

**Nikolai Ziegler**

**The Political Economy of  
INTERNATIONAL  
TRADE NEGOTIATIONS**

Tectum

Nikolai Ziegler

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# Chapter 1

## Introduction

This book is about a splendid idea whose putting into practice continues to pose grave problems. Neither the idea nor the problems associated with its realization are brand new. To illustrate it, I should like to invoke an *immense discovery* made by the witty French economist Frédéric Bastiat some 160 years ago:

*At a time when everyone is trying to find a way of reducing the costs of transportation; when, in order to realize these economies, highways are being graded, rivers are being canalized, steamboats are being improved, and Paris is being connected with all our frontiers by a network of railroads and by atmospheric, hydraulic, pneumatic, electric, and other traction systems; when, in short, I believe that everyone is zealously and sincerely seeking to reduce as much as possible the difference between the prices of commodities in the places where they are produced and their prices in the places where they are consumed; I should consider myself failing in my duty toward my country if I any longer kept secret the wonderful discovery I have just made. It requires neither plans nor estimates nor preparatory studies nor engineers nor mechanics nor contractors nor capital nor stockholders nor government aid! It presents no danger of shipwreck, explosion, collision, fire, or derailment! It can be put into effect in a single day! Finally, and this will doubtless recommend it to the public, it will not add a centime to the budget; quite the contrary. It was not chance, but observation, that put me in possession of my discovery. I had this question to resolve: "Why should a thing made in Brussels cost more when it reaches Paris?" Now, it did not take me long to perceive that the rise in price results from the existence of obstacles of several kinds between Paris and Brussels. First of all, there is the distance; we cannot traverse it without effort or loss of time, and we must either submit to this ourselves or pay someone else to submit to it. Then come rivers, marshes, irregularities of terrain, and mud; these are just so many more impediments to overcome. We succeed in doing so by raising causeways, by building bridges, by laying and paving roads, by laying steel rails, etc. But all this costs money, and the commodity transported must bear its share of the expenses. There are, besides, highway robbers, necessitating a constabulary, a police force, etc. Now, among these obstacles between Brussels and Paris there is one that we ourselves have set up, and at great cost. There are men lying in wait along the whole length of the frontier, armed to the teeth and charged with the task of putting difficulties in the way of transporting goods from one country to the other. They are called customs officials. They act in exactly the same way as the mud and the ruts. They delay and impede commerce; they contribute to the difference that we have noted between the price paid by the consumer and the price received by the producer, a difference that it is our problem to reduce as much as possible. And herein lies the solution of the problem: Reduce the tariff. [Bastiat 1845, 13]*

The discovery has by no means become obsolete. Reducing government-imposed trade barriers continues to be a worthwhile project that, even in our current era of globalization, holds out enormous welfare gains for the world as a whole and particularly its poorer parts.

Indeed, the idea has recently been rediscovered by a panel of 55 renown economists from all disciplines and backgrounds, among them five nobel laureates, that convened in Copenhagen in May 2008 to tackle a daunting but very important task. Namely to identify the most pressing global problems and to prioritize their possible solutions. In particular, the experts' assignment was to allocate a fictive amount of \$ 75 billion such as to "make the world a better place". To this end, sound cost-benefit calculations were carried out so as to identify the most efficient ways to arrive at compassionate solutions. In the run-up to the conference, a list of ten global challenges was agreed on which included *global warming, communicable diseases, conflicts and civil wars, lack of education, poor governance and corruption, hunger and malnutrition, women and development, air pollution, water and sanitation* as well as *trade barriers and subsidies*.

Each of these challenges received the advocacy of an expert in the field that would numeralyze the benefits and costs of alternative ways to meet the respective challenge and would make the case for giving priority to his or her problem of expertise and heart. The ultimate aim of the project was to reach consensus about the urgency and the financial commitments with which to address these global challenges. Despite the diversity of their backgrounds and philosophies, the panel members reached a remarkable degree of accord on the order and intensity that the problems should be dealt with so as to maximize global net benefits. The resultant list of prioritised options is known as the "Copenhagen Consensus". Only behind *alleviating malnutrition and hunger*, the ultimate ranking identifies *reducing trade barriers and subsidies* as second place in terms of the benefit-cost-ratio. As it does not require large monetary investments, as it would benefit rich and poor countries alike and as it would entail greater prosperity, addressing the world's number two problem would imply that there will be more resources to devote to other issues.

The "immense discovery" could thus serve as a catalyst for meeting other challenges. While provision of micronutrients containing vitamin A and zink is the preferred remedy against the number one problem, the Copenhagen Consensus views advancing the WTO's Doha agenda as the best cure for the problem ranked second.<sup>1</sup>

However, as up to date as the splendid idea itself are the difficulties associated with putting it into practice. Only three months after the nomination of the Doha agenda as second most worthwhile project, the WTO negotiations were suspended in disagreement for the umpteenth time. Started in November 2001, they had been scheduled to finish by January 2005. Apparently, governments find it extremely difficult to follow Bastiat's simple and ingenious advice – despite the negligible monetary costs. Basically, the reasons for that difficulty are very similar these days, too. Already Adam Smith noted that

<sup>1</sup> The scholarly debates leading to the Copenhagen Consensus 2004, when a very similar process was carried out for the first time, are reproduced in Blomberg (2004). The main results are summarized in Blomberg (2006). The debate that lead to the updated Consensus is not yet available in print. The project's website can be retrieved at [www.copenhagenconsensus.com](http://www.copenhagenconsensus.com).

