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TARIFF COMPENSATION: SUFFICIENT JUSTIFICATION FOR ASSISTANCE TO AUSTRALIAN AGRICULTURE?*

STUART HARRIS

Australian National University

This paper discusses in greater detail the case for tariff compensation set out in the Green Paper on Rural Policy. It considers a number of theoretical and practical arguments levelled against the principle, including those put forward in the Annual Report for 1973-74 of the Industries Assistance Commission. It concludes that despite the various counter arguments, the second best argument for tariff compensation applicable to low cost manufacturing as well as rural industries, remains valid in principle; in practice the extent to which any such partial compensation would be warranted needs to be assessed in the light of the appropriate substitution and complementarity relationships.

(a) *Introduction*

The Green Paper on Rural Policy [13] concluded that the rural sector was disadvantaged by the tariff in a way that was likely to affect the overall efficiency of resource allocation in Australia. It stressed that, in this situation, the ultimate removal of tariffs was the preferred or first best policy. It argued, however, that until the tariff was substantially reduced, resource allocation—and therefore real income—would be likely to be improved by the existence or provision of some compensating assistance to agriculture.

Since the Industries Assistance Commission (IAC) has been considering a number of references to it on matters affecting the rural industries, this is an opportune time to consider some of the issues related to the principle of tariff compensation.

The substance of the tariff compensation argument put forward in the Green Paper[1] is that:

* A revised version of a talk given to a combined meeting of the Victorian Branches of the Agricultural Economics and Economics Societies in Melbourne, June 20, 1975. In the preparation of this paper I have benefitted considerably from discussions with, and comments from, a number of colleagues, particularly A. G. Lloyd, F. H. Gruen, R. G. Gregory, G. W. Edwards and D. B. Trebeck. None of these necessarily share the views expressed, however, which are mine; in particular it should not be assumed that the other authors of the Green Paper would agree with all the views put forward.

[1] There have, of course, been many earlier statements, direct or indirect, of the issues involved, beginning perhaps with the statement of the equivalence between a devaluation and a general duty on imports combined with a general bounty on exports attributed to Keynes (16, p. 199). In the Australian context the fullest discussion of the tariff compensation argument prior to the Green Paper was by Gruen in [12].

(i) in the absence of the tariff, internal and external balance in the economy can be achieved by a combination of internal fiscal and monetary measures to maintain full employment and appropriate changes in the exchange rate;

(ii) in the absence of the tariff, and with full employment being maintained, the exchange rate would have to be devalued to maintain external balance;

(iii) this devaluation of the exchange rate, relative to the exchange rate that exists with the tariff, would provide higher prices to Australian exporters in terms of Australian currency; consequently, the existence of the tariff is equivalent to a subsidy to import competing goods and a tax on exports;

(iv) real income for the economy as a whole would almost certainly be greater without generalized tariff protection and with the appropriate exchange rate variation since, by means of the tariff, resources are attracted away from industries in which Australia has the greatest comparative advantage to those where Australia has less;

(v) from the viewpoint of economic efficiency the preferred course, in consequence, would be the gradual dismantling of the system of generalized tariff protection (and high rates of protection for export industries) and its replacement with the exchange rate adjustments necessary to complement measures to maintain full employment internally;

(vi) if the removal of tariffs is not possible for political or other reasons, or can only be achieved over a long period, this should be acknowledged in policies towards the export industries and may validate some assistance being provided to export industries up to the point which would equate with the exchange rate that would apply in the absence of the tariff.

The Green Paper subsequently spelt out a number of practical problems which would emerge in attempting to provide tariff compensating assistance. Some of these will be considered after some basic issues relating to the principles of the argument have been dealt with.

Among other things, the discussion does suggest that 'tariff compensation' may not be the most felicitous term to use to describe the principle involved. The argument to which the concept relates is not tied specifically to tariff protection; it has equal relevance to assistance by way of non-tariff measures to export and import competing industries. Moreover, the word 'compensation' appears to suggest a consideration of ethical, even moral, entitlements whereas the argument has validity only in the context of correcting resource distortions brought about by the tariff, i.e. it is concerned with national economic welfare, not with any notional 'rights' to compensation of those disadvantaged by any specific government measure or set of measures where the nation is not also disadvantaged.

