

CEP Discussion Paper No 1652

October 2019

**Reopening Pandora's Box in Search of a
WTO-Compatible Industrial Policy?
The Brazil – Taxation Dispute**

**Emanuel Ornelas
Laura Puccio**

Abstract

The Brazil-Taxation dispute concerns the complaints taken to the World Trade Organisation by the European Union and Japan against seven different Brazilian industrial subsidy programmes. One concerned the automotive sector and represents a clear case of policies dictated by strong domestic political-economy forces, with little attention to impacts on consumers or imports. The ensuing WTO dispute raises important issues concerning the WTO-compatibility of subsidy measures. In particular, the Appellate Body (AB) reversed the panel findings with respect to two issues: the extent to which subsidy measures can be exempted from complying with National Treatment rules under the General Agreement on Tariffs and Trade, and the identification of local content requirements (LCRs), which are prohibited under the Agreement on Subsidies and Countervailing Measures (SCM). In particular, the AB considered that subsidies, if not based on discriminatory taxation, could be justified under the GATT and could have some discriminatory elements without violating the National Treatment disciplines. Furthermore, it concluded that legitimate eligibility criteria under a subsidy programme should not be construed as prohibited LCRs under the SCM. However, the test devised by the AB to distinguish legitimate eligibility criteria from prohibited LCRs could facilitate circumvention of the LCRs prohibition under the SCM.

Key words: trade policy, dispute settlement, industry subsidies, international trade rules, national treatment, local content requirements

JEL Codes: F13; F53; F51

This paper was produced as part of the Centre's Trade Programme. The Centre for Economic Performance is financed by the Economic and Social Research Council.

We would like to thank participants in the WTO Case Law of 2019 Conference and especially Chad Bown, Bernard Hoekman and Gabrielle Marceau for very useful comments and suggestions. Ornelas thanks Marcos Ritel for excellent research assistance. Puccio acknowledges the receipt of funding under the H2020 grant agreement project "Realizing Europe's Soft Power in External Cooperation and Trade (RESPECT)," grant agreement no. 77068.

Emanuel Ornelas, Sao Paulo School of Economics-FGA and Centre for Economic Performance, London School of Economics. Laura Puccio, European University Institute.

Published by
Centre for Economic Performance
London School of Economics and Political Science
Houghton Street
London WC2A 2AE

All rights reserved. No part of this publication may be reproduced, stored in a retrieval system or transmitted in any form or by any means without the prior permission in writing of the publisher nor be issued to the public or circulated in any form other than that in which it is published.

Requests for permission to reproduce any article or part of the Working Paper should be sent to the editor at the above address.

1. Introduction

In virtually every country, industrial policy has been or is currently used to promote governments' economic and political objectives. Some programmes are justified as fostering a public interest such as preventing climate change or promoting energy renewables. Others target economically large or growing sectors. Those industrial policies are particularly challenging for trade law and policy, including the World Trade Organisation (WTO). In many cases, the policies are triggered by protectionist motives and favour domestic over foreign producers. While WTO law allows its members to design industrial policies aimed at domestic firms, it disciplines them to prevent adverse effects on international trade flows.

Unsurprisingly, then, an important WTO jurisprudence has developed on the issue of WTO compatibility of industrial policy programmes. One of the main issues concerns the legality of widely used local content requirements (LCRs), which are non-tariff measures conditioning a benefit on the use of local inputs.² Another is whether those industrial programmes could be justified under the general exceptions defined in article XX of the General Agreement on Tariffs and Trade (GATT) and exempted from certain WTO disciplines.³

In 2013 and 2014, the European Union and Japan (later joined by several other countries as third parties) formally complained about the WTO compatibility of seven distinct industrial programmes in Brazil.⁴ Four are related to Information and Communications Technology (the Informatics Program, PADIS, PATVD and the Digital Inclusion Program), hereafter referred to as ICT programmes. Two exempted exporting firms from some taxes (PEC and RECAP). And one offered a series of tax benefits for domestic producers and for the sourcing of domestic inputs used in the production of automobiles (INOVAR-AUTO).⁵ The most contentious issues were related to LCRs and to tax preferences offered to domestic (but not to foreign) producers. Brazil appealed the results of the Panel. In this paper, we critically assess the key findings of the Appellate Body's decision on the case.

Domestic special interest groups in Brazil seem to have been instrumental in the design of the policies disputed by the EU and Japan. And it was no surprise that those policies were challenged in the WTO: as we show, they had very negative consequences on trade flows.