"people of the same trade seldom meet together, even for merriment and diversion, but the conversation ends in a conspiracy against the public" [Smith 1776, Vol. 1, Chapt. X]

– an observation that is still at the heart of the reasons why liberalizing trade seems so difficult nowadays. Seldom are trade policy decisions taken with a view to *Salus Publica*. More often than not are such decisions influenced by people of the *same or similar trades* that tacitly conspire against the public. Once again, Bastiat can be resorted to for an explanation as to why bringing his discovery to fruition is so toilsome: attempts to do so tend to immediately provoke resistance such as the Petition

*From the Manufacturers of Candles, Tapers, Lanterns, Candlesticks, Street Lamps, Snuffers, and Extinguishers, and from the Producers of Tallow, Oil, Resin, Alcohol, and Generally of Everything Connected with Lighting*

*To the Honorable Members of the Chamber of Deputies.*

*Gentlemen!*

*we are suffering from the ruinous competition of a foreign rival who apparently works under conditions so far superior to our own for the production of light that he is flooding the domestic market with it at an incredibly low price; for the moment he appears, our sales cease, all the consumers turn to him, and a branch of French industry whose ramifications are innumerable is all at once reduced to complete stagnation. This rival, which is none other than the sun, is waging war on us so mercilessly that we suspect he is being stirred up against us by perfidious Albion, particularly because he has for that haughty island a respect that he does not show for us. We ask you to be so good as to pass a law requiring the closing of all windows, dormers, skylights, inside and outside shutters, curtains, casements, bull's-eyes, deadlights, and blinds – in short, all openings, holes, chinks, and fissures through which the light of the sun is wont to enter houses, to the detriment of the fair industries with which, we are proud to say, we have endowed the country, a country that cannot, without betraying ingratitude, abandon us today to so unequal a combat. Be good enough, honorable deputies, to take our request seriously, and do not reject it without at least hearing the reasons that we have to advance in its support. First, if you shut off as much as possible all access to natural light, and thereby create a need for artificial light, what industry in France will not ultimately be encouraged? If France consumes more tallow, there will have to be more cattle and sheep, and, consequently, we shall see an increase in cleared fields, meat, wool, leather, and especially manure, the basis of all agricultural wealth. If France consumes more oil, we shall see an expansion in the cultivation of the poppy, the olive, and rapeseed. These rich yet soil-exhausting plants will come at just the right time to enable us to put to profitable use the increased fertility that the breeding of cattle will impart to the land. Our moors will be covered with resinous trees. Numerous swarms of bees will gather from our mountains the perfumed treasures that today waste their fragrance, like the flowers from which they emanate. Thus, there is not one branch of agriculture that would not undergo a great expansion (...)* [Bastiat 1845, 13]

The chief problem about exploiting the immense discovery consists in overcoming the resistance of groups that have a vested interest in its oblivion. Among the factors that make

for the difficulties associated with liberalizing trade in general and with advancing the Doha agenda in particular, modern contemporaries of the candlemakers ridiculed here rank high. These tend to find a host of arguments why the discovery be tried another day or – even better – not at all. And, more often than not, these arguments tend to encounter sympathetic ears on governments' side.

From an economic perspective, the problems that motivate governments to meet and engage in endless negotiations about doing what they should be doing in their own countries' best interest is hard, if not impossible, to grasp. It is no less puzzling than 160 years ago that governments are evidently willing to block up their countries' harbours with artificial concrete walls on the grounds that other countries have rocky coasts. It is as peculiar as then, that the same governments would engage in lengthy negotiations with other governments and signal willingness to unblock their harbors if other governments promise to do something about the accessibility of theirs. It is as curious as then that governments would only tear down their artificial walls upon suspicious and jealous inspection that their negotiating partners honor their obligations and that they would threaten to build the walls up again in the event that obligations are not met. To make any sense of these peculiarities, a *political economy* perspective must be assumed. Hence the title of this book.

As matters stand, at least from an economic point of view, as regards the virtue of trade liberalization we do not have a *cognition* but an *implementation* problem.<sup>2</sup> To make things worse, we have only *partial cognition of the implementation problem*. That is to say, we do not fully understand wherein the problem lies that governments are out to solve when they meet again and again, over the course of several years in Geneva and around the globe, and we do not fully understand what prevents them from simply implementing welfare enhancing trade policy reform on their own. On top of that, we know even less about *possible solutions to the implementation problem* but are confronted with a great many, mostly contradictory, proposals.

Is the current trend toward regional integration to be greeted with a smile or with a frown? Is reducing the agenda likely to alleviate or aggravate the implementation problem? Is flexibility regarding governments' assumed obligations, such as embodied in the concept of special and differential treatment, more likely to facilitate or to complicate implementation of the discovery?

Inherent to this plurality of diverse, mostly mutually incompatible, proposals as regards solutions to the implementation problem is the danger that we lose sight of what we know for sure. Namely the unqualified superiority of trade liberalization. Particularly among non experts of trade theory, the hard to overlook variety of proposals and often fierce debates about how to solve the implementation problem tends to obscure the splendor of the original discovery. Ambiguities pertaining to the means risk distraction from the unambiguity of the end. An inventorizing and clarifying exercise seems worthwhile.

This dissertation seeks to delve deeper into the theories that may explain what actually seems to hinder governments around the world from simply making use of the splendid discovery. Ultimately, the aim would be to identify some *adjustment screws* that may be turned

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<sup>2</sup> This wording is borrowed from German chancellor Merkel who thus described the need for social security reform in Germany.



so that the candlemakers' supremacy will eventually fade and trade negotiations will work more smoothly. Searching for such *blockade solvers* and scrutinizing their compatibility with governments' motives and incentives may serve to identify viable ways forward on the road toward freer trade.

Yet, given that the prevalence of protection can only sensibly explained with recourse to political economy, such *road pavers* must duly appreciate the political economy constraints within which trade negotiations take place and the incentives governments face. Unless these are properly understood and duly taken into account, repulsive road pavers would amount to putting new coating on dead end streets – negotiation deadlock would only be reached faster. Road pavers must thus be considered from a political economy angle.

