

# **Overview of Adjustment Policies in Industrialized Countries**

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*Summary: Arguments for adjustment policies center on efficiency, equity and political economy considerations. The principal types of policies, targeted to individuals, firms or communities, are reviewed. A number of general issues relating to adjustment policies are identified.*

*“Capitalism... is by nature a form or method of economic change and not only never is but never can be stationary... (the) process of Creative Destruction is the essential fact about capitalism. It is what capitalism consists in and what every capitalist concern has got to live in.” Joseph A. Schumpeter, Capitalism, Socialism and Democracy.*

### 1. Introduction

As the above quotation from Schumpeter indicates, a continuous process of (often dramatic) change is an enduring characteristic of capitalist economies. Adam Smith in his seminal work – the Wealth of Nations – discusses the ability of market economies to adjust to major changes using the example of the British economy’s absorption of returning soldiers and sailors at the Napoleonic Wars in the early eighteenth century (Smith).

Among the forces creating the need for economic adjustment are changes in technology, demographics and consumer preferences. As the economies of industrial countries have become integrated more closely through the growth of international trade and investment – the process of “globalization” – the speed of change and the pressures for adjustment have intensified.

The aim of this paper is to provide an overview of the types of policies used by industrial countries to address economic adjustment. Specific issues relating to the use of such policies in the food and agricultural sector are identified.

### 2. Arguments for Adjustment Policies

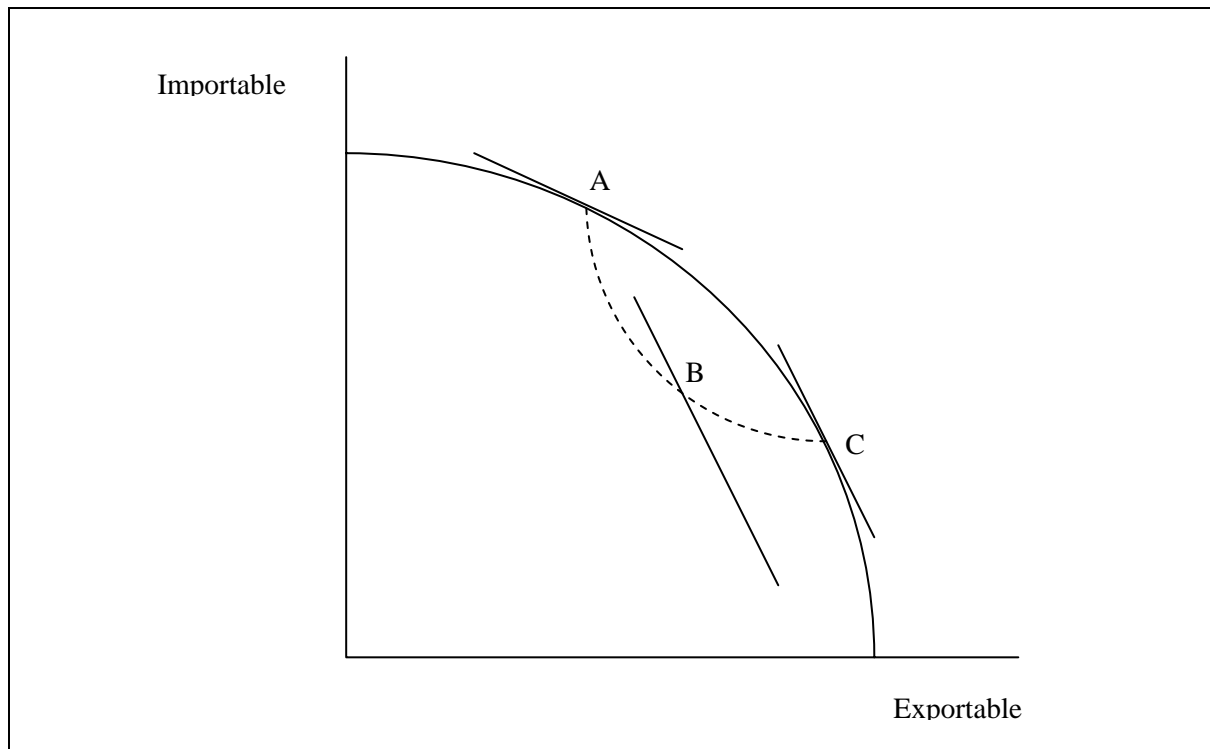
There has been a lively debate in the economics literature about the need for public policies to address economic change. The three areas on which the debate centered are: 1. economic efficiency; 2. equity; and 3. political economy.