Indeed, based on existing jurisprudence, the case could have been considered straightforward. After all, Bagwell and Sykes (2005) had already argued forcefully that indigenization requirements were clear violations of the GATT⁶ in the context of the *India-*

² See, for example, Hestermeyer and Nielsen (2014) and Sauvé (2016).

³ For example, there is a large literature on whether certain programs aimed at promoting renewables are justifiable under WTO law. See, for example, Rubini (2012), Espa and Duran (2013), Charnovitz and Fischer (2015) and Batra and Bafna (2018).

⁴ The parties agreed to establish a joint procedure, which generated a single joint Panel report: *Brazil – Certain Measures concerning Taxation and Charges* (hereafter *Brazil – Taxation*), WT/DS472/R and WT/DS497/R, adopted on 30 August 2017.

⁵ For the full list of laws, decrees and implementing orders, see section 2.2 of the panel report.

⁶ The Economics literature has also analysed in detail the (typically negative) economic effects of LCRs, the main challenged measures in industrial programmes under WTO law. See, in particular, Grossman (1981), Bagwell and Sykes (2005), and Conconi and Schepel (2017).

Autos case.⁷ However, in this case the Appellate Body (AB) conclusions departed from previous jurisprudence and reversed the Panel's findings on the key issue regarding the exemption from national treatment (NT) disciplines under article III:8(b) of the GATT. The AB report sought to reconcile industrial policy with WTO law without the need to justify certain discriminatory measures under GATT's article XX. However, in doing so it reopened the Pandora's box of what should be considered prohibited LCRs under the Agreement on Subsidies and Countervailing Measures (SCM), as opposed to legitimate eligibility criteria.

The paper proceeds as follows. In section 2, we investigate the causes and assess the consequences of the main programme challenged in the case. In section 3, we summarize the Panel's findings. In section 4, we thoroughly analyse three key issues raised by the Appellate Body's report. We conclude in section 5.

2. The motives and trade consequences of INOVAR-AUTO

Except for INOVAR-AUTO, all other programmes mentioned in the WTO dispute had been in place for several years before the formal consultation requested by the European Union in 2013. Specifically, the four ICT programs were established between 1991 and 2007, and the two export promotion programs were established in 2002 and 2005. The start date of INOVAR-AUTO, on the other hand, was 2012, just before the EU requested the consultation. That timing suggests that the INOVAR-AUTO programme triggered the complaint. It makes economic sense, too, given the large size of the automotive industry and the volume of trade potentially affected by INOVAR-AUTO. Specifically, in 2011 the industry accounted for about 11% of all manufacturing imports in Brazil. Moreover, its share in the country's industrial output has been twice that value in the last decade.⁸ For those reasons, we focus our economic analysis on the causes and consequences of INOVAR-AUTO.

2.1. A brief history of automotive policies in Brazil and the birth of INOVAR-AUTO

Historically, the automotive industry has been one of the main targets of import substitution industrialization programmes in Brazil. Starting in the mid-1950s, the government implemented a series of policies seeking to provide financial incentives through investment and production subsidies and tax exemptions. The policies also included increasing requirements for local content, which exceeded 90 percent by 1960.⁹

Although the net welfare implications of those policies remain unclear, they were very successful in attracting foreign direct investment. The number of automakers in Brazil grew from two in the early 1950s to eleven in 1961; by 1975, Brazil was already the ninth producer of vehicles in the world (Shapiro, 1994). For final producers, that process corresponded to a textbook case of horizontal foreign direct investment, with foreign firms establishing plants in the country in order to "jump" the restrictions faced by exporters (relative to domestic producers) to serve the domestic market. Moreover, because of the demanding LCRs, this

⁷ India - Measures Affecting the Automotive Sector - AB-2002-1 - Report of the Appellate Body, WT/DS146/AB/R; WT/DS175/AB/R.

⁸ <http://www.mdic.gov.br/index.php/competitividade-industrial/setor-automotivo> (last accessed on 13 August, 2019).

⁹ See Shapiro (1994) for a thorough review of the history of public intervention in the auto industry in Brazil.

affected the whole value chain, fostering the growth of a large domestic industry of producers of parts and components for the multinational assemblers.