The project thus serves a dual purpose: The *first goal* would be to take stock of, where appropriate add to, and finally bring together under one umbrella the various theoretical explanations for the difficulties of implementing trade liberalization. Thus, a refined and comprehensive picture of the nature of the dilemmas that governments apparently find themselves in could be drawn. This would amount to furthering the understanding of the problem and would be conducive to a *clarification* of the debate over means. Indirectly, this would also reduce the risk that the end escapes sight. The *second goal* would be to build on the refined picture and *contribute* to the debate over means and identify promising ways forward.

**The book is organized as follows:**

**Chapter 2** justifies the intellectual quest and illustrates why trade negotiations are an issue at all. While both globalization's critics and enthusiasts are united in their assessment that the current extent to which economies are integrated is unprecedented, looking at the degrees of openness necessitates a qualification of the uniqueness of contemporary states of trade integration. Even if this qualification is accepted, the integration of world markets, i.e. mobility of goods, services and factors of production still seems remarkable. At the same time, trade negotiations tend to take ever longer. This prompts the question whether the gains from liberalization (and those from negotiating about it) are subject to diminishing returns. Given that trade barriers are at historically low levels, should political capital (and academic effort) not better be invested in activities that provide higher returns? Thence **chapter 2** inventories existing trade barriers, assesses their welfare costs and subsequently gauges the benefits that are still to be had. This reveals substantial opportunity costs of not negotiating – and not liberalizing. Both from an efficiency and an equity angle, the stakes are high. Thinking about how to bring about further liberalization is found to be not merely an intellectual exercise but also economically warranted. Hence, the mission is not aborted but continued with **chapter 3**.

This lays the theoretical foundation and is a core part of the thesis. It seeks to collect under one umbrella existing theoretical explanations and enriches these with own conjectures, contemplations, modelling exercises and cliometric excursions. All this to answer three questions:

- (1) *why does the political process usually favor protectionist interests?*
- (2) *under which circumstances may this general rule temporarily be suspended?*
- (3) *what purpose do trade agreements, which apparently are what governments strive at when they meet to negotiate, fulfill?*

The first question describes the well established research program of endogenous protection and is addressed in **section 3.1**. Answering the second requires a more extended collection tour through the branches of political economy as the theory of endogenous liberalization is comparatively underdeveloped. Nevertheless, **section 3.2** identifies factors that may induce the suspension of the general rule. These are mirrored against a historic precedent of endogenous liberalization from Victorian England: in the Repeal of the Corn Laws, almost all of the identified factors can be traced. **Section 3.3** seeks to answer the third question. This is the most difficult of the three since existing theoretical contributions offer contradictory explanations and work within quite different analytical frames. To collect all possibly relevant rationales for trade agreements, an even longer tour along the pedigree of economic subdisciplines is required. Upon return from that tour, I shall offer an additional explanation that differentiates distinct purposes of trade negotiations and agreements. Finally, the section addresses *reciprocity*, a prominent feature of trade agreements and negotiations, which is particularly difficult to rationalize in theoretical terms. However, borrowing from evolutionary economics, a remote kin in the family of economic disciplines, I shall present some arguments as to why the principle of reciprocity is more than an atavist remnant of mercantilism. In fact, to the extent that the benefits of trade agreements have public goods characteristics – another issue addressed in section 3.3. – this principle fulfills an important function and deserves better than being contemptuously called "diplomats' economics".

Chapter three is rather voluminous. However, a broad theoretical basis that takes into account as many conceivable answers to questions (1) – (3) as possible is prerequisite to identifying the right insertion points for road pavers toward smoother negotiations and more liberal outcomes. A thorough apprehension of governments' incentives and motives is necessary if measures are to be viable and incentive compatible.

To compensate, **chapter four** is much shorter and constitutes the link between the two purposes outlined above. Its first section provides an overview of the several tracks that can be followed toward liberal trade policies. Its second section introduces the two-level-game metaphor that brings into focus the domestic-international entanglements which characterize trade negotiations. While the different tracks will only occasionally be referred to where they seem relevant, the two-level-game metaphor will have formative influence on the following chapters and sections. This is because that lense lends itself to studying the trade liberalization problem from two diverse but interrelated perspectives, namely the domestic and the international one. Potential road pavers to facilitate the transition to free trade can be found on both the domestic and the international game boards. The two subsequent chapters will thus pick up this dichotomy and discuss a number of strategic levers that may be deployed on each level. As it will turn out, and as the two-level game metaphor predicts, the dichotomy must not be confused with impermeability: at times, potentially sensible domestic policies may appear less sensible when the international dimension is taken into account and vice versa.

While the academic approach in the first four chapters mostly involved hunting and gathering and extensive rambles through the terrain of economic theory to the end of collecting bits and pieces that may serve as building blocks for comprehensive answers to questions (1) to (3), I now eventually become sedentary and engage in some husbandry of my own.

In accordance with the permeable dichotomy between the domestic and international games played by governments involved in trade negotiations, **Chapter 5** discusses potential road pavers that may work on the domestic gameboard. These include the strategies of *transparency*, *delegation* and *compensation*.

By the *transparency* strategy, discussed in **section 5.1.**, I understand measures that are directed at increasing public awareness about the costliness of trade protection and about alternative ways to reach policies' official aims at lower costs. The basic mechanism amounts to the "Dracula effect"<sup>3</sup> according to which the mere act of recognizing bad trade policies triggers corrective responses – just as exposing evil to sunlight helps to destroy it. This section starts out with a general discussion of how this strategy is supposed to work, followed by a model-based analysis of the circumstances under which governments may find it worthwhile to lift some fog they before had found optimal to create. Finally, a case study serves to illustrate this strategy's potential effectiveness and to make some inferences as to its general applicability. This case study relates to Australia, where transparency has been instrumental to converting an outspokenly protectionist to one of the most open and outward-oriented OECD countries.