#### 2.1 Efficiency

Neo-classical economic theory provides little justification for government action to facilitate adjustment to change. In a perfectly competitive economy, resources (land, labor and capital) will be reallocated rapidly in response to exogenous or endogenous changes in the scarcity or productivity of resources or in underlying determinants of final demand. Prices will adjust to maintain equilibrium in both factor and product markets. The impact on the well-being of individuals will be determined by endowments of productive assets, changes in wages and rental rates, and impact of changes in the price of outputs on consumption. The resulting distributional implications are a natural outcome of a process that leads to an overall increase in economic welfare. In the neo-classical economy, the role of the government is limited to ensuring that the rules of the game are followed by all economic agents so that market forces can achieve a welfare-maximizing reallocation of resources.

If we relax the assumptions that underlie the neo-classical model, in particular, the existence of perfect information and the frictionless reallocation of resources, adjustment costs may be incurred through output (and consumption) foregone as the economy moves from one equilibrium to another.

This is the case set out by Bhagwati with respect to an increase in import competition, as reflected by a decline in the relative price of importables to exportables. In the Bhagwati example, rather than moving instantly from an initial point on the production possibility frontier, denoted by A, to the new equilibrium, denoted by C, an adjustment path exists that passes through an interior point, denoted by B (figure 1). The shape of the adjustment path is determined by the inflexibilities in resource reallocation. The more severe these inflexibilities, the farther to the left the path of adjustment will extend, and the greater will be the output foregone in the transition from A to C.



**Figure 1 Adjustment When Resources are Not Perfectly Mobile**

The existence of adjustment costs in this case is not sufficient to justify a greater role for government. The output foregone during economic adjustment may be a normal and unavoidable consequence of change. The path of adjustment can be economically efficient, in that adjustment costs are minimized without public action (Mussa). To justify such action, it would be necessary to establish that some or all of the costs of adjustment are potentially avoidable – in terms of figure 1, that there exists a feasible alternative adjustment path within the production possibility frontier that lies to the right of the path shown. It was also necessary to show that there exists a feasible public intervention capable of moving the economy to the alternative adjustment path, and that the costs of this public intervention would be less than the resulting gain in economic welfare. Some economists argue that these necessary conditions rarely, if ever, apply (e.g., Banks and Tumlir).

A second line of reasoning for public intervention on efficiency grounds in the adjustment process applies if goods are produced that are either not priced at all or are incorrectly priced in the market place. This is the classic argument relating to market failure given the existence of public goods or externalities. In that case, a welfare-maximizing reallocation of resources may require public action to correct the market failure. Again, public action can only be justified if public intervention is efficient – i.e., the resulting increase in economic welfare exceeds the costs of the intervention.

A third and more complex situation applies when adjustment costs are created because of the existence of imperfect competition due to government action or inaction. Economists might argue that the appropriate “adjustment policy” in such a case would be to address the underlying distortion directly, rather than to use a secondary measure to try to offset the effects of the distortion. Some economists are highly skeptical about the use of secondary measures on second best grounds,

particularly on the basis of the alleged political infeasibility of adopting a first-best approach (Banks and Tumlir).

