

The International Allocation of Economic Activity: A Review Article

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In June, 1976, a Nobel Symposium was held in Stockholm. The theme and title of the Symposium were *The International Allocation of Economic Activity*.¹ The Symposium owes its existence to Professor Bertil Ohlin and is devoted to a modern assessment of the state of the art in international trade theory. Prior to the award of the Nobel Prize in 1977, this Symposium may be said to be the apogee of Ohlin's professional career since modern trade theory still rests to a remarkable degree on his 1933 classic, *Interregional and International Trade*.² This Symposium shifts the emphasis by explicitly recognizing the close interrelationship between trade theory and location theory. This shift in emphasis explains the presence of eight well-known location theorists and economic geographers in addition to what was virtually an all-star cast of international trade theorists. The emphasis given to location theory was deliberate. It was foreshadowed in Ohlin's excellent review of the state of international trade theory in the mid-'sixties³ and constitutes a

stroke of great enlightenment since the subject matter of trade theory has tended to become excessively narrow and ingrown in recent years and a broadening of scope could restore some lost realism and vitality.

Fifteen major papers were presented together with a substantial valedictory. Each of the papers was the beneficiary of at least one comment and a general discussion. In order to keep the analysis well-defined, the subject matter was limited to positive problems in trade and location theory in the absence of imbalanced trade and under assumed conditions of satisfactory rates of capacity utilization. The effects of imperfections in competition were also excluded. These restrictions meant that the discussion among forty-one scholars (of whom thirty-one came from Sweden or the United States and only two from outside the developed world) was conducted in a full-equilibrium framework that was usually static or comparative static.

The papers were not uniformly insightful but the Symposium must be judged very successful. The book will amply repay time spent reading it.

This review article will attempt to provide a working guide to the almost six hundred pages so that the potential reader may have the benefit of one signpost in the selection of passages that will be of particular relevance to the reader's own research interests. Section I

¹Bertil Ohlin, Per-Ove Hesselborn and Per Magnus Wijkman, (eds.) *The International Allocation of Economic Activity*, (London: The Macmillan Press Ltd., 1977), pp. xiv and 572, £20.00.

²Bertil Ohlin, *Interregional and International Trade*, (Cambridge, Mass.: Harvard University Press, 1933).

³Bertil Ohlin, "Reflections on Contemporary International Trade Theories," Appendix II in *Interregional and International Trade* (revised ed.), (Cambridge, Mass.: Harvard University Press, 1966).

summarizes the main thread of the Symposium. Section II draws more detailed attention to papers of particular interest, quality, or originality. The third section attempts to put the subject of international trade theory into some perspective in the light of the papers given and *vice versa*.

I. The Main Thread of the Symposium

The single most important thread of the Symposium is the interaction of the pattern of trade and the location of production. Walter Isard refers to trade theory and location theory as "the two sides of the same coin" (159).⁴ There is therefore a tendency to emphasize activities which are internationally mobile in preference to problems relating to immobile natural resources—although these problems are touched on from time to time as the presence of economic geographers might be expected to ensure.

The Symposium began with two background review papers by Gottfried Haberler and Ohlin. From these papers and subsequent discussion, it is apparent that the factor-proportions theory must be seen as a complex, multi-dimensional theory if it is usefully to portray the real world. With the exception of Ronald W. Jones, this was an apparently spontaneous consensus. But the role of the formal model (the core or basic theory of the field) must be seen as something other than a general equilibrium analysis in a static or comparative static framework. Ohlin sees the formal theory as an introduction to an analysis of the process of transition from one stage to another and as a framework to which other variables can (and must) be added as the complexity of the problem increases (50–52).⁵ Even so, many participants seemed to emphasize the attributes of the formal model and to

regard the formal theory as an end in itself. Occasionally a hankering after the comfortable manipulability of the $2 \times 2 \times 2$ model can be observed. What is surprising is the degree to which Ohlin's forty-year-old insights were able still to point the way to many of the more modern elaborations of trade theory. Ronald E. Findlay refers to the "majestic trajectory" of Ohlin's thought (57).

Papers 4, 5, and 12 and their attendant comments and discussion provide economists with the essence of the interweaving of locational aspects and trade theory. These papers deserve wide attention.