The specific policies to attract foreign investment were discontinued in the early 1970s, when the sector had already consolidated. However, the automotive industry remained highly protected, insulating the multinationals established in the country from foreign competition on a seemingly permanent basis. That course of action contrasts with the rulebook of import substitution industrialization programs, which prescribes *temporary* protection while the industry is investing and acquiring the scale and the capabilities to compete internationally, but not afterwards. On the other hand, it fits the predictions from standard political-economy analyses, which posit that, once a domestic industry gets large in a protected environment, it is very difficult to take protection away.¹⁰

The landscape changed somewhat in the early 1990s, when the country embarked in a process of widespread trade liberalization that affected virtually the whole economy. By 1994, the import tariff on automobiles and parts had fallen to 20% on average, the lowest in the history of the country (even if still high by international standards). In the second half of the 1990s, however, special tax treatments were once again offered to the automotive industry, import tariffs of up to 70% were re-established, and import quotas (justified under the WTO with balance of payments difficulties) were put in place. The higher import tariffs were partially exempted for the multinationals with investment in the country, conditional on export performance and on the purchase of local inputs.¹¹ Those measures were contested in the WTO by Japan and the United States in 1996 on grounds similar to the ones observed in the current dispute.

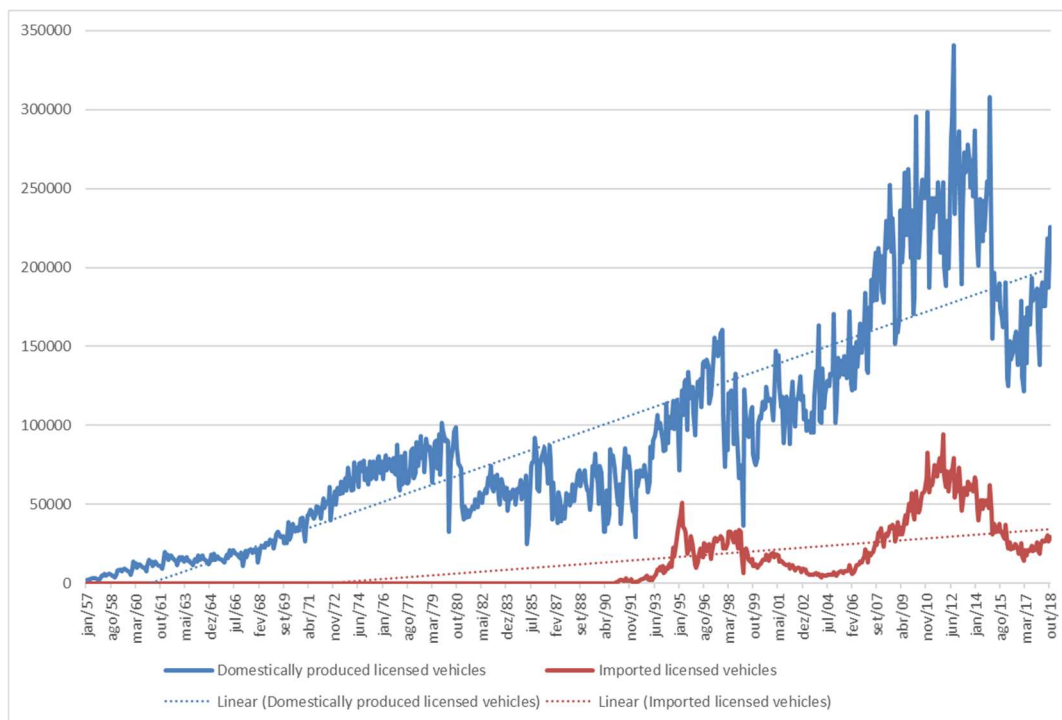
In the 2000s, the automotive sector in Brazil expanded alongside the whole economy. Although the Brazilian economy was affected by the financial crisis of 2008, it recovered quickly. The same happened with the automotive sector. Domestic demand for durable goods, including cars, grew strongly. That fuelled domestic production and, since the mid-2000s, also imports of vehicles, which grew at an unprecedented pace. As Sturgeon et al. (2018) point out, in 2011 imports reached an all-time high of 34.8% of the value of domestic consumption in the sector.

Figure 1 shows the historical series of licensed new vehicles in Brazil, for both domestically produced and imported units. Until the early 1990s, imported vehicles were virtually absent in the country. Sales of domestically produced vehicles grew steadily until the 1980s, when they stagnated, to some extent reflecting a slowing economy. Imports started to kick in only after the trade liberalization of the early 1990s and grew quickly, but were once again tamed by the renewed wave of protectionist policies after 1995. Imports started to recover only in the mid-2000s, and grew strongly until the end of 2011.