In considering the specific question to which this paper is addressed, we need to examine two sets of arguments which have been or might be put against the proposition. These can be categorized broadly—and not entirely accurately—as theoretical and practical arguments.

(b) *The Theoretical Arguments*

The Industries Assistance Commission, in its Annual Report for 1974, seems to have been interpreted as being generally against the tariff compensation argument, though it could be also read as taking an open position. Nevertheless, the discussion of tariff compensation in the report seems to accept its theoretical validity. The key paragraph in Appendix 5:25 reads as follows:

> 'As the balance of payments must be in equilibrium in the long run, and as the value of exports under full compensation must be the same as it would be in the absence of the tariff—this is the definition of full compensation to the export sector—the value of imports must also be equal to that which would have prevailed in the absence of the tariff; exporting and import competing industries are in exactly the same situation after full tariff compensation as they would have been without the tariff or export subsidy. In other words, equal assistance to each sector involved in international trade is equivalent, in terms of resource allocation to no assistance' [14, p. 116].

This interpretation of the IAC's position is confirmed in a further reference where, dealing with the Green Paper's comments on tariff compensation, the I.A.C. says:

> '. . . a situation of full compensation which provides equal levels of assistance to all exporting and import competing industries is formally equivalent to a situation of free trade with no assistance to either export or import-competing industries. Thus, if tariff compensation were complete, there would be no substantive reason to consider one strategy "first best" and the other "second best"' [14, p. 121].

While this is formally correct, there are a number of reasons why, considering the practical context in which policy is formed, one is 'first best' and one 'second best' and I shall refer only to a few of them. First, the exchange rate does not apply simply to exports and imports of merchandise but to invisible transactions and to capital inflow—the latter, in particular, being likely to be affected by the existence of the tariff.[2]

Second, it is probably true that the costs of tariff protection are higher than the simple economic model might suggest. The tariff distorts not only most relative prices but the whole administrative and indeed political process, with industries putting substantial effort into seeking tariff assistance rather than directing attention to the real problems of their industry.

Third, a substantial disadvantage of tariffs on imports and compensatory subsidies on exports (or low cost imports) is that such compensation is unlikely to apply to industries not currently trading. Potential export or low cost import competing industries which are discouraged by the existing higher exchange rate are unlikely to benefit, unless the export subsidy is automatically payable on all exports.

For reasons such as these the benefits from the free trade plus adjusted exchange rate option seem, in the Australian circumstances, to make the latter clearly a first best strategy.

The arguments used in the past to support the policy of tariff protection in Australia have tended to be based on the need for the tariff

[2] Strictly speaking, the exchange rate would be neutral with respect to capital inflow and repayments if there were no sector bias in the direction of capital movements. Empirically, capital inflow in the postwar period is likely to have been biased towards manufacturing and more recently towards the mining sector.

to absorb and employ a growing population, and as a means of redistributing income to wage earners [3]. The partial nature of the employment argument for tariffs had more validity at a time when chronic unemployment was generally a problem to which answers had still to be discovered, and when exchange rates were basically fixed, than it does in a post-Keynes situation with substantial exchange rate flexibility. Whatever the validity of the various economic arguments then, these hardly apply now.

A qualification may be warranted to the assumption of 'substantial exchange rate flexibility' referred to in the previous paragraph. From the reaction of economists concerned with short term economic management to the 1974 devaluation, there appears to be a reluctance to accept a variation in the exchange rate downwards because of its inflationary effects. Of course, there will always be inflationary effects from a devaluation, and it seems highly probable that Australia, with other market economies, will continue to experience inflation rates well above those that would, from historical experience, be considered reasonable. Consequently, at any time in the future when devaluation appears necessary in the light of the underlying structural factors, this too is likely to be in an inflationary situation and to give rise to concerns for short-run economic management issues which may lead to an undue discounting of resource allocative effects. A reluctance to accept the implications of flexibility of exchange rates in the downwards as well as the upward direction would slow the rate at which tariffs can be reduced and so strengthen the case for tariff compensation.[3]

