raise costs may deter FDI, regulations that are aimed at protecting intellectual property rights (IPR) may increase the attractiveness of the host country for international investors because protection of IPR makes it more difficult to imitate their firm-specific knowledge assets (*e.g.* through the movement of managers or employees from the foreign affiliate to local firms). See Smith (2001) and OECD (2002).

**Figure VIII.3. Product market regulation and FDI positions, 1990-1998**<sup>1</sup>



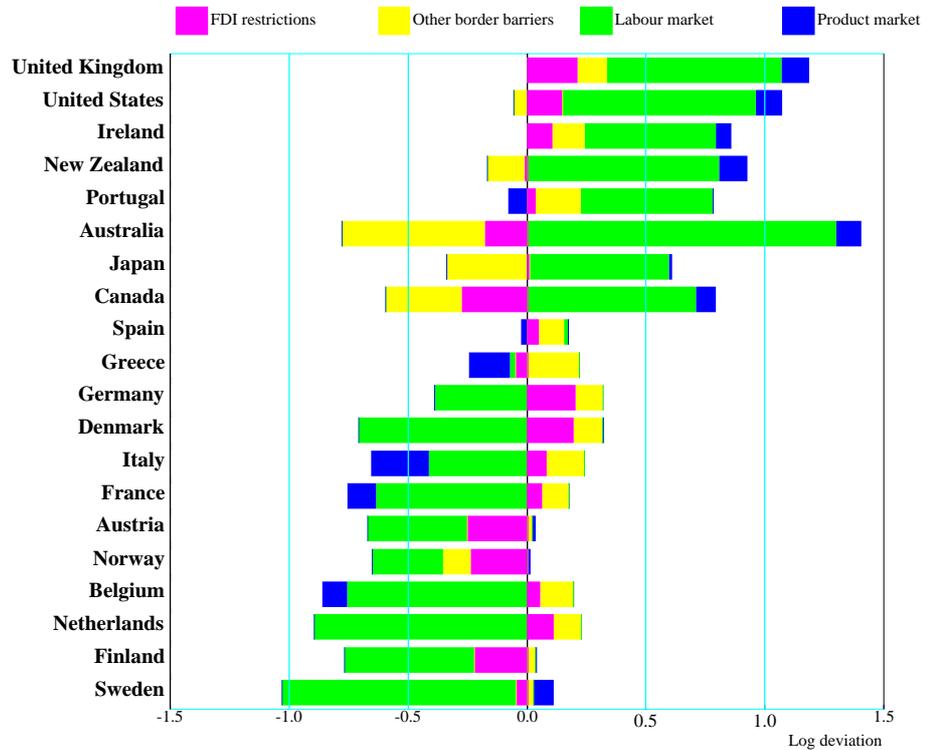
1. Each point shows the combination of regulation and FDI in a given country and period. Some of these country/period combinations are shown for illustrative purposes.
  2. The data on the vertical axis are the percentage shares in GDP of inward FDI positions of OECD countries in each year. The data on the horizontal axis are the levels of regulation in OECD countries in each year.
  3. Product of the indicator of economy-wide regulation in 1998 and the indicator of barriers to entry in seven non-manufacturing industries over the 1980-1998 period. 0-1 scale from least to most restrictive of competition.
- Source: OECD.

### Foreign direct investment effects of policy reform

***Policy reforms have increased inward FDI in several countries***

OECD analysis suggests that, relative to the OECD average, policy influences on FDI appear to have played different roles in different countries over the past two decades (Figure VIII.4). For instance, while labour market arrangements seem to have had a relatively positive influence on inward FDI positions in English-speaking countries, Japan and Portugal, they have tended to depress them in other European countries. Similarly, while in most European countries and the United States openness factors are estimated to have played a positive role, comparatively restrictive border measures are likely to have depressed inward FDI positions relative to the OECD average in Canada, Australia and, to a lesser extent, Japan, Norway and Finland. On the basis of the analysis discussed above, the contribution of product market regulation was significant for countries having either a relatively liberal approach (the United States, the United Kingdom, Australia, New Zealand, Canada, Sweden and Ireland), where it pushed up relative inward FDI positions, or a relatively restrictive approach (some continental European countries), where it pulled down relative inward FDI positions.