The *delegation* strategy discussed in **section 5.2.** consists in transferring trade policy competence to an agent that is more detached from the political process. With the clear parallel to be found in the realm of central banking, in trade policy, such delegation of competence may solve problems that are related to industries' regional concentration and the resultant effects on political clout. The appraisal of that strategy starts with an illustration of its general mechanism, followed by a short tour of existing theoretical models of how it may function and a more extended case study that pertains to the United States. There, the delegation strategy has arguably been put to good use in the aftermath of the Great Depression.

To complete the trilogy of domestic strategies, **section 5.3.** discusses *compensation* which involves transfers from the prospective gainers to the prospective losers from liberalization. This almost ancient proposal is studied in greatest depth. A survey of general problems of this strategy is followed by the confrontation of two existing theoretical accounts of it that deliver contradictory recommendations. Finally, with explicit reference to the two-level-game metaphor, I shall present an own theoretical argument. Pointing to additional incentive constraints, this brings to the fore additional aspects to the disfavor of the compensation strategy.

In **chapter 6**, gameboards are switched and the arsenal is replenished with strategies that primarily work on the international level. These include *issue linkage*, *formula based negotiation techniques* and *compensation between – rather than within – countries*.

The prelude to trade negotiations is the equally important exercise of setting the agenda. This determines the applicability of issue-linkage, a well-honed technique of international negotiations whose merits and demerits are canvassed in **section 6.1**. If wisely done, forging linkages between issues enhances cooperation and widens the realm of mutual benefit. By contrast, unlucky linkages have the opposite effect and decrease the prospects for cooperation. As regards the decisive question, what makes for a lucky linkage?, some inferences are made. The discussion of the strategy's general mechanism is followed by a case study from the Uruguay Round. There, the linkage strategy was intensively used in its most drastic form,

<sup>3</sup> This term is borrowed from Bhagwati (1988, 85).

the so-called Single Undertaking. Meanwhile, this arrangement is by many seen as a too rigid and too drastic application of the strategy and held responsible for protracted negotiation deadlocks. Critics favor the variable geometry concept, a more flexible approach that implies weaker linkage between issues. This debate, whose outcome seems crucial to the fate of the Doha agenda if not the development of the multilateral trading system, is hitherto remarkably atheoretic. Therefore, I engage in game theory-inspired contemplations as to the ideal intensity of linkage and present an alternative negotiation structure. This would seek to combine the benefits and preclude the costs of the either too rigid or too flexible arrangements that dominate the discussion.

Agenda setting concluded, **section 6.2.** deals with the negotiation process proper and focuses the strategy of applying formula-based negotiation techniques. Compared to traditional request-offer procedures, such are deemed advantageous insofar as they reduce governments' discretion and make it more difficult for politically influential industries to receive special treatment. However, formula approaches entail problems of their own. The devil hides in the details and is well-disposed to act on behalf of special interests. The general discussion of the strategy is followed by case studies from the most recent Doha Round negotiations. From these, inferences regarding the strategies' applicability to and aptitude for different issue areas are made.

Completing the trilogy of strategic levers employable in the international game, the compensation approach reappears in **section 6.3.** Albeit this time with countries instead of firms or individuals as beneficiaries and financiers. Unlike the preceding chapters and sections, the disquisition of "compensation gone international" occurs with the narrative plot reversed: a delineation of the still cloudy concept of "Aid-for-Trade", a concrete proposal circulating in the current debate, precedes the general estimation of functions that this concept may fulfil. The motivation for going from concrete to general is twofold: As a practical matter, there exists to date practically no theoretical work that could be consulted as regards the generic operation of this strategic lever. While the well-tilled field of aid-versus/and-trade from development economics allows some inferences, it fails to take into account the *sui generis* nature of the ideated transfers. Second, as a matter of literary exposition, this sequence allows me to bend the bow to the preceding chapters and sections. Making virtue out of necessity, a confrontation of the Aid-for-Trade proposal with intuitions gained earlier takes the venture back full circle.

Finally, **chapter 7** pools insights.

The mission can thus be stated two ways:

Narrowly and somewhat presumptuously defined, the mission is to identify road pavers for liberalization, test their aptitude and thus seek effective remedies for the implementation problem. This would be tantamount to seeking to contribute to solving the second most important global challenge.

More broadly and more modestly defined, the mission is to bring some clarity into the debate by collecting and assembling the plethora of differing explanations and interpretations about what prevents governments from following the splendid idea, about what motivates them to engage in trade negotiations and to what ends they seek trade agreements. With these motivations well understood, some conceivable solutions may be surveyed so as to

make inferences about their viability and mutual compatibility. This would be equipollent to furthering the understanding of wherein the implementation problem really lies.

Before starting off, it seems useful to briefly sketch the research gaps and pinpoint where this dissertation contributes to closing them. In answering the questions (1)-(3) above, as well as in seeking and analyzing potential road pavers for more fruitful trade negotiations, a number of theoretic tesserae can be built on. Yet, to complete the mosaic, some must be reassembled and some spaces be filled. Most of the tesserae belong to one of three classes:

A full-grown *theory of endogenous protection* provides explanations why trade is not so free as would be the economist's prescription. These theories have seen a convergence to the Grossman and Helpman (1994) model.

An adolescent political economy *theory of trade agreements* presents a bunch of motivations why governments seek these and negotiate to that end. However, a consensus is not in sight as the proponents of the leading models – Ethier (2004) and Bagwell/Staiger (2002) – deny each others' approaches any relevance.