## 2.2 Equity

As indicated above, economic change is likely to have distributional implications due to its effects on factor and product prices in the presence of differences in factor endowments across individuals. The Pareto principle suggests that if change results in some individuals being made better off, while no one is made worse off, that change is unequivocally beneficial. In reality, economic change is likely to make some individuals better off and others worse off. In that case, economic theory would suggest that if the winners can potentially compensate the losers and still be better off, the change is beneficial. Whether or not gainers should actually compensate losers is a separate issue relating to judgments about equity. Societies differ in the degree to which they try to influence the distributional outcome of economic change, and to compensate the losers.

In most industrial societies there seems to be a general acceptance that individuals should not be left entirely on their own to absorb the losses that economic change can generate, although there are major differences in the amount of “social insurance” that societies are willing to provide. Support appears to be widespread for measures that help individuals to absorb the short-run impact of changes that are outside their control (unanticipated or exogenous changes). In many societies, there is also support for actions that help individuals adapt to the effects of changes in public policies. The greatest support in this area relates to the effects of changes in trade policies. Assistance can take various forms, for example, transfers to provide compensation for loss of income due to unemployment, whose basic aim is to allow the affected individuals to continue to enjoy a certain level of consumption. Measures may also be used to prepare individuals to increase their future income, e.g., by paying for retraining or providing financial assistance for relocation. Finally, measures may be used to compensate for reductions in wealth (reductions in asset values).

In some cases, adjustment measures may be directed to firms or communities rather than to individuals, although the ultimate beneficiaries of such measures are those who are involved with such firms as employees or shareholders, or who live and work in targeted communities.

## 2.3 Political Economy

The final set of arguments that may underlie adjustment policies relate to political necessity or expediency. Those who stand to lose from economic change may be a vocal minority who are able to wield influence on the political process. When the source of adjustment is clearly identifiable, for example a change in government policies, there may be general sympathy among voters to address the resulting adjustment issues. Political pressure from firms and workers in declining industries may be so great that measures may be necessary to provide compensation or to facilitate adjustment. Without such measures it may not prove politically feasible to implement a proposed change. Losers may seek to block change, thus preventing the realization of gains by others.

## 3. Types of Adjustment Policies

The three main categories of adjustment policies are those targeted to: 1. workers; 2. firms and 3. communities.<sup>1</sup>

### 3.1 Measures targeted to workers

A number of measures can be targeted to workers (wage or salary employees) who are affected by economic change. The principal categories of measures are:

1. unemployment compensation
2. retraining programs or benefits

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<sup>1</sup> A number of studies have been produced of the range of adjustment policies used by industrial countries. One example is OECD (1975).

3. job search and relocation benefits
4. severance payments and early retirement incentives.

Unemployment compensation typically involves the payment of some portion of the worker's previous salary or wages for a designated period of time. In order to be eligible for such payments workers typically have to pay some type of unemployment insurance during the period that they are employed. They may have to prove that their loss of employment was due to "involuntary" separation, i.e., was outside their control.

A basic problem with unemployment compensation is that it may create incentive effects that create long-term efficiency problems and increase economic costs. For example, if program benefits are conditional on workers being in a disadvantaged state, beneficiaries may have an incentive to become or to remain disadvantaged. To avoid this problem, Brander and Spencer suggest that it is preferable to pay unconditional assistance, i.e., compensation regardless of whether an individual subsequently becomes re-employed. This could create incentives for workers to become re-employed in the shortest possible time, although eligibility criteria would have to be designed to prevent rent-seeking behavior through "job hopping" across firms in declining industries. An unconditional compensation scheme is likely to be more expensive than one in which benefits are linked to continued unemployment, since some workers will choose to take other employment if the alternative wage exceeds the value of the compensation plus the value of time in leisure. Schemes which provide unemployment compensation for a limited period of time, and in which the level of compensation declines through time are likely to create fewer disincentives to re-employment. However, if the overall economy is weak and unemployment is high, there may be a reluctance to reduce or withdraw benefits from displaced workers.