**Figure VIII.4. Policies and inward FDI positions<sup>1</sup>**  
**Contributions to explaining the deviations from OECD average, 1980-2000<sup>2</sup>**



1. 'Other border barriers' contains the contribution of tariff and non-tariff barriers and of membership in a free-trade area. 'Labour market' contains the contributions of the relative indicator of the tax wedge on labour income and of the relative indicator of employment protection legislation. 'Product market' contains the contribution of the relative level of barriers to entry.

2. The contributions are based on coefficients estimated in panel regressions of bilateral outward FDI positions on non-policy factors (distance, transport costs, market size, similarity in size and factor endowments, and other country and time-specific effects) and policy influences (FDI restrictions, tariff and non-tariff barriers, participation in free trade areas, and product and labour market arrangements). The regressions cover bilateral FDI positions between 28 OECD countries over the 1980-2000 period.

Source: OECD.

***Lifting border restrictions would increase FDI...***

While trade and FDI liberalisation have been extensive over the past two decades, further opening up borders would increase FDI integration among OECD countries. For instance, the average effect of lifting such restrictions can be substantial, with particularly strong increases in FDI to be obtained from the removal of foreign equity ceilings (Table VIII.1). Also, based on the estimates discussed above, an OECD-wide alignment of remaining FDI restrictions on those of the least restrictive OECD country (the United Kingdom, according to the indicator presented in Chapter VII) might increase OECD-wide inward FDI positions by almost 20 per cent (Figure VIII.5, panel A). This scenario implies country-specific reforms that differ in content and scope depending on the patterns of FDI restrictions in place, but typically they would imply lifting screening requirements and restrictions on foreign shareholdings, and substantially reducing other restrictions (e.g. on the nationality of

management, board composition and movement of people). In the liberalisation scenario, relatively restrictive countries could increase their inward FDI positions by between 40 and 80 per cent, but even in countries that are estimated to be already relatively open the gains could amount to around 20 per cent of their initial inward position.<sup>13</sup> While these results illustrate the potential consequences of liberalisation for FDI, the scenario obviously does not address the issue of whether and how to deal with the policy objectives currently being pursued by FDI restrictions.

Table VIII.1. **FDI positions and flows: the hypothetical effect of removing FDI restrictions<sup>a</sup>**

*Average across countries*

	Per cent change in inward FDI position
Removal of foreign equity ceilings	77.9
Removal of approval and national interest tests	21.2
Easing of nationality requirements on management <sup>b</sup>	10.1

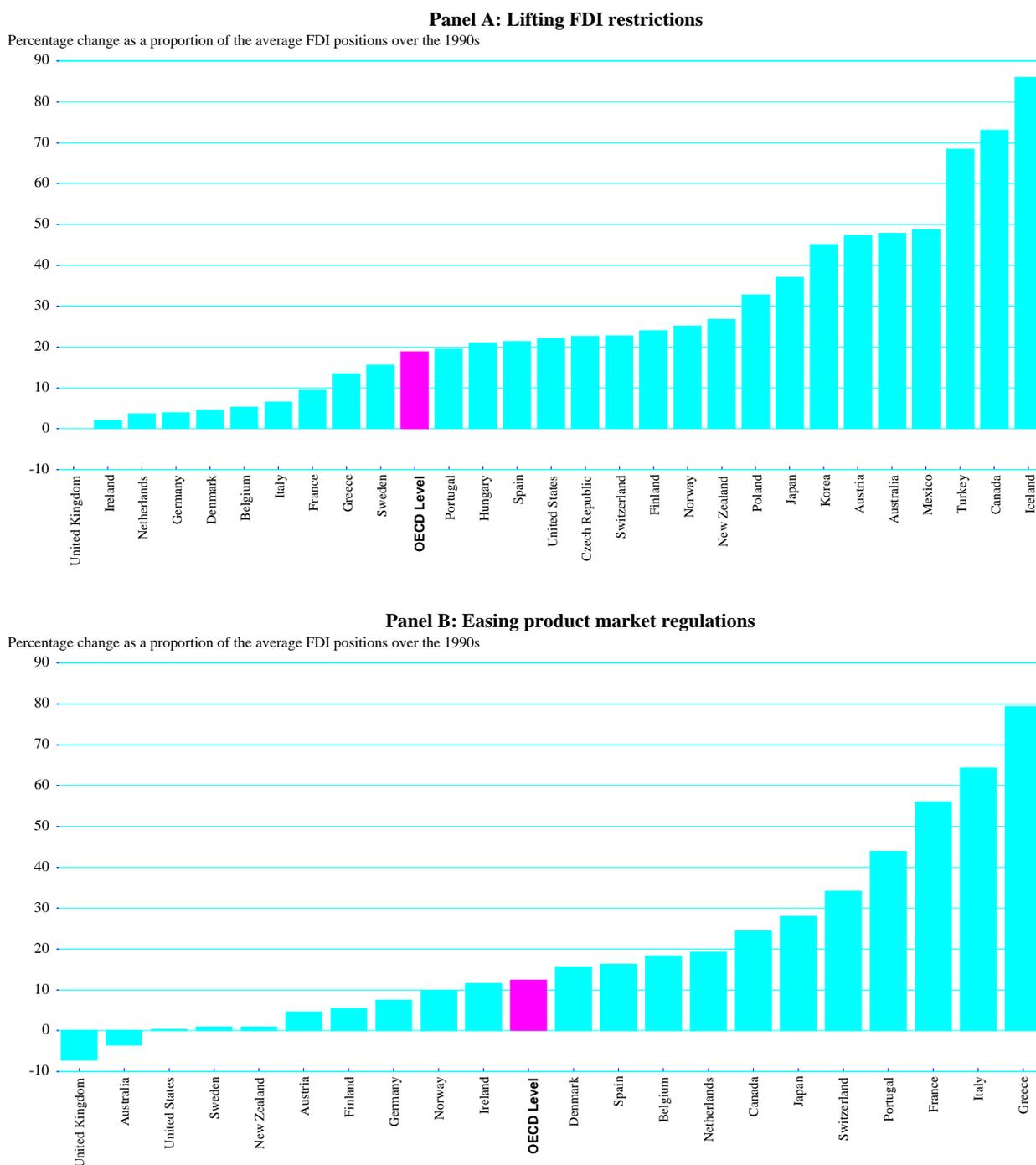
*a)* The simulations are based on coefficients estimated in panel regressions of bilateral outward FDI positions and flows on non-policy factors (distance, transport costs, market size, similarity in size and factor endowments, and other country and time-specific effects) and policy influences (FDI restrictions, tariff and non-tariff barriers, participation in free trade areas, and product and labour market arrangements). The regressions cover bilateral FDI relationships between 28 OECD countries over the 1980-2000 period.