¹⁰ For example, in Grossman and Helpman's (1994) influential analysis, the level of protection of an industry is explained largely by the inverse of import penetration, which is high when imports are low. It is also explained by whether an industry is politically organized. In the case of the automotive industry in Brazil, imports have historically been very low and producers have shown to be strongly organized, as the decision to establish INOVAR-AUTO (discussed below) neatly illustrates.

¹¹ See De Negri (1999) for an analysis of the welfare costs of the automotive policies of the 1990s in Brazil.

Figure 1: Monthly licensed vehicles in Brazil



Source of data: Anfavea (<http://www.anfavea.com.br/index.html>)

According to Sturgeon et al. (2018), the steady increase in import penetration of vehicles prompted renewed demand by the domestic producers for a new round of protectionist policies. In 2011, the industry trade group, Anfavea, petitioned the government to implement policies to deter the rapid growth of imports. They were joined by the auto part producers, who requested the establishment of LCRs. Soon afterwards, negotiations with the government led to a 30-percentage point *increase* in the IPI tax (a value-added tax on all industrialized goods) for the sector. While that may appear contradictory, it is fully explained by the fact that, at the same time, the government also authorized tax *credits* of up to the same 30-percentage points of IPI for domestic producers, under some circumstances. Specifically, to qualify for the IPI credits, producers had to purchase enough parts from domestic producers, with the minimum percentage of domestic inputs needed to generate credit for the full 30-percentage points increasing over time.

A cynical may describe those policies as a plot between the government and the domestic industry. The former helps the latter without having to incur any fiscal cost, while attempting to conform to the WTO's NT clauses. The latter benefits from increasing the tax costs of their foreign competitors. No consideration seems to have been given to the potentially large losses for domestic consumers and for foreign producers. Whether or not this characterization is correct, those policies became the keystone of INOVAR-AUTO, the broader set of measures put in place in 2012, which gave tax advantages for producers that were located in Brazil and sourced inputs domestically.

In sum, since the 1950s the Brazilian automotive industry has grown significantly under the shadow of policies that insulated it from foreign competition. The policies protected not only the producers of vehicles but also the producers of inputs, encouraging the development of the whole value chain inside the country.¹² As a result, the industry has become large, being consistently among the top ten in the world.

Size does not imply efficiency, however. As Sturgeon et al. (2018) show, the history of protectionist policies has created an inefficient industry by international standards, which exhibits low scale of production due to fragmentation of the domestic market among several producers. The industry is also scarcely capable of exporting consistently, especially outside the Mercosur customs union that Brazil shares with Argentina, Paraguay and Uruguay. The upshot is an industry characterized by low productivity, high prices and low quality, which survives in its present form because of the renewed waves of protectionist policies. As we will see next, INOVAR-AUTO most likely only helped to perpetuate that scenario.

2.2. The trade consequences of INOVAR-AUTO

To assess the trade consequences of INOVAR-AUTO, we look at imports before and after the establishment of the programme.¹³ The affected industries were:

341 – Manufacture of motor vehicles.

342 – Manufacture of bodies (coachwork) for motor vehicles; manufacture of trailers and semi-trailers.

343 – Manufacture of parts and accessories for motor vehicles and their engines.