Paper 4 by Alan R. Pred (127–147) describes the evolution of city-systems. The argument is made that cities (regional centers) tend to develop increasingly strong economic, information, communication, and transportation linkages. The development of these ties promotes further reciprocal involvement which, in turn, further strengthens the linkages. Cities become ever more interdependent. By extension the intranational system will become international and these linkages will become increasingly important in establishing the pattern of international trade and investment. If the intent of the Symposium is to expose economists to the role in international economic relationships of a broader and usually-neglected set of spatial-informational variables, then Gunnar Törnqvist's Comment (148–158) on Pred's paper may be the single most valuable contribution. Taking off from Pred's essentially intranational development of the dynamics of city-systems, Törnqvist develops a model showing both why national frontiers will continue to be an important demarcation line in the interregional exchange of goods and in the allocation of economic activity. He then goes on to show how multinational enterprises (MNEs) might create their own international sets of city-systems by creating private channels of informational flows and quite specific transportation linkages. What neither Pred nor Törnqvist

does is to examine the limits of the development among cities and what forces will work against or retard the development of these systems. Equally, Isard shuns consideration of forces that weaken the tendency for agglomerations to produce economies to enterprises located within them.

According to Törnqvist, international transactions are the more likely to take place the better is the awareness of decision-makers of the detailed characteristics of the potential foreign trading-partner nation. In general both public- and private-sector decision-makers have "mental maps" which decrease in accuracy quite quickly once national boundaries or certain prespecified geographical limits are exceeded. This whole question of earlier trade patterns and linkages will help to explain the importance of historical-colonial ties in trade and investment relationships. They also explain why many ex-colonies still find themselves continuing to follow traditional trade patterns. These relationships may now be consummated by MNEs instead of political constraints but it is easier, in this context, to see how even a relatively benevolent MNE could be considered an agent of neo-colonialism. When anything which reinforces traditional patterns of trade is seen as working against the aspiration of the newly-independent nation, MNEs are inevitably suspect. This comment leads naturally into Isard's paper on agglomeration (159–177). This paper is devoted to the role of economies of agglomeration in the determination of the location of different activities. Three types of economies derive from having a nucleus of production set in a limited geographic space: large-scale economies within a firm; localization economies which derive from having the focus of an industry present in a single location; and urbanization economies which derive from the enlargement of the inter-industry total economic size at a single location (161). These gains are set against the costs of "diffusion". These costs include the

lack of plant economies in peripheral areas and the costs of transportation to those areas. The concept of economies of agglomeration makes the widening income gap between poor and rich nations more easily understood. What Isard does not do, presumably because of the ubiquitous constraints of time and space, is to examine the implications of MNEs for agglomeration economies. This task is, in part, undertaken by Torsten Hägerstrand who relates agglomeration to innovation. Innovation is seen to derive from agglomeration, from the interaction of ostensibly isolated endeavors in the face of increases in demand and of technological advance. What MNEs can do is to convey the gains from agglomeration (scale economies possibly excepted) to periphery areas and can combine them there with factors with different relative costs. In this way, the periphery and the center are integrated. This phenomenon underlies "production sharing"⁶ whereby MNCs ship complex parts to the periphery for assembly and ultimate reimportation. For production sharing to occur requires that MNEs generate the better geographical perspective and communications network that were considered in Törnqvist's paper. But however much an MNE may convey agglomeration benefits to the periphery, the periphery is unlikely to achieve anything more than a dependency status unless it can achieve some critical minimal size and indigenous innovativeness.

The final important contribution to this thread is Dunning's paper (number 12) on the effect of multinational enterprise on trade and location (395–418). Given the current importance of MNEs as producers in the world, Dunning's paper is almost inevitably the keystone of the Symposium. It is no longer realistic to consider theories of international

⁴Numbers in parentheses refer to page numbers in *The International Allocation of Economic Activity*.

⁵This emphasis was reinforced in a letter to the reviewer.

⁶This term was originated by Peter F. Drucker, "The Rise of Production Sharing," *The Wall Street Journal*, March 15, 1977.

trade (or location) without taking into account the implications of this organizational form. Multinational enterprise most directly confronts the decision of whether to ship goods across national boundaries or to create a new source of economic activity in a different nation. The Symposium was fortunate that such an important topic received a paper of such high quality and extreme breadth.