Compared with its two elder relatives, the *theory of endogenous trade liberalization* is in a state of infancy. In fact, upon a closer look, kinship appears to be only remote. The manifest idea, that a simple inversion of arguments should suffice, turns out to be a sophism.

To the first class of theories, this dissertation has nothing to add. Yet, these are not leapfrogged as principal insights from there serve as building blocks for my own ideas. To the second class of theories, a modest contribution consists in collecting the circulating modelling approaches, contrasting their implications and checking their mutual compatibility. Moreover, some new explanations for some of the peculiarities of trade negotiations and agreements are provided. However, in that it explores ways to shift political equilibria so as to produce more liberal outcomes, this book's major contribution is to the benefit of the most indigent of the triplets, i.e. the third class of theories.

While none of the strategies applicable on the domestic or international level are a genuine idea of mine, the corresponding analyses produce some new insights: Starting at the domestic level, the *transparency* strategy has never been fully spelled out let alone been analyzed in a systematic way. By contrast, the *compensation* strategy has been known since long and also been addressed in political economy models, but its strategic dimension has so far been overlooked. Similarly, the *delegation* strategy has a long tradition in the realm of monetary policy, but has to date only hesitantly been applied to the trade field. While not coming up with new modelling attempts, this dissertation makes some new inferences from the existing ones. Turning to the strategies applicable on the international level, the *linkage strategy* has the longest tradition. Again, the value added consists in thoroughly compiling existing modelling approaches, gauging their relevance for trade negotiations as well as in deriving their implications for the design of a promising negotiation structure. Moreover, the remarkably understudied issue about the ideal linkage intensity is picked up and the informal debate about the Single Undertaking is cast in more analytical terms. By contrast, the part on *formula based negotiations* mostly involves echoing others' arguments about the usefulness of such a negotiation approach and its aptitude for the various areas as well as tracing the record of that strategy in the Doha Round negotiations. Beyond the merit of accountancy – neither an inventory of arguments nor a detailed record of events existed before – there is

comparatively little value added to claim credit for. More of that is contained in the analysis of the *Aid-for-Trade strategy*. With no theoretical work done yet, the contemplations offered there start from scratch and build on the insights developed over the course of the preceeding sections.

In short: rather than offering old wine in new bottles, this book seeks to offer some new wine in old bottles. Moreover, while not all the wine is new, the assortment of the bottles is. A la santé!

## Chapter 2

# Gauging The Stakes of Multilateral Trade Negotiations

In a world of scarcity, why should precious time and resources be allocated to the examination of the political processes aiming at multilateral trade liberalization ?

A glimpse at Figure 2.1 may let this appear outright superfluous. After all, trade has been on the rise for decades. The share of world production that is traded across borders has grown continuously, a trend that made "Globalization" – the catch-all term for the movement toward more inclusive trading networks – the buzzword of our times and may well be expected to last.

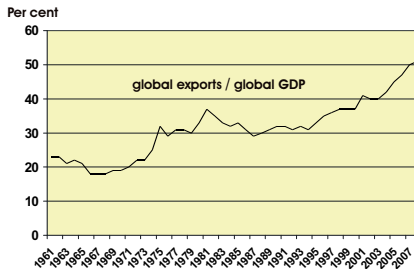


Figure 2.1: Global exports of goods and services as a share of world GDP. Source: World Development Indicators 2007.

Meanwhile, globalization's skeptics deem it the culprit for various unfavourable developments, such as the rising wage inequality in the US or – the flip side of the coin in the presence of inflexible labor markets – persistent high unemployment among low-skilled workers in Europe (Wood 1995) as well as the perceived increased job insecurity and the alleged incapability of states to fulfill the redistributive and allocative tasks assigned to them (Sinn 1998). The notion that the rising tide of globalization has meant growing economic insecurity and likely necessitates governments to cut back on their spending to shelter against this felt insecurity in the face of fierce international competition and a mobilized tax base has become almost conventional wisdom (e.g. Iversen/Cusack 2000).

Some of these reservations against ostensibly tight integration have even been endorsed by economists and the question "*has globalization gone too far?*" – title to a much discussed book by Rodrik (1997) – would be answered in the affirmative by a substantial part of the general public in OECD countries. Scholarly research examining public opinion on the trade issue has concluded that a substantial proportion of voters in the United States and in other western economies may favor new trade restrictions, see e.g. Scheve and Slaughter (2004) or Mayda and Rodrik (2005).

Among the economists' guild however, the general rule that asking two professionals yields at least three conflicting opinions (all of which can be expected to be valid under the specific assumptions) does not hold for the question of economic integration:

The idea that restrictions on trade flows are generally welfare reducing and should best be done away with is one of the most unequivocally accepted propositions among economists (Frey et al. 1984, 988). It took nobel laureate Paul Samuelson some thirty years to provide a satisfactory response when asked by mathematician Stanislav Ulum to name one proposition from social sciences that is both true and non-trivial. The compelling argument was the Ricardian theory of "comparative advantage", i.e. the demonstration that trade is mutually beneficial even when one country is absolutely more (or less) productive in terms of each and every commodity.<sup>1</sup>

*"That it [the theorem] is true need not be argued before a mathematician; that it is non-trivial is attested by the thousands of important and intelligent men who have never been able to grasp the doctrine for themselves or to believe it after it was explained to them."* [Samuelson 1969, 9]

Established by Ricardo (1817) the theorem states that specialization based on *comparative* advantage and subsequent trade is beneficial for the world as a whole as well as any country involved, that is even for a country that is absolutely disadvantaged at producing any of the tradable goods. Thus, Adam Smith' doctrine of specialisation according *absolute* advantage