While, conceptually, tariffs may be warranted on economic grounds where external economies are expected to be large or the terms of trade likely to be affected in a significant way, in the Australian context, the income redistribution argument would appear a more important argument to dispose of. Keith Campbell, who has questioned whether the objectives of Australian tariff policy have changed as much as the Green Paper suggested, comments specifically on the income distribution argument:

> 'If . . . a government applied tariffs primarily to effect income redistribution from the rural to the manufacturing industries, any compensatory action in respect of the rural industries would tend to negate the original policy' [5, p. 160].

Indeed, the main criticism expressed on the tariff compensation argument on theoretical grounds has been that in the Australian context the purpose of the tariff was the explicit political objective of income redistribution, to redistribute income from the factor land (rent) in the export sector, to labour; in these circumstances it is argued that it is illogical to compensate the agricultural export sector for what was a deliberate policy to transfer income from that sector. P. P. McGuinness of *The Australian Financial Review*, and others, have pointed to the theoretical under-pinning to this argument provided by the Stolper-Samuelson theorem. Let us look at these arguments.

The Stolper-Samuelson theorem is concerned to show that, in the terms of the model on which it is based, protection raises the real

[3] A preferred course, letting the exchange rate fluctuate freely, with moderate intervention only by the monetary authorities, would resolve many of these problems.

income of the relatively scarce factor of production used in the protected industry. This analysis is based on a number of assumptions and, importantly, insofar as it is regarded as applicable to the Australian case, on the assumption that exports (more properly exportables) are land intensive.

Stolper and Samuelson were themselves cautious about the applicability of their conclusions to the Australian situation.

> 'Thus, in Australia, where land may perhaps be said to be abundant relative to labour, protection might possibly raise the real income to labour' [22, p. 356].

More generally, the Stolper-Samuelson argument, as well as assuming generally competitive conditions and specifically constant returns to scale and marginal productivity factor pricing, bases its substantive analysis on the assumption of two goods and two factors.

A number of assumptions underlying the Stolper-Samuelson model are open to question; however, not all of them, if relaxed, would necessarily affect the general conclusion. Those that are crucial are the assumptions of constant factor intensities and of two factors of production. Once not just two but three factors are allowed for in the analysis, the difficulty of maintaining the constant factor intensity assumption becomes large—capital may substitute for labour, for example. Moreover, if the number of factors is extended beyond three, because the existence of specialized forms of land, labour or capital is allowed for, the position becomes unclear.

In these circumstances, the effects of protection on real wages are likely to be indeterminate; the effects are as likely to be that returns to capital in protected industry are increased as they are the real wages of labour employed in, and specified to, protected industries are raised [7, 8, 11, 21].

More generally, one should question the general relevance of income distribution arguments for tariff protection since there are now more effective methods of redistributing income to those generally accepted as being socially or economically in need. Most economists today would argue that, even if the income redistribution objective were accepted, and it were possible to achieve this by way of the tariff, it would still be more logical to reduce tariffs and to use methods other than the tariff to achieve the required redistribution of what would then be a higher real income.

A further theoretical argument relates to the theory of second best, on which the tariff compensation argument is founded [17, 19]. It could be argued, from some theoretical uncertainties that arise from the theory of the second best, that it is not unequivocally clear that a movement toward Pareto optimality which does not achieve the full optimality conditions can be proved to improve the efficiency of resource allocation. Almost all economists, however, appear to accept the assumption that the probability is strong that a movement in the direction of Pareto optimality will improve allocative efficiency. This assumption clearly underlies the tariff compensation argument.

At the same time, the undertaking of a specific intervention, a subsidy on exportables (or, indirectly, through the tariff, on low cost importables) to offset the distortions resulting from the existing tariffs on imports, does call for some care in assessing the likely impact of the change in terms of both the consumption and production effects.