Dunning begins by pointing out that none of the existing theories of international trade can satisfactorily explain the whole potential range of activities of MNEs (397). Emphasizing the need for a theory of the MNE to identify both location-specific endowments within nations and ownership-specific endowments (within firms) Dunning attributes the main reason for the growth of MNEs to the economies available from the internalization within the corporation of many transactions and activities.⁷ The relatively succinct description of these internalization economies (402-4) is as complete as this reviewer has found. From this, Dunning develops his own "systemic theory of ownership advantages" which combines the advantages of internalization to corporations with technological factors and the effects of imperfect competition and barriers to entry. This theory is offered as an eclectic theory of the MNE and is in many ways a companion to the neotechnological theory of international trade. It applies, therefore, more importantly to manufacturing activities. The main problem with the systemic theory is that it can be reduced to a simple argument that bigness reduces costs and it can tend to underestimate the negative aspects of sheer size. It also may be so all-embracing that it does not aid in focusing on crucial determinants of different investment and production decisions. Despite its breadth, the theory does ignore some

factors to which many would attribute positive roles: the great ability of MNEs to concentrate groups of complementary factors quickly at a point in geographic space to co-operate with local, immobile resources; the importance of political boundaries in influencing the terms at which goods and factors may flow; the importance of the factor-price set in different nations; strains arising from potential alienation of host governments as a result of a clash between MNE and host interests; and the role of "city-system-type linkages". When the possibility of the establishment of an MNE subsidiary in a developing nation is considered, the compatibility of the MNE's system of working and the socio-economic climate of the host economy may prove important. This point may usefully be considered in the framework that Staffan Burenstam Linder introduced to international trade theory.⁸ Linder argued that trade in manufactured goods was more likely to take place between nations of approximately the same level of economic sophistication (per-capita income) simply because the goods produced in one country would be suited to the trading-partner tastes. For direct investment to take place, the host economy must be able (and willing) to adapt to the practices of the MNE and *vice versa*: in addition, the local market must need goods of the degree of sophistication which the MNE is capable of producing. This factor suggests a limit (other than internalization economies) on the degree to which MNEs from rich nations will be able to invest in poor nations. Quite possibly, semi-developed nations will soon launch their own MNEs in poor countries. Of course, in cases such as extractive industries in which the MNE can "partition itself off" from the host economy in an enclave, this restriction will not be applicable. But, Dunning tends to stress the role of the

⁸*An Essay on Trade and Transformation*, (New York: John Wiley, 1961).

⁷It is impossible for Dunning to obey the Symposium rule of disregarding the effects of imperfect competition.

MNE in internationally-mobile activities. This is inherent in the close relationship between the systemic and neotechnological theories since the latter are concerned pre-eminently with footloose manufacturing industries.

The main thread of the Symposium is the development of interaction between locational and trade variables. In this the MNE is probably fundamental since it has tremendous quantitative importance and because the organizational form itself is multi-faceted. In practice, MNE decisions include virtually all of the variables that location theory provides as a supplement to the more traditional variables in international trade theory. A full, eclectic theory of the MNE may be an almost sufficient addition to standard trade theory to identify both sets of theoretical forces quite fully.

A first, working step toward the introduction of locational variables in the theory of international trade may be to recognize them (together with what may be termed second-order economic forces) as qualifications to the factor-proportions theory. The factor-proportions theory can be seen as a theory of the relative costs of goods in different nations given the prices of factor inputs generated in domestic factor markets. If the cost differentials between production in two countries, when determined on the basis of factor prices and least-cost technical coefficients are small, then locational factors and other relatively minor economic factors can determine the direction and mix of international trade. They achieve this by dominating the effects of small differences in factor endowments (and therefore prices). If, however, the difference in factor-endowments is substantial, locational variables will probably have little to add to traditional international trade theory.⁹

⁹See my "The Theory of International Trade among Manufacturing Nations," (mimeo).

II. Trade and Development

There is a second thread to the Symposium set in a somewhat lower key: the application of trade theory and locational theory to the problems of developing nations. In this Ohlin identified one of the main areas of weakness in the relevance of the formal factor-proportions theory since its essentially static quality and its reliance on the assumption of well-functioning product and factor markets sit uncomfortably with the conditions in and the concerns of LDCs.

The papers dealing with developing nations form a less coherent collection than the locational papers so that it is harder to envisage the contribution of the group to the evolution of international trade theory. Papers by Hla Myint (number 11), Akin L. Mabogunje (number 13), and Hollis B. Chenery (number 14) and comments by Robert M. Solow on Chenery and Harold Brookfield on Haberler are the essential contributions.