*"If a foreign country can supply us with a commodity cheaper than we ourselves can make it, better buy it of them with some part of the produce of our own industry employed in a way in which we have some advantage"*

which rests on the observations that

*"a taylor does not attempt to make his own shoes, but buys them of the shoemaker. The shoemaker does not attempt to make his own cloaths, but employs a taylor. The farmer attempts to make neither the one nor the other, but employs those different artificers (...)"*

and that

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<sup>1</sup> In 2004, the same Samuelson published a well received paper which was perceived as an elder's scepticism and sparked the so-called Samuelson-Bhagwati controversy. Notably, the older Samuelson's argument does not qualify Ricardo's basic proposition. It only points out to the (never disputed) theoretical possibility that trade would not be mutually beneficial – in which case it would not occur either. The controversy (see Samuelson (2004) and Bhagwati, Panagariya, and Srinivasan (2004)) thus basically boils down to hot air and does not distract from, let alone contradict, the younger Samuelson's case.



*"What is prudence in the conduct of every private family, can scarce be folly in that of a great kingdom"* [Smith 1776, Book IV, Chapt. II]

was extended and an additional rationale for the welfare enhancing properties of unimpeded international trade discovered. However, while the concept of comparative advantage is so basic to economic analysis of international trade and economic thought in general and its theoretical validity remains largely undisputed, the consequences of its application are viewed controversially: Beyond criticizing the distributional effects of trade induced by comparative advantage (stemming from differences in factor proportions) that were first illustrated by Stolper and Samuelson (1941) and Rybczynski (1955), some commentators – notably from an economics background – even question the concept’s applicability to the current patterns of globalization: alleging that international mobility of the factors of production undermines comparative advantage, Schumer and Roberts (2004) deny that there are gains from trade to be had if factors can relocate to wherever they are most productive.<sup>2</sup> As they see it, some countries would inevitably lose. Evidently, also some economists fail to truly grasp the concept and its implications – despite Haberler’s (1930) demonstration that it also applies to individuals. Hence, appraising the stakes of multilateral trade negotiations requires recapitulating on the sources of the gains from trade. Causes of comparative advantage as well as newer theoretical explanations for the accelerated growth of trade merit some discussion.

## 2.1 Sources of Gain: A brief compendium

### 2.1.1 Traditional theories based on differing productivities and factor endowments

The illustration below depicts transformation curves (TRC) in a Ricardian world that is characterized by two goods, two countries and one factor of production, namely labor.

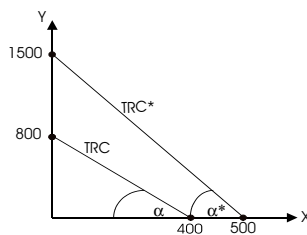


Figure 2.2: Transformation curves in a Ricardian World.

These curves indicate the production (and consumption) possibilities of both countries: If all production capacity were allocated to producing good  $X$  ( $Y$ ), Home would be able to produce and consume 400 (800) units. Accordingly, if Foreign (denoted by  $*$ ) were to al-

<sup>2</sup> Beyond factor mobility, increasing returns to scale have been invoked to question the validity of Ricardo’s proposition under today’s circumstances. See for instance Baumol and Gomory (1996).

locate all its production capacity to producing good  $X$  ( $Y$ ), its consumption (=production) would amount to 500 (1500) units. Production can be split, however, allowing each country to realize any allocation on its transformation curve. Different relative advantages show up in the slopes of the transformation curves which ( $\tan\alpha = -2$ ;  $\tan\alpha = -3$ ) moreover indicate the opportunity costs of producing good  $X$  in terms of good  $Y$ . As the model assumes full employment of factors, any expansion of good  $X$  production involves a contraction in production of good  $Y$ . Evidently, Foreign has an absolute advantage in the production of both goods, its comparative advantage, however, lies in the production of  $Y$  whereas Home has a comparative advantage in producing  $X$ . Given the assumption of perfect competition, prices must equal marginal costs. Hence the slopes of the transformation curves determine relative prices of good  $X$  in Home and Foreign, i.e. independent of demand, depending solely on production capabilities. The demand expansion curve ( $C$  resp.  $C^*$  in Figure 2.3) derives from a system of societal indifference curves; i.e. the aggregation of optimal consumption bundles (for which marginal rate of substitution equals relative prices) over various incomes given the relative prices.

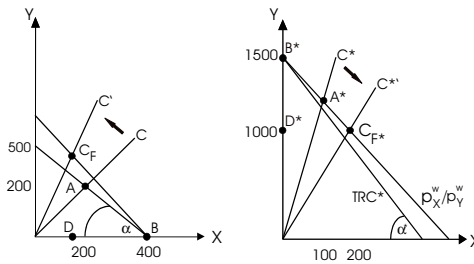


Figure 2.3: General equilibrium in a Ricardian world

If the relative price of good  $X$  decreases (increases), the consumption curve  $C$  (respectively  $C^*$ ) tilts to the right (left) as more (less)  $X$  and less (more)  $Y$  is consumed. Under conditions of autarky, both markets are in equilibrium as consumption and transformation curves intersect, hence Home and Foreign produce and consume at their competitive equilibrium points ( $A, A^*$ ). Allowing international trade to occur, foreign demand for  $X$  will raise its domestic price, while domestic demand for  $Y$  will raise the foreign price of  $Y$ . Finally, as demand shifts to the relatively cheaper goods, prices adjust and converge, leading to a uniform world market price for both goods. Equilibrium price relations are hence  $P_X^W/P_Y^W$ . The shift in the price relations affects both production and consumption. Consumption effects result in the  $C$  ( $C^*$ ) - curve tilting toward  $Y$  ( $X$ ) in Home (Foreign). Production effects result in movements along the transformation curve. As a result, the advantaged  $X$  ( $Y$ )- sector expands at the expense of the disadvantaged  $Y$  ( $X$ ) sector in Home (Foreign). Complete specialization according to relative advantage leads Home (Foreign) to produce at point  $B$  ( $B^*$ ). The new price relation  $P_X^W/P_Y^W$  enables Home – by exporting  $\overline{DB}$  in exchange for imports of  $\overline{DC}_F$  – to realize the consumption point  $C_F$ , that lies beyond the domestic transformation curve. Likewise, Foreign is enabled to consume at  $C_F^*$  by providing exports of  $X$  amounting

to  $\overline{B^*D^*}$  in exchange for imports of  $\overline{D^*C_F^*}$ .