The imposition of a tariff breaks the correspondence between the social marginal rates of substitution in consumption and the marginal rates of transformation in production and in international trade. Under full compensation, the imposition of an export subsidy would restore the necessary relativity of prices in the domestic market. If, however, it is accepted that full compensation is not feasible, for whatever reason, this correspondence is not generally restored. In these circumstances, the benefits in terms of an overall improvement in economic welfare involve questions that have to be judged in the light of the empirical facts of consumption and production patterns and the substitution and complementarity relationships that obtain in consumption and, perhaps more importantly, in production. For the agricultural industries, this would need to be on the basis of trend prices and production to avoid the problem of year to year variations in prices and output.

(c) *Practical Arguments*

The IAC Report canvassed a number of arguments of a practical nature against the general principle of tariff compensation. Most of these had been anticipated by the Green Paper; some of these will be referred to briefly later in this paper, but first some further arguments not explicitly dealt with there need to be examined.

(i) Since the accepted policy objective is to achieve the ultimate removal of tariffs, and the main pressures in the political process against tariffs are those of the exporters and the consumers, adoption of the tariff compensation principle would remove the pressures for tariff reform and ultimate removal.

This argument appears to be a major concern to those opposed to the tariff compensation principle. Yet it is an argument that is open to question in both logic and principle. It is far from clear that the provision of compensating assistance will, in fact, reduce the pressure for removal of the tariff. For example, there may well be a need to provide some of this assistance from budgetary sources. As the Green Paper says:

> 'In practice, increases in production using direct budgetary expenditure would have to compete with conflicting expenditure needs. Society may well decide to give preference to those needs having high social or community priority such as those dealing with poverty or defence, and accept the loss of efficiency this may entail' [13, para. 3.75].

For this reason, exporters are unlikely to see the provision of compensatory assistance as preferable to removal of the tariff, particularly as it will, unlike the tariff, be subject to review at regular and short periods and will be open to annual public scrutiny. Indeed, it could be argued that the regular provision of budgetary funds and the discussion that goes with them would be more likely to educate the public to the costs of the tariff than to eliminate pressures for the removal of tariffs.

In any case, even if we think that the community might draw the wrong conclusion from the acceptance of the compensation principle, and that it might then mistakenly relax its attitude to tariffs, it would be quite wrong to decide that the community should be prevented from making that mistake by keeping the option from it.

Nevertheless, expectations regarding the removal of tariffs could be influential to the extent that new protective measures were necessary to provide assistance. Even though the awareness of such new measures may add to the pressure to remove protection all round, they do add their own inertia to the system. Consequently, if it were evident that the generalized system of tariff protection were to be dismantled over, say the next 5 to 10 years, it would be doubtful if, on balance, it would be worth creating new forms of compensatory assistance.

If the existing arrangements are generally expected to last longer than that, however, the length of time during which resource allocation distortions would persist becomes substantial. Moreover, not all questions of tariff compensation involve providing additional assistance; they frequently involve questions of how much of existing assistance warrants retention on this ground.

(ii) A further argument is that the provision of tariff compensation will open the doors to all industries, including the non-traded goods industries, to seek Government assistance in one form or another. In a full compensation situation the increase in exports as a result of the export subsidies would require an exchange rate appreciation to maintain external balance. This would lower domestic prices of imports (plus tariffs) vis-a-vis the initial situation while export prices, including compensatory subsidies, would still be above the level that existed with uncompensated tariffs. The domestic prices of imports (plus tariffs) and exports (plus subsidies) would be the same as they would be in a free trade situation, if the exchange rate were the balancing mechanism. In this situation there would be no adverse, or beneficial, effects on the non-traded industries of tariff protection; the non-traded goods price ratios would be the same as in the free trade situation.

With partial compensation the problem of the non-traded sector is more complex. For some of these industries, input costs may be increased through tariffs on imports; in a partial compensation situation, the prices of these inputs may remain above the free trade price level. Even if non-traded industries are actively competing among themselves within their own sector, they are able to recover, through higher prices, the additional costs of inputs which, like those caused by the tariff, apply to all in the industry. Yet this would mean a decline in the overall market, and hence a consumption cost, the extent of the decline depending upon the elasticity of demand for the service provided; it will also be influenced by the relationship of the industry to the traded goods industries.