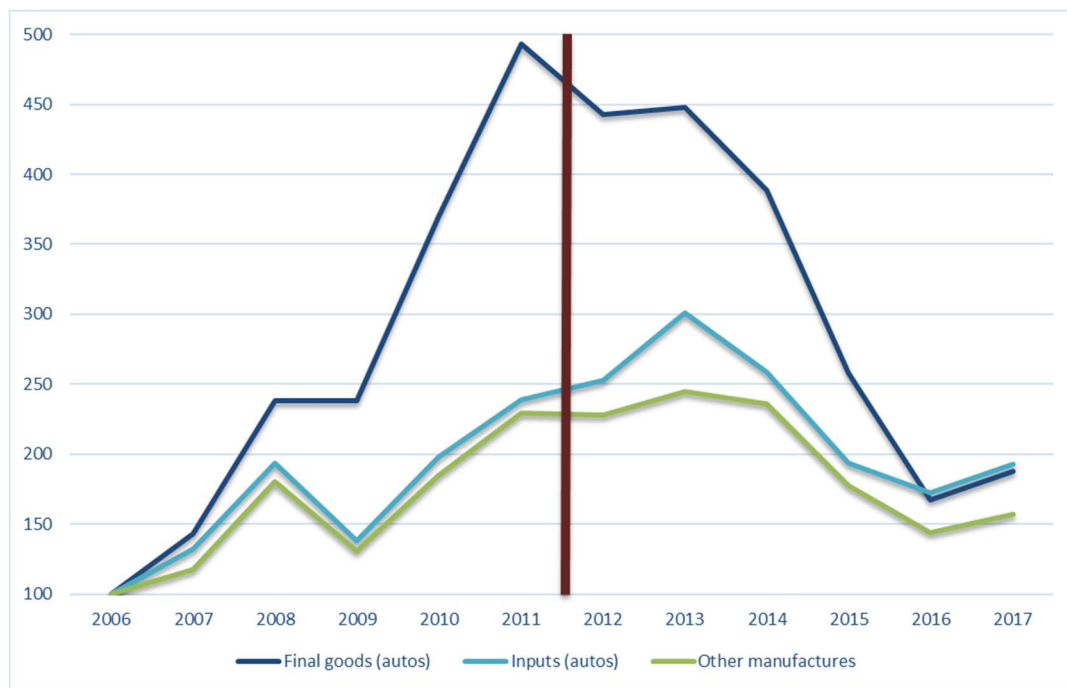
We classify the first two as final goods, and the third as intermediate goods. Since the Brazilian economy went through significant changes right before and right after the introduction of INOVAR-AUTO (strong growth before it, deep recession since 2014), we need a control group. The most natural control group is the remainder of the manufacturing industry, which is similarly affected by domestic and global business cycles but did not benefit from INOVAR-AUTO (or from other similar programmes entering in force in the same period).

Figure 2 shows the value of Brazil's imports of affected final and intermediate goods, as well as other manufactures, between 2006 and 2017—hence six years before and six years after INOVAR-AUTO was put into place. The values are normalized so that, for all series, 2006 corresponds to 100. The figure highlights the dramatic increase in imports of automotive final goods until 2011, when it reached a level almost five times higher than its 2006 counterpart. That swift growth of imports is what led the industry representatives to petition the government for protection.

¹² The MFN tariff for vehicles has been 35% in the last decade, whereas the average MFN tariff on automotive inputs has been approximately 15% during that period. Both levels are remarkably high from an international perspective.

¹³ We use trade data from the WITS database and classify goods according to ISIC Rev 3.0 at the 3-digit level.

Figure 2: Brazil's annual imports (2006 = 100)



Source of data: WITS database

Interestingly, the same pattern was *not* observed for intermediate goods in the automotive industry. True, imports of parts and accessories for motor vehicles and engines more than doubled between 2006 and 2011. However, that mirrored a general trend in Brazil's manufacturing sector. That is, the other manufacturing sectors experienced an average increase in imports during the period that was about the same as that for the inputs of the automotive industry.

The other obvious observation from Figure 2 is that, upon the enactment of INOVAR-AUTO, imports of final goods in the industry fell precipitously. By 2017, it was 60% lower than its 2011 peak. Surely, part of the reduction in imports was a consequence of the recession in the country since 2014. Indeed, this is also the pattern observed in the other manufacturing sectors. However, the fall in imports of automotive final goods started earlier, right after the introduction of INOVAR-AUTO. Moreover, it was much deeper. Hence, at least from a visual inspection, the programme seems to have achieved the goals the producers sought when demanding protection against imports in 2011. Indeed, by 2017 the share of imported over total new licensed vehicles in the country had already dropped to 10.9%.¹⁴ Imports of intermediates for the automotive industry also fell but, once again, followed a pattern similar to the rest of the manufacturing industry.

Now, to be able to say whether INOVAR-AUTO had an impact on trade flows of the affected sectors from a statistical point of view and, if so, estimate its magnitude, we need a proper statistical analysis that controls for confounding factors. We carry out that analysis using data

¹⁴ Data from <http://www.anfavea.com.br/index.html>.

for the period 2006-2017, including the three sectors indicated above and the 54 other manufactures. We compare the growth rate of the affected sectors before and after INOVAR-AUTO with the growth rate of the unaffected sectors before and after the programme. Importantly, we disentangle the effects of the programme from other factors that affected both all sectors in a specific year (like the recession) and a given sector throughout the whole period (e.g., sector-specific technological shocks).¹⁵

In line with what Figure 3 suggests, we find that the impact of INOVAR-AUTO is restricted to final goods and is indeed very large and statistically significant, slashing the growth rate of imports by 21 percentage points. Thus, if the goal of the programme was to reduce the pace of import growth of final automotive goods, it was a tremendous success.