Hence, both countries gain with respect to the autarky case as the new consumption points unambiguously lie on higher indifference curves, despite Foreign having an absolute advantage in the production of both goods. Haberler generalized the Ricardian logic pointing out that comparative advantage need not result from different productivities, but can stem from various other differences. Particularly prominent are differences in factor endowments as suggested by neoclassical economists Heckscher and Ohlin. So called new trade theory discovered other sources of efficiency gains from trade, namely economies of scale and increased product varieties. These latter theories explain the prevalence of intra-industry trade (IIT) between countries with comparative advantages in similar sectors. Hence, for trade to be welfare enhancing, neither different productivities nor factor endowments are required as market structures and technologies provide additional sources of gain.

Figure 2.4 depicts the Heckscher-Ohlin (H-O) case. Here, the countries are identical with regard to available production technologies but differ in the relative abundance of their endowments with the two available factors of production, i.e. labor and capital. The two goods are produced with different factor intensities; production of one good is capital intensive whilst the other is labor intensive.

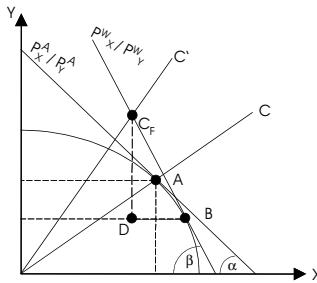


Figure 2.4: General Equilibrium in a Heckscher-Ohlin World.

In this case, different factor proportions are the basic sources of gains from trade: The relatively capital rich country specializes in the production of capital-intensive goods and exports some of these to relatively labor rich countries that in turn specialize in labor-intensive products and export some of these to the relatively capital rich country. The neoclassical conditions of production imply that increasing production of one sector causes marginal cost of producing that good to rise. Changing the production structure shifts the relation of factor prices: Increasing capital-intensive production requires a shrinkage of the labor-intensive sector which releases relatively more labor than absorbed (at given prices) by the expanding sector, thus causing the interest rate to rise relative to the wage rate. Hence the concave transformation curve. In Figure 2.4, the domestic autarky equilibrium is depicted in A, where the domestic transformation curve and consumption intersect (the slope of the transformation curve must equal the slope of the autarky price relation  $P_X^A/P_Y^A$  since the profit maximizing production of both goods implies  $p_i = \text{marginal cost}_i$ ; ( $i = X, Y$ )). Allowing trade to occur gives incentives for expansion of the X-sector and contraction of the Y-sector since price re-

lations change in favor of  $X$  to  $\frac{P_X^W}{P_Y^W} > \frac{P_X^A}{P_Y^A}$ . Thus, production of  $X$  is expanded at the expense of  $Y$  up to the point where marginal costs in both sectors have adjusted to the new price data. Expansion of the  $X$ -sector halts as the increased marginal costs reach the higher world market prices. The changed production structure implies a shift from autarky point  $A$  to production point  $B$  where the slope of the transformation curve equals the slope of the world price relation curve. As a consequence of the risen relative  $X$ -price, consumption structure shifts toward  $Y$  (hence the new consumption curve  $C'$ ). Exporting  $\overline{DB}$  and importing  $\overline{DC'_F}$  allows the realization of the free trade equilibrium  $C_F$  beyond the transformation curve at which the supply is unambiguously superior to  $A$ . Relatively capital-(labor-) abundant countries would hence specialize in the production of capital- (labor-) intensive goods, to the effect that - after exchanging - both countries are enabled to realize consumption points beyond their domestic transformation curves as consumption and production must no longer coincide.

Thus, under the H-O assumptions, specialization according to comparative advantage resulting from different factor endowments provides scope for realizing gains from trade as do different productivities under the Ricardo assumptions. Whilst in the latter scenario, specialization is complete, the H-O-model usually implies incomplete specialization as changing world prices ultimately bring specialization to a halt.

As regards the aforementioned caveat against globalization based on the assumption that due to internationally mobile factors comparative advantages were bound to wane and trade no longer welfare enhancing, rebuttal is easy since there are only two ways by which factor mobility could deprive a country of all comparative advantage and deny it the possibility of gaining from trade: Either, international reshuffling of factors would have to result in every country in the world having the same internal cost structure as regards to every conceivable good and service or it would have to cause a complete withdrawal of all production factors from that country (Boudreaux, 2004, 347ff.)<sup>3</sup>

The concept of comparative advantage suggests that the potential for gains from trade and hence observable trade flows – whether stemming from Ricardian or Heckscher-Ohlin factors – is greater the more diverse countries' production conditions are. Yet, for trade to enhance welfare for all countries involved, comparative advantage based on cost difference is not necessarily required. Later trade theory models consider other sources of gain and thereby provide rationales for the empirically observed fact that trade relations are most intensive between countries of rather similar economic structure and the phenomenon of intra-industry trade.

### 2.1.2 Newer trade theories

While neoclassical economics has long been focused on comparative advantage as explanation for trade, only in the last decades has there been a rediscovery of theories that basically coincide with Adam Smith' view of trade: Concentrating productive efforts on one good and exchanging that for others as a means of getting more of all goods than possibly attainable in autarky. Viewed like that, trade is simply an efficient production technique (Buchanan and Yoon, 2002, 400).