Non-traded goods industries, particularly services industries may be disadvantaged indirectly by the tariff where they are related to export industries, while those related to the import competing industries are generally likely to have gained. While *a priori* it is not possible to be unambiguous in the case of non-traded goods in a partial compensation situation, it seems unlikely that the situation is one where any significant loss in national economic efficiency from failing to compensate would exist. Any increase in prices and falling off of demand in one non-traded goods industry is likely to lead to increased prices of closely substitutable non-traded goods industries as demand expands in relation to supply. In this the situation differs from the traded goods sector where foreign competition would limit the extent to which this occurred. The extremes in price differences, which lead to the major efficiency losses, are not likely to remain in the non-traded goods sectors.

Although it may well be that initially some non-traded goods industries, that would not otherwise have done so, may be encouraged to seek assistance on tariff compensation grounds, it is difficult to see that the numbers would be large. Moreover, those that do apply would have to go through the IAC process, and they would obviously have difficulty sustaining an effective argument for assistance. While the costs in terms of the time and effort of those involved are worth considering, there would also be value in getting public scrutiny brought into some of the non-traded sectors of the economy.

Even if there were a significant increase in such applicants, one either assumes that they will obtain such assistance on other appropriate grounds, in which case there can be little objection, or their application will be rejected—unless one is fearful of the political process making the wrong decisions.

This is similarly the answer to the 'bandwagon' argument; that acknowledgement of the merits of the compensation argument will encourage loud claims from farmers' representatives for such assistance. Again, where the arguments are sound, the case should be put; where not, the loudness of the arguments is unlikely to influence the IAC. That the political process may make the wrong decisions may be a historically valid judgement, but that really is what the democratic decision-making process is all about. It is hardly a valid argument to want to limit the number of decisions put to the political process on the grounds that it might make the wrong decision. Consequently, the IAC's conclusion that:

> 'if a policy of increasing low levels of assistance were adopted, it could create a general and pervasive expectation in the minds of a great many of the country's producers of goods and services that assistance was available from the Government on demand; and this could profoundly affect the general spirit of enterprise in Australian industry, and the responsiveness of individual industries to economic change' [14, p. 121].

is not a strong argument.

This is also the case for 'another and quite separate argument against adoption of the tariff compensation principle'. This suggests that:

> 'if there are certain economic or social reasons for changing the present structure of assistance, the particular changes should be determined directly by those reasons, rather than by the need to compensate for defects in the present structure of assistance' [14, p. 122].

This is no doubt a valid statement. If the logic of this argument were pursued fully, however, it would be difficult to reconcile with the arguments on effective protection. It would also seem difficult, in the light of this argument, to justify recommending tariff protection at all in many cases, since frequently the 'direct' approach would suggest subsidies to local producers rather than tariffs [6, 17]. The argument quoted is saying, in essence, that 'first best is best'. This is an unexceptional statement, although neither 'another' nor a 'separate' argument. The point, however, is that if first best is not possible, second best might be preferable, on economic grounds, to nothing; and the second best solution could involve compensation for existing defects.

A related counter argument is that the IAC will face continued criticism that it provides only negative advice and, while advising on the withdrawal of tariffs, does not provide guidance as to where the resources released might be used. For economists the answer is not difficult in a general equilibrium world with appropriate macroeconomic policies. Some indicators that low protection industries are those considered as having particular advantages in the Australian context and, at the least that their existing low levels of protection will not be further reduced while the tariff compensation principle holds would provide, however, a more defensible position for the IAC.

(iii) A third argument is that some protection already given is economically or socially justified for various reasons—genuine infant industry, defence reasons and the like—and to provide tariff compensation for such assistance would not improve resource allocation.