Retraining schemes can take a variety of forms. Displaced workers can be compensated for the costs of undertaking an approved retraining program (tuition charges, travel expenses, child care expenses etc.). The assumption underlying such programs is that investment in human capital will increase the likelihood that the displaced worker will find alternative employment, and that the wages earned will be higher than would otherwise be the case. With a progressive tax system, this would lead to some "pay back" of the investment in human capital to society as a whole. It does not necessarily follow that the retrained worker will match earnings in their previous occupation, particularly if s/he has been displaced from a relatively highly-skilled job to a lesser-skilled job. There is no guarantee that a retrained worker will find alternative employment, particularly if the overall demand for labor in the economy is weak. In terms of the type of retraining undertaken, it is generally preferable that individuals make their own training choices rather than being directed to a particular form of retraining by the government – the government is unlikely to be the best judge of an individual's capabilities or employment potential. However, public agencies can play a role in guiding training choices by individuals by disseminating information on employment opportunities.

Assistance with job search and placement can extend to direct financial assistance, in addition to the provision of information. Payments can be provided to help offset travel costs for job interviews or the costs of moving to take up employment in a new location. This type of assistance can also be provided through the tax code by making such expenses deductible against income tax.

In some cases, lump-sum severance payments are made to workers, based on the length of service. Recipients can use such a payment as a source of capital to set up their own businesses, as a source of income for retirement, or to support current consumption. Problems can arise when such payments are made as a substitute for accumulated retirement benefits, in that workers may not save such payments to fund their retirement, particularly if they are not close to retirement age. For elderly workers, incentives can be offered for early retirement, for example, through the provision of extra pension or other benefits (e.g., coverage of medical expenses while retired).

Where unemployment benefits are provided on a long-term basis, this can create a considerable drain on public finances, particularly with the increase in life expectancy of the population's of industrial

countries. Many already face considerable challenges in funding future retirement obligations due to the aging of the population, reductions in the value of the assets that support private pensions, or the reliance on current wage earners to pay for the publicly-funded pensions of those who are retired.

In the food and agricultural sector, particular issues may arise because of the prevalence of family, seasonal and part-time labor. Economic adjustment may involve involuntary unemployment in such categories of labor, but it may be difficult to identify those affected or to compensate them. Workers in these categories of employment may not be eligible for compensation or access to other adjustment schemes, since they are not in regular full-time employment.

### *3.2. Measures targeted to firms*

Most of the adjustment measures provided to firms are targeted to the restructuring of existing activities, for example, through the installation of more modern equipment, or the transition to new activities, for example, away from iron and steel production towards metal fabrication. A range of measures can be used to achieve such changes, including, the provision of loans or grants for new investment or preferential tax treatment. In addition, technical assistance can be provided to assist firms with restructuring. It is relatively rare for compensation to be provided for reductions in asset values resulting from economic change, except in as much as direct incentives are provided to scrap obsolete plant. Firms may be able to offset losses in income or asset values against remaining income through the tax code.

In the food and agricultural sector, particular issues may arise because of the importance of fixed assets, particularly land, for farm firms. Changes in the value of such assets associated with changes in policies are likely to be particularly significant for those affected, and for policymakers. As is well known, the effects of agricultural support tend to become capitalized into fixed assets.<sup>2</sup> When output controls are used, the capitalization of support may also apply to the “right to produce” – the production or marketing quota.

While most of the measures identified above are targeted to the short and medium term, other measures can be targeted to the process of longer-term adjustment at the firm level. To the extent that the competitiveness of firms is linked to the technology that they employ, government support for research and development may provide an indirect way to facilitate change and adjustment. The degree to which such measures are effective in helping particular firms will depend on the extent to which new technologies are specific to those firms or to which the supply of intellectual property can be controlled so that it benefits them.

Publicly funded research is relatively significant in the agricultural sectors of some countries, most notably the United States. The effects of this research on productivity is an important factor in creating pressure for adjustment, but the extent to which research can aid actively in the process of adjustment in the agricultural sector is also an important issue.