Chenery's paper (457-490) is the most important. Chenery examines the development and the accompanying changes in the pattern of trade of three different categories of country: large, small and manufacturing-oriented, and small and primary-product-oriented.¹⁰ It would be relatively easy to argue that Chenery has fitted very different nations into his own streamlined empirical model of economic development and has, in the process, suppressed the idiosyncrasies of very different national economies and circumstances.¹¹ Nonetheless, the model that Chenery presents is likely to prove to be a study of seminal importance in the area of development and trade. Chenery traces the development of so-called transitional nations and their pattern of trade. What is important

¹⁰Chenery's explicit neglect of international trade in services is unfortunate and even incomprehensible given the reliance of several of his transitional nations on tourism exports.

¹¹Also that Chenery's approach seems to rely very heavily on the Japanese experience.

about the transitional stage to a trade theorist is the rapid change in comparative advantage that is likely to accompany the growth of per-capita GDP from \$150 to \$1500 (in 1973 dollars) (480). The three categories of economy all experience this change and adapt to it with varying degrees of success. One derivative point (among many) that warrants further research by international economists is the need to anticipate the change in comparative advantage. Chenery compares (482) the success of large nations which have anticipated this change by having emphasized export industries in the course of development with those that have not. The nations which remained inward-looking could not escape "the loss in growth that is caused by periodic import shortages".¹²

Myint's task was to incorporate institutional changes as endogenous variables in the analysis of the international allocation of economic activity. No small task! The paper (367-386) emphasizes the implications of domestic institutional factors which shape the ability of the nation to confront the international economic scene. At the beginning, Myint identifies a useful trichotomy of institutions (367): international institutions such as International Monetary Fund or UNCTAD; international linkage institutions such as those considered by Pred and Törnqvist; and the domestic institutions. Analysis of the second set would also have made an interesting paper. Myint is concerned with the elimination of institutional defects within developing nations and how this elimination could lead to a substantial change in the volume and pattern of international trade. In so doing, Myint confronts one of the great weaknesses of orthodox international trade theory as it

relates to developing nations—the assumption that there is an efficient resource-allocating mechanism at work in the developing nation so that its economy responds rationally and efficiently to the conditions in the international market place. (Two examples of this failure are reported by Brookfield, 70-79). The institutional changes which concern Myint are those of inefficient capital markets, dual economies with the traditional sector being the labor-intensive and long-run comparative-advantage sector, the diseconomies of small-scale marketing, and inappropriate governmental policies. Myint shows that a breaking down of these elements could easily generate cumulative and rapid changes which will introduce the traditional sector to the world market and transform the country's pattern of international trade.

In the light of Myint's analysis, the paper of Mabogunje is very interesting (432-447). Rather than concern himself with the problem of how to change the pattern of trade, Mabogunje shows why the existing pattern is inimical to the interests of LDCs and their aspirations. In this paper, there are traces of the thinking of such well-known iconoclasts as J. K. Galbraith, G. Myrdal, and R. Prebisch. Mabogunje's two main concerns are that the LDCs are being "westernized" against their best socio-cultural interests and that the pattern and terms of trade are unfavorable to the developing nations. The concept of outward-directed growth (434-5) and the list of five causes of the negative effects of international trade (434-441) are both well worth noting. The principal culprit for both problems is the MNE which allegedly fails to take into account or to work toward the economic aspirations of the host nation.

What is unsatisfactory about Mabogunje's paper is not that his arguments are wrong or even unreasonable but that the emphasis on what is wrong is not accompanied by much that is realistic as to how change can be

effected. His proposal for partial isolation of the LDC from foreign taste patterns is a little disturbing since autarky has not worked well in Burma and the Galbraithian thesis that people are brainwashed by megacorporations is less than fully substantiated. It is arguable that the materialistic contrivances of the western world are what the citizens of LDCs aspire to. To impose tastes on a nation is a complex ethical problem and is not made any easier by the fact that the master imposers, the Russians, have not had long-lasting success. Nor does Mabogunje confront the fact that the reason for the existing trade pattern is that the LDC has a comparative advantage in primary products. To be sure, this comparative advantage might be stronger under existing conditions than if some of the internal institutional problems could be eliminated. The LDC may well be in a vicious circle in that its need for essential imports is so great that it cannot afford to reduce its dependence on the traditional exports. Under such circumstances, its only hope is for an improvement in the terms of trade. However, the inequality of bargaining strength between some LDCs and some MNEs does suggest that many LDCs do not enjoy the nationhood or economic independence which is built in to the orthodox theory and that this may be the fundamental cause of the gap between theory and reality in so far as it pertains to the problems of LDCs.