To the extent that such assistance does exist in the tariff, including genuine anti-dumping duties designed to cope with short term or episodic dumping, then clearly there is no ground for providing tariff compensation for it.[4] But that does not provide an argument for not compensating for assistance which is not justified. The practical question of how to measure the 'justified' tariff protection is relevant but unlikely to be important unless 'justified' assistance is a significant part of the total. If so, the effort to make the necessary measurement needs to be made, and the appropriate adjustment effected to the assessment of the appropriate compensation.

(iv) A fourth argument is that assistance by way of tariff compensation may have adverse income redistributive effects by providing assistance to wealthy farmers or wealthy mining industries.

So far as the income distribution argument against tariff compensation is concerned, it is true that just as tariffs help some wealthy industrialists, owners of capital and many already on high incomes, so tariff compensation would also provide assistance to the wealthy as well as to the lower income farmers and miners; but this would also be the case with a devalued exchange rate if the tariff were removed. The simple answer to this argument is that if there are concerns with the distribution of income in an economy then there are ways, such as through the tax system, together with direct income redistribution measures, which are efficient ways of dealing with them.

In the case of the non-extractive industries, the simple answer is probably a sufficient answer. For mining, there are several reasons, such as the uncompetitive nature of the industry, and differences in time horizons, why socially optimum rates of extraction may differ from private rates. Consequently, it is not necessarily true that the position is socially sub-optimal without compensation.

(v) Concern has also been expressed about the income redistribution effects of the additional taxation which would have to be raised to provide the necessary export subsidies. The same arguments apply as

[4] Though in the case of the non-economic arguments, the 'direct' approach referred to above might indicate that alternative methods to the tariff could be preferable.

in the previous case, but to a greater degree. Moreover, some work has been done by Bhagwati and Ramaswami showing that the raising of taxation for the provision of export subsidies can be neutral with respect to the distribution of income [2].

(vi) The tariff compensation argument applies not just to export industries but also to import competing industries, and is relevant to the question of the expansion of low cost industries. The IAC comments that

> 'if the community's resources are to be used more efficiently, in the interests of promoting economic growth and thereby improving the well-being of the people of Australia, resources must be encouraged to move into activities which require low levels of assistance or none at all' [14, p. 18].

It is difficult to see what 'encouragement' means except the provision of additional assistance, though the IAC in its 1973-74 Report carefully avoids any specific reference to the idea of raising low level tariffs up to 'bench mark' levels—the approximation sought by some of the 'uniform tariff' proponents [24, Chaps. 13 and 14].

Nevertheless, there is no clear difference in principle between tariff compensation for export industries and for import competing industries with presently low levels of protection. That is, the argument implies not simply that export industries may have a case for tariff compensating assistance but low protection import industries also have a case. In reverse, it is difficult to see the case for assisting, by raising tariffs up to approximately the average, (or some lower bench mark tariff) low protection import competing industries which are taken to be low cost industries, that does not similarly apply to low cost, i.e. low assistance, export industries; and yet, again as a second best argument, the case for increasing assistance to low cost import competing industries, while other assistance is high, is strong [1].

In its discussion of low cost industries, the IAC suggests that if assistance is directed less exclusively to supporting the prices of industries' outputs, this will improve resource-use efficiency. This is quite consistent with the Green Paper's approach, although Keith Campbell took the authors of the Green Paper to task for referring to a wide range of such non-price measures in the tariff compensation context [5, p. 159]. Nevertheless, it is a suggestion that warrants more empirical investigation in terms of its relative costs and benefits.

(vii) Many of the practical arguments against tariff compensation seem to assume a move to achieve full and immediate compensation. The Green Paper made it clear, in the light of this discussion, that it did not seek a close and exact relationship in total, or from year to year, in the effective assistance provided to export and import competing industry. The approach it took also implied that the process of providing any warranted tariff compensation would be a gradual one, with the question being looked at as cases came before the I.A.C.

Moreover, the second best theory discussed earlier points to the likelihood that where the level of tariff protection is given, the optimum level of tariff compensation is likely to be less than this level. The extent to which it approaches or falls short of the existing protection level will depend upon the likely degree of substitutability or complementarity in consumption of the products of the industries in question;

and the degree of competition that exists for the factors used in production [8, pp. 367-8; 19, p. 282].