The continued economic viability of farms may depend on an increase in the scale of farming and the size of farms. It may prove challenging to effect the necessary structural change if there are institutional rigidities that affect the transfer or sale of land, or if the rental market for farmland does not function efficiently. Institutional rigidities, some of which can be caused by policies, can complicate the adjustment process (OECD, 1998).

### *3.3. Measures targeted to communities*

Community leaders may become involved in adjustment programs because of their concerns about the impact of economic change on the local economy, employment, and tax revenues. Local initiatives

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<sup>2</sup> As pointed out by the OECD (1998), the selling prices for land may not necessarily follow changes in output prices, particularly in the short term, for a variety of reasons. These include imperfections in the land market and differences between current earning from land (including potential earnings in non-agricultural uses) and expectations of future earnings.

that seek to protect or generate employment can be targeted directly to workers or firms, or indirectly through the use of tax dollars to improve infrastructure and services. Local governments and other agencies may also be the primary vehicle for the delivery of adjustment programs that are funded by regional or central governments.

#### 4. Some Issues in Adjustment Policies

A number of general issues relating to adjustment policies can be identified.

First, in so far as it is possible to generalize, it is likely that the *pressure for governments to take action* to address adjustment issues is likely to be greater the more important the following factors: 1. the geographical concentration of the industry affected by change; 2. the importance of the industry in the local or national economy, particularly in terms of employment; 3. the degree of mobility of workers in the industry, which may be a function of skill levels, as well as factors, such as age and attitude, which affect willingness and ability to learn new skills or to relocate to other areas. The perceived need for adjustment policies and programs is also likely to be higher if overall income and employment growth in the economy is low, or is concentrated in regions other than those affected by economic change.

Second, there is the issue as to *whether so-called adjustment measures actually promote adjustment*, for example, through the downsizing or elimination of an industry that has become uncompetitive, or whether they simply provide a subsidy for an industry that is unlikely ever to be competitive. Many of the subsidies provided in industrial countries for the “modernization” of certain industrial sectors during the 1970s, such as shipbuilding and textiles, fall under this heading. Programs which involve investment subsidies or transfers that reduce labor costs in a given sector have been criticized most strongly on this basis (Banks and Tumlir). The provision of such subsidies or the implementation of other sectoral measures, such as production quotas or market sharing agreements, can be viewed as forms of disguised protection, rather than true adjustment measures. In recognition of the fact that “adjustment policies” could have the opposite effect to that intended, the OECD coined the term “positive adjustment policies” to distinguish policies that were not designed to prop up uncompetitive industries.

Third, there is the issue of *moral hazard*. As is well known with insurance, the creation of measures that provide compensation in the event of losses resulting from economic change can influence the behavior of those who stand to benefit from such measures. Some of the potential effects are a reduction in innovation, reduced exit of labor or capital, reduced structural change (e.g., through consolidation of firms) that result from an increase in the shadow value of assets with compensation. There may also be a tendency for investment to be undertaken in ventures for which the failure rate is high, since the cost to the individual of such failure is reduced when measures exist to compensate for losses.

Fourth, a related issue is that adjustment policies may generate *rent-seeking behavior*. Rather than focusing on making adjustments that will permit individuals and firms to survive in a competitive marketplace, those who stand to benefit from adjustment policies may direct most of their efforts to obtaining transfers from the government. This would not be a new development for the agricultural sector in industrial countries. The large and continuing subsidies provided by agricultural policies have tended to perpetuate rent-seeking behavior by farmers and others involved in the food and agricultural sector. The problem might be reduced if current policies were to be replaced by adjustment policies, but only if such policies do not become a substitute form of continuing subsidization for agriculture. Where there is locational mobility, for example, in agribusiness firms and there are competitive adjustment measures across jurisdictions (e.g. counties or states) this may accentuate rent seeking behavior on the part of companies. They may close a plant in one region to relocate in another simply to maximize the revenue obtained from the adjustment programs on offer in the competing location.