<sup>3</sup> While the first corresponds to a monkey banging on a typewriter and by chance typing Hamlet, the second case corresponds to the absence of trade between earth and jupiter (Boudreaux, 2004, 376).

Figure 2.5 is therefore dedicated to a brief discussion of external economies of scale as one of the many aspects (e.g. tastes for variety, monopolistic competition, product cycles) emphasized by "newer trade theories" that shed light on sources of gain beyond comparative advantage. External scale economies – as modelled i.a. by Baumol and Gomory (1996) – are prominent as average costs of all firms in an industry decrease independently from a single firm's production volume. This implies a convex transformation curve which in Figure 2.5 is assumed to be valid for both countries; consumption and production conditions are identical in Home and Foreign.

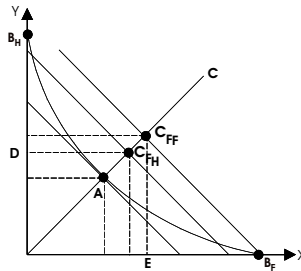


Figure 2.5: Trade under increasing returns

In autarky, the equilibrium  $A$  results for both. As production in  $A$  implies that both  $X$  and  $Y$  production are too low for both countries to exploit increasing returns, the role of trade is immediately plausible: it allows for a complete specialization and superior supply for both countries as home exports  $\overline{B_H D}$  of  $Y$  in exchange for  $\overline{D C_H^F}$  of  $X$  while Foreign exports  $\overline{B_F E}$  units of  $X$  ( $= \overline{D C_H^F}$ ) in exchange for  $\overline{E C_F^F}$  units of  $Y$  ( $= \overline{B_H D}$ ). Thus, the new consumption points  $C_H^F$  ( $C_F^F$ ) are reached.<sup>4</sup>

Hence, economies of scale are an additional source of gain from specialization and trade, independent of the existence of comparative cost differentials. These would be consequence rather than rationale for trade.

Further reasons for welfare enhancing trade may be rooted in factors related to the demand side: The distribution of preferences may be such that foreigners value a domestically produced good more than domestic consumers or consumers may have a "taste for variety", i.e. derive a higher utility from a wider range of product varieties only attainable via trade.

## 2.2 Is trade liberalization subject to diminishing returns ?

The notion of general superiority of openness as opposed to closing domestic markets to foreign producers has been challenged repeatedly. Numerous reasons and motives have been proposed as to why a country might be better off imposing trade barriers: Protecting infant industries, preventing unemployment, maintaining the balance of payments, raising tax

<sup>4</sup> In the special case depicted, quantities produced and thus relative prices and thus terms of trade remain unaffected. If this were not so, the gains of the country whose terms of trade deteriorate would be reduced whilst the other country would additionally realize a terms of trade gain. Nevertheless, both may gain.

revenue are traditional motives, supporting "national champions", protection of labour or environmental standards more recently quoted ones. In almost all circumstances, all of these are found wanting, in the sense that these objectives (if worthwhile) could be reached with lower-cost domestic instruments. Caveats against free trade were theoretically established under various labels but their policy implications have subsequently been empirically dismissed: The practicability of infant industry protection, designed to temporarily shelter a domestic industry from foreign competition so as to assist its gaining competitiveness by making use of learning curve effects (List 1856), and of the implementation of optimal tariffs – motivated by the desire to improve a large country's terms of trade – is highly doubtful.

Interestingly, Paul Krugman, one of the founders of the latest challenge to the notion of unambiguous superiority of free trade has warned against the implementation of so-called "strategic trade policy".<sup>5</sup> Even if theoretically there are conditions conceivable under which some well-designed intervention into the international exchange of goods may be welfare enhancing, e.g. as remedies against external effects, these would constitute second-best approaches almost inevitably entailing unintended side effects in other markets. Thus, as a rule of thumb, openness to trade remains the best policy option for any country short of an omniscient and benevolent dictator. However, as the basic theoretical case for free trade has been circulating for some three centuries and inspired post World War II international economic diplomacy which has brought down the impediments to trade substantially, another basic presumption of the economist's profession could be expected to apply, namely the notion of *diminishing marginal returns*: Apparently, reducing barriers to the international exchange of goods involves political efforts at the supranational level. The perceivably unprecedented level of economic integration poses the question whether the returns to further liberalization are not diminishing; that is whether more efforts toward liberalization of trade would not constitute an overinvestment of political capital. The admittedly crude calculations<sup>6</sup> displayed in table 2.1. suggest that the effectiveness and efficiency of negotiation rounds is not exactly on the rise, to say the least.

Round	Duration (in months)	Return to round (as per centage reduction of weighted average tariff)	Return per month of negotiation
Annecey	8	3	0.375
Torquay	8	4	0.5
Geneva	16	3	0.188
Dillon	10	4	0.4
Kennedy	42	38	0.904
Tokyo	74	33	0.446
Uruguay	91	38	0.416

Table 2.1: Duration of GATT rounds, negotiated tariff reductions and marginal returns to negotiating. Source: Own calculations based on data compiled by the WTO (2007, 205).

<sup>5</sup> Aware that his theoretical contribution lends itself to misuse as a justification for wrongheaded interventionist trade policies, Krugman made it clear on many occasions that he is highly sceptical about its usefulness and importance in practice. See for instance Krugman (1994, 110ff.).

<sup>6</sup> Numbers of participating countries, as well as tariff lines on which concessions were exchanged varied from round to round, moreover areas of negotiation were continuously expanded, making the overall impacts of each round hardly comparable in terms of the average weighted tariff.