The main achievement of this group of papers is to show the need for the creation of a basic model of international trade adapted especially for the developing world. This conclusion would not have been universally accepted by the participants some of whom stressed the relevance of orthodox theory to LDCs and to the questions of policy-formation in general (496-8, 547, 554-6). In the opinion of this reviewer, the orthodox theory in its present form does not carry over successfully to this particular but important

subset of nations. However, the core of trade theory for developing nations will undoubtedly be a direct outgrowth of one of the more complex versions of the H-O orthodoxy. Once this basic model has been constructed, it will serve as a springboard for many adaptations and more-specialized analyses since studies of individual developing nations and groups of nations will undoubtedly require special elaborations of the core theory. Probably such adaptations for LDCs will be much more numerous than the need for adaptations to the orthodox core theory for the study of developed nations. If the prosperity of the developed world hinges on the stability of the developing nations as political entities, as markets for good and as suppliers of goods, then attention to the development of this adaptation must be considered an urgent matter.¹³

Of the other papers presented, Wassily Leontief's (507-530) is the most impressive and ambitious. This is a trade-oriented summary of the global I-O model completed for the U.N. study, *The Future of the World Economy*. People may differ over its relevance but not over the quality and magnitude of the undertaking. Findlay's comment on Haberler and Ohlin (57-60) is an elegant reconciliation of the Ricardian and factor-proportions theories. By tying the argument into the question of the ultimate validity of factor-price equalization, Findlay shows how the existence of industry-specific factors can be used to identify the two theories. If the industry-specific factor is fixed through all time, then the Ricardian model is relevant and factor-price equalization will never be achieved; if the industry-specific factor become malleable with the passage of time, then the H-O theory applies and factor-price equalization will occur. The third general

¹²This concept may help to resolve Kravis' data in Irving B. Kravis, "Trade as a Handmaiden to Growth: Similarities between the Nineteenth and Twentieth Centuries," *Economic Journal* 80, (December, 1970), pp. 850-872.

¹³This process reflects Ohlin's own views on the use and pattern of evolution of international trade theory.

paper to which attention should be drawn is that of Bela Balassa (230–258). His paper reassures international trade theorists by providing empirical evidence that national frontiers do affect both the pattern of international trade and the diversification of industrial production. International trade theory is then something more than a branch of location theory. Balassa confined his attention to western nations but his point is more stark when the focus is on trade between ideological blocs. The importance of national frontiers depends not only on transportation costs and tariffs, but also on communications, informational flows, and the ability of two economic systems to “mesh”. While Basassa’s data are far from perfect, he does show that commercial policies affect the pattern of trade (241) and the degree of industrial diversification (242).

III. The Question of Methodology

The Symposium ended with a joint set of ‘Concluding Remarks’ by W. Max Corden and Findlay (538–550). The discussion following these remarks seems to have split the Symposium into defenders of orthodoxy and its critics and in this it echoed a debate that took place after the first, background papers (96–98) when the limits of a theory were considered. In essence, this debate revolved around the two incompatible positions: one group wondered how far pure theory could be pushed and the other wondered how far the world could be simplified with advantage. On such a subjective point as this, the reviewer should make known his own biases. I view the factor-proportions theory as the crucial contribution to a satisfactory core or basic theory of international trade when it is reinforced with non-competitive goods and several factors of production.¹⁴

¹⁴See my *A Generalized Theory of International Trade*, (London: Macmillan Press and New York: Holmes and Meier, 1976).

I also recognize that there are very well-defined limits at which the general model must be curtailed and developed in a specialized way if it is to be made relevant to a particular problem. For example, adding capital accumulation, population growth and technological advance to a pure factor-proportions theory does not, for me, make the theory applicable to LDCs. By the same token, we cannot expect a general theory of international trade (and location) to explain every minute particular or even every historical fact.