Fifth, as with all forms of government policies that involve public expenditure, there is the key issue of the *overall cost of adjustment policies* to the economy. Economists identify costless lump-sum transfers as the ideal mechanism for addressing the redistributive effects of policy change, but it is difficult, if not impossible to design adjustment policies that correspond to this ideal. A major topic in the public finance literature is the disincentive effect created by various the forms of taxation that fund government budgets. Again, in the case of agriculture, the negative effects of public expenditures under adjustment programs would have to be weighed against those created by the continuation of existing forms of support to agriculture, and whether the overall size and duration of the transfers to agriculture would be reduced by switching from existing support policies to adjustment policies.

Sixth, there is the issue of the *relationship between adjustment policies and international trade law*. The original provisions of the GATT had very little to say on the subject of adjustment measures. Article XVI (subsidies) provides for consultation on subsidies that operate directly or indirectly to increase exports or to reduce imports, but most of the article addresses export subsidies. In recognition of the growing importance of domestic subsidies and other measures since the foundation of the GATT, the Uruguay Round Agreement had far greater coverage of these issues. The subsidies and countervailing duties code (which specifically excludes agricultural products) provides for disciplines on the use of measures that involve the direct or indirect transfer of public funds to enterprises that impose injury on another contracting party. It contains explicit references to grants, loss and equity infusion, loan guarantees, and tax credits, but excludes non-recurrent measures “which provide time for the development of long-term solutions and to avoid acute social problems“. Also excluded are the bulk of publicly funded research and assistance to disadvantaged regions that would fall under the heading of regional development. In the Agreement on Agriculture, a number of measures within the so-called green box category are excluded from reductions in support. Some of these measures fall under the heading of adjustment measures e.g., producer and resource retirement schemes), and some could be interpreted to fall under that heading, depending on how they are implemented (e.g., investment aids, regional assistance).



**Table 1. Summary of Main Measures Allowed under the Green Box and the Criteria for their Application**

Type of Measure	Main Criteria
General Services	Must not involve direct payments to producers or processors
Public stockholding	Volumes governed by legislated food security targets, financial transparency, purchase and sale at current market prices
Domestic food aid	Clearly defined eligibility criteria based on nutritional objectives, financial transparency, purchase and sale at current market prices
Decoupled income support	Clearly defined eligibility criteria for a fixed base period, payments not related to the volume of production, prices, or factors of production in any year after the base period, no requirement to produce to receive payments
Income insurance and income safety nets	Eligibility based on income loss >30 percent of average gross income for the previous three year period or three year average excluding high/low from a five year period, compensation less than 70 percent of the income loss, no linkage to production, prices or factors of production
Disaster payments	Production loss >30 percent of the average for the previous three year period or three year average excluding high/low from a five year period, only for loss of income, livestock, land and other production factors, no more than replacement cost and not linked to requirements for future production, if during a disaster no more than that required to alleviate further loss
Producer retirement schemes	Clearly defined eligibility criteria to facilitate retirement or switch to non-agricultural activities, conditional upon total and permanent retirement from marketable agricultural production
Resource retirement schemes	Clearly defined eligibility criteria to remove land or other resources from marketable agricultural production, land retirement for a minimum of three years, slaughter or definitive permanent disposal of livestock, no required alternative use for marketable agricultural production, payments not related to volume of production or other resources remaining in production
Investment aids	Clearly defined eligibility criteria to assist financial or physical restructuring for objectively demonstrated structural disadvantages, payments not based on production or prices in any year after a base period, provided for a fixed period of time, no mandate for future production (except no production), and limited to the amount to compensate for structural disadvantage
Environmental payments	Part of clearly defined environmental or conservation program linked to production methods or inputs, payment limited to extra costs or loss of income caused by compliance
Regional assistance	Limited to producers in objectively identified disadvantaged regions, payments not based on production in any year after a base period (other than to reduce production) or prices, available to all producers in eligible regions, limited to extra costs of loss of income related to undertaking agricultural production in the prescribed area

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