*b)* From majority of domestic managers to only one or more domestic managers.

*Source:* OECD.

13. In the simulations, the initial stock is defined as the average instock over the 1990s.

**Figure VIII.5. Policies and inward FDI positions: the scope for further integration<sup>1</sup>**



1. The simulations are based on coefficients estimated in panel regressions of bilateral outward FDI positions on non-policy factors (distance, transport costs, market size, similarity in size and factor endowments, and other country and time-specific effects) and policy influences (FDI restrictions, tariff and non-tariff barriers, participation in free trade areas, and product and labour market arrangements). The regressions cover bilateral FDI positions between 28 OECD countries over the 1980-2000 period.

Source: OECD.

*... and easing product  
and labour market  
regulations*

As with the lifting of border restrictions, in many OECD countries policy reforms that reduce entry barriers and cost-increasing product and labour market arrangements would significantly boost area-wide FDI integration. For instance, domestic competition-oriented policies that result in an alignment of product-market regulations on those of the least restrictive OECD country are estimated to increase OECD-wide inward FDI positions by over 10 per cent relative to their average level in the 1990s (Figure VIII.5, panel B). Since bilateral outward positions are estimated to depend on the relative stringency of regulation in the home and host countries, relatively restrictive host countries -- such as Greece, Italy and France -- that receive FDI from relatively liberal countries could increase their FDI instocks by as much as 55 to 80 per cent through regulatory reform. Conversely, countries that are relatively liberal could see the relative attractiveness of their product markets either broadly unchanged (such as in the United States, New Zealand and Sweden) or even reduced (such as in the United Kingdom and Australia).

Structural reforms in labour markets may also increase FDI integration according to OECD estimates. Such policy scenarios are not easy to construct because the functioning of labour markets depends on a large number of interrelated factors, sometimes implying trade-offs between several of them (such as between social insurance and employment protection provisions), and no clear benchmarks exist for EPL and labour income taxation. Nonetheless, OECD analysis suggests, for instance, that an alignment of labour tax wedges to the OECD median value (38 per cent) in countries whose wedges are currently above this level could increase the OECD-wide inward FDI position by 5 per cent relative to baseline. This result presupposes that other taxes could be raised or public expenditures cut, so as to preserve sustainable public finances, without any impact on FDI positions.

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