The Concluding Remarks provide a useful basis for amplifying the various facets of this problem of methodology and offer pointers to the way in which international trade (and location) theory should proceed in the post-Stockholm era. The two authors of the Concluding Remarks both are staunch defenders of the orthodox theory: “[t]he challenge to trade theory or trade *cum* location theory is to find some suitably simplified model or set of models that is capable of yielding specific, empirically refutable implications about the international allocation of economic activity in a world in which political boundaries are no longer barriers to the movement of factors in the absence of controls” (547). This is an ambitious task and the authors do offer some indications of the dimensions that they would like to see included. In terms of trade theory they list six additions to the simple factor-proportions theory: more factors, different technologies (production functions), economies of scale, varying factor supplies, dynamic factors, and impediments to trade. To these the authors add locational variables and factor mobility—all to be contained within an equilibrium framework. This list excludes many facets of the problem which were excluded from the scope of the Symposium. Presumably unfettered by these exclusions, Corden and Findlay would have added imperfect competition in factor and product markets, cyclical phenomena and unbalanced

trade in goods and services. To use their own expression: “[s]uch an extensive general equilibrium system, however, would be dangerously close to a map on a scale of one to one” (547). The problem is to find a trade-off between breadth of basic or core theory and the generality of that theory.

By listing dimensions that need to be added to the simple factor-proportions theory, Corden and Findlay seem to advocate a gradual but steady increase in the complexity of the core theory. It may not be necessary for all of the identified variables to be added but the authors do not confront the question of which shall be added and which omitted from the core model. This raises the very important question as to whether the core theory can develop by “inching” along to ever greater complexity and generality by the addition of a variable here and by the elimination of an assumption there. There are three factors which militate against this approach: the difficulties of incorporating some of the conditions in a general equilibrium framework and the limitations of general-equilibrium analysis; the exponentially-increasing complexity of such a model and the possibility of zero marginal returns in insights to added complexity; and the existence of economic rent accruing to internationally-immobile factors of production in limited supply.

To derive a model involving international capital flows in a framework of static equilibrium is impossible even though payments balancing by the appropriate flexing of the exchange rate is allowed for. The flow of repatriated profits would increase through time. The problem is manageable in a dynamic equilibrium only under the most restrictive assumptions whereby the requisite gradual change in the trade (or goods and services) balance through time is somehow built in. But equilibrium analysis (static or dynamic) has another set of dangers—that it generates results that are preordained by the initial conditions. However, complex those

results, they can have little bearing in a world in which functions shift and new variables enter. The importance of shifting functions and other exogenous changes is more important in the international than in any other sphere of economics—if only because, in the international sphere, political conflicts as well as changes in economic conditions occur more frequently and can exert major influences. The introduction (or at least the recognition) of uncertainty is vital and this recognition of uncertainty cannot be rationalized by simple reliance on the probability calculus.¹⁵

The basic or core theory must aim at the provision of a basic body of interdependent causal relationships which will map out the main determinants of international trade (and location). Special problems can be analysed by building a suitable variant on this basic theme so that the additional complexities are custom-made to suit the problem at hand. Increasing the coverage of any core theory on a non-selective basis would involve increasing the complexity of each dimension to the same degree so that the comprehension of the analyst would quickly be exhausted. These special variants are likely to be most subject to empirical test.

Finally, the failure of orthodoxy to pay sufficient attention to natural resource goods (including land with particular locational as well as physical attributes) eliminates much that is relevant. The possibility exists that certain assets earn pure economic rent paid by foreigners will affect both the gains from trade and the pattern of demand importantly. The fact that most LDCs require non-competitive (that is essential) imports to continue to develop suggests that orthodoxy is unlikely to capture the crucial aspects of trade and development without recognizing that for some nations domestic production is not a substi-

¹⁵See Douglas Vickers, *Financial Markets in the Capitalist Process*, (Philadelphia: University of Pennsylvania Press, 1978).

tute for imports. Similarly, the failure to consider natural resources excludes a good deal of MNE behavior. The exclusive emphasis on homogeneous goods tends to neglect the large volume of international trade that takes place among developed, manufacturing nations; this phenomenon cannot be attributed entirely to economies of scale.

Until these questions are confronted and the solutions incorporated into a broad consensus body of theory, international trade theory runs the risk of being seen as a sterile body of doctrine. This is unfortunate because no great quantum leap is required to transform a theory that is built on substitutable

factors into one which countenances the co-existence of non-substitutable with substitutable factors in different countries. The sheer intellectual bravura contained in many writings in the field does not need to be tossed aside. Instead the mental power needs to be directed toward a more pragmatic orthodoxy which can include MNEs and location theory as something other than mere appendages to an elegant, self-contained framework. It is to the credit of Bertil Ohlin that much of what is missing today is adumbrated in his forty-five year old classic and in the Symposium which he organized forty-three years later.