(viii) It could be argued that the partial compensation approach raises such complex practical issues of measurement and assessment that it might, in consequence, be easier to ignore the whole question of tariff compensation and press on with efforts to reduce at least the higher levels of tariff protection. Apart from the possible costs in terms of the distortions to resource allocation that this might involve, the question cannot be ignored in this way. Even if the IAC were to say, for example, that it intended to ignore the tariff compensation argument it would not in practice be able to do so. To take such an approach, in its recommendations on specific requests for assistance from low cost export or import competing industries, would in fact be making a clear, though implicit, judgement that there is little effective substitutability between the industry under examination and tariff protected import competing industry in either consumption or production and that no tariff compensation is better, in welfare terms, than some compensation.

If an import competing industry is able to produce, with relatively low levels of effective assistance, a good substitute for a product produced with an above average level of effective tariff protection, there could well be benefits from providing some increase in assistance while the generally high levels of assistance remain.[5]

Similarly, if an export industry competes for land, labour and capital with highly protected import competing or export industries and would generally be able to compete effectively with relatively low levels of assistance, it is difficult to see how it could be validly argued that it would not be worthwhile in economic terms to provide 'some' assistance.

(ix) A further argument—and if supportable, perhaps potentially the strongest argument against tariff compensation—might be that the tariff, by and large, is not now a major factor in resource allocation in the Australian economy and, in consequence, the disadvantages to the export industries for which there is a justification for compensation are correspondingly small. Some support for this view may appear evident from some recent econometric studies; directly from Evans' work [9], and implied in that of Gregory and Martin [10].

David Evans himself acknowledges that the empirical conclusions from his econometric model may not be strong ones [9, Chap. 9]. Specific limitations in the present context include the highly aggregative approach necessarily taken in his study, which probably understates the benefits from specialization; the age of his data; and the necessarily limiting nature of his assumptions, particularly the minimum growth constraints that were necessary to overcome the technical limitations of his model. It is clearly an area, however, in which more work ought to be undertaken; until this comes up with stronger confirmatory evidence of the relative unimportance of the tariff than currently exists, it seems reasonable to continue to accept that its influence may be still quite large.

[5] Some possible situations in which this might not be so are suggested by Lloyd [18, pp. 192 *et seq.*].

(x) A further practical reason why, in certain circumstances, compensatory assistance may not be worth providing, at least in the form of direct export assistance, arises if the trade relations effects are likely to be significant. If, for example, the U.S. would apply countervailing duties were an export commodity to receive compensatory assistance by way of an export subsidy, and a substantial part of our exports are destined for the U.S., then the gains would be small. Similarly, the GATT may be breached, though only if the subsidy enabled Australia's traditional share of the world market to be enlarged. These are practical issues to be looked at on a case by case basis with advice from those responsible for administering Australia's trade policy.[6]

(xi) There is, of course, no particular reason why assistance has to be limited to direct budgetary assistance. Home price maintenance schemes need not be excluded. While it is true, as the IAC says, that home price schemes 'cause new inefficiencies' [14, p. 121], this is what being second best is all about. The important question is whether the new inefficiencies are greater or less than those which have been removed by such interventions—and this will partly reflect the form of any home price scheme. Given that both producer and consumer prices would be presently giving the 'wrong' signals the 'new inefficiencies' could be much smaller than the existing ones. The problems are more likely to be those of the small proportion of total production that home consumption normally represents in the low cost export industries; and the market place difficulties of such schemes.

(xii) A final argument could be that the provision of tariff compensation to low cost export or import competing industries could lead to further claims by import competing industries that their relative position was being eroded and should be restored, hence setting off successive rounds of compensation and counter-compensation.

With full compensation the increase in foreign exchange receipts would make an appreciation of the exchange rate necessary and this would change, to some degree, the relative position of import competing industries vis-a-vis imports. The impact of assistance on the external balance in the partial compensation case would be less. Moreover, the situation is not one of starting from nothing; much of the assistance which would be in question already exists. Given that the supply elasticities are probably relatively low in the short run (though not in the longer run),[7] the overall effects on the exchange rate are likely to be as imperceptible in the years ahead as reductions in export assistance have been in recent years. In the situation of partial compensatory assistance contemplated, the effect on the average or high cost tariff protected import competing producer is likely to be so marginal as to be negligible; this will be particularly the case if, as would be expected, some dismantling of the higher levels of tariff is also taking place.

The more important argument is that related to the overall benefits to the economy. The average or high cost tariff protected import competing industry would need to show that further counter-compensation would lead to an increase in national welfare; or that the reductions,

[6] It also brings into question the underlying logic of an international set of rules which make this kind of activity against those rules.

[7] Despite the assumption to this effect in both the Brigden and Vernon Reports.

in relative terms, would reduce it. It is unlikely that this would be demonstrable on economic grounds. To the extent that purely political, rather than economic, arguments enable such counter compensation to be achieved, the above argument does not hold; but in that case, any optimism about reducing overall levels of tariffs seems likely to be misplaced.

(d) *Conclusion*

The question we have now to answer—returning to the subject matter of this paper—is whether tariff compensation is a sufficient reason for assistance to agriculture. The answer can only be that, in principle, it is. Each case needs to be looked at in the light of the individual situation of the industry concerned, but within some broad general principles. Many export industries already have some assistance, direct or indirect, or benefit from general measures of assistance. Obviously, in such cases, existing assistance from all sources would need to be estimated, and compared with the appropriate levels of assistance to import competing industries from tariffs—and other direct and indirect non-tariff sources. Some industries probably have a substantial level of protection, and would not warrant additional assistance. For others this is less clearly so. Moreover, there are already significant distortions in the system though the imbalance of assistance to industries which are competitors for the same resources, such as for example, the beef and dairy industries.

As the Green Paper indicated, any effects on the terms of trade, such as might be of importance for wool, would need to be taken into account including also, as suggested above, any terms of trade effects resulting from the trade policy reactions of overseas governments. The year to year variability of the levels of effective protection in the export industries needs to be taken into account; the Green Paper also suggested that the benefits should be considered of using the provision of compensatory assistance as a countercyclical measure [13, paras 3.78-3.80]. The Bureau of Agricultural Economics has recently published some estimates of effective rates of protection in rural industries; these are set out in Table 1.

The range of these is very large—from 180% for egg farms in 1968-69 to some —5% for dried vine fruit farms in 1972-73. The variability from year to year is also large. Both factors point to the need for care in measurement, and the difficulty of determining a longer term, or trend, level of effective protection; this also explains, in part at least, why the Green Paper suggested the need to avoid seeking too precise a measure of tariff compensation.

Where the appropriate empirical circumstances apply not only is it argued that the principles of tariff compensation provide a sufficient reason for the provision of assistance to Australian agricultural export industries, as well as manufacturing export industries and low cost import competing industries, but that it is difficult to see on what grounds it can, in principle, be denied. It is no doubt true that the empirical investigation needed to consider these issues in practice will be difficult but, as Ralph Turvey said in a somewhat analogous context [23] . . . 'so is life'.

TABLE 1

Estimated Levels of Effective Protection: Selected Rural Industries
(Percentages)

Period	Wheat Farms (a)	Sheep Farms (a)	Egg Farms (a)	Dried Vine Fruits (b)	Apples & Pears (b)	Dairy Industry (b)
1964-65	4	....	....	....	....	....
1966-67	3	....	....	....	....	....
1967-68	....	7	....	....	....	
1968-69	....	5	180	....	....	74
1969-70		8	104	....	....	
1970-71	14	11	....	....	....	....
1971-72		....	....	15	9	
1972-73	....	....	....	—5	7	42
1973-74	....	....	....	—3	21	

.... not available.
Source: (a) [20, pp. 134-137]
(b) [4, pp. 33, 37]

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