We also estimate the impact of INOVAR-AUTO on imports in a more disaggregated way, considering bilateral trade flows. This allows, in particular, the evaluation of whether the complaining countries were affected differently from other importers.¹⁶ We find that INOVAR-AUTO reduced the growth rates of bilateral imports very significantly from both a statistical and an economic standpoints, but *only* for the countries that formally complained in the WTO. Moreover, we confirm that the effect is restricted to automotive final goods. Interestingly, we find that, for non-complaining countries, INOVAR-AUTO actually helped them to export to Brazil.

Now, in any programme of import substitution industrialization, the expectation is that the domestic industry will eventually become able to compete domestically and abroad with foreign firms. Perhaps because this goal was not achieved in the previous 57 years of protection to the sector, INOVAR-AUTO added explicit targets for fuel efficiency and for the promotion of research and development. Those goals were not present in previous programmes that targeted the automotive industry in Brazil. If effective, more R&D would increase the quality and lower the cost of domestically produced vehicles, whereas better fuel efficiency would help domestic firms compete in the global automotive marketplace.

¹⁵ Specifically, we estimate the following “differences-in-differences” econometrics specification:

$$\log(M_{it}) - \log(M_{it-1}) = \beta_1(IA_i \times POST_t \times FINAL_i) + \beta_2(IA_i \times POST_t \times INPUT_i) + \alpha_i + \alpha_t + \varepsilon_{it},$$

where M_{it} denotes Brazil’s imports in sector i in year t ; IA_i is an indicator variable that is one if the sector was a target of INOVAR-AUTO and zero otherwise; $POST_t$ is an indicator variable that is one if the year is 2012 (the year INOVAR-AUTO was introduced) or later and zero otherwise; $FINAL_i$ is an indicator variable for final goods; $INPUT_i$ is an indicator variable for intermediate goods; and α_i and α_t are fixed effects that control for the average levels of imports, respectively, of sector i across all years and in year t across all sectors. ε_{it} is an error term. Parameters β_1 and β_2 represent the impact of INOVAR-AUTO on the growth rate of imports in the affected sectors, relative to the unaffected ones.

¹⁶ For that analysis, we use a “long difference,” where for the pre-programme period we calculate the log difference between 2011 and 2006 and for the post-programme period we calculate the log difference between 2017 and 2012. We use fixed effects at the sector-exporting country and the year-exporting country levels to control for the average levels of imports in a sector coming from each country across years and for the average levels of imports in a period coming from each country across all sectors. We also allow for heterogeneous effects on imports coming from complaining and non-complaining countries, where “complaining countries” are defined as the European Union, Japan and all countries that joined as third parties.

Although those goals are commendable, the policies encompassed by INOVAR-AUTO seem largely inadequate for those purposes.¹⁷ The recent trade literature has been emphatic on the productivity and innovation benefits of imported inputs.¹⁸ Those benefits are particularly salient in industries characterized by global value chains, where imported intermediate products are essential and cross national borders multiple times. That is precisely the case of the international automotive industry, which is often described as the “poster child” of global value chains. INOVAR-AUTO, through its LCRs, moved in the *opposite direction*, favouring domestic value chains.¹⁹

Although measures of productivity are not easily available, one can look at exports as a proxy for productivity. As the international trade literature since Melitz (2003) makes clear, more productive firms are more likely to export, and to export more. If we observe that after 2012 exports of the automotive industry increased relative to other manufactures, it could be a sign of rising productivity.

Figure 3 is the analogue of Figure 2, but for exports. It shows that, since 2006, the automotive industry has had a weaker export performance than the remaining of the industry, relative to the 2006 level. The level of exports of final automotive goods in 2016 was still below its 2011 level, despite a noticeable improvement in 2016-2017. That could reflect a delayed increase in productivity, although several other explanations are also possible.²⁰ The sector of automotive inputs, on the other hand, experienced an almost continuous fall in exports since 2011. Given the LCRs of INOVAR-AUTO, which guaranteed demand for the local production of inputs, that is not too surprising.

To evaluate whether those preliminary conclusions are not driven by other factors, we carry out an econometric analysis for exports analogous to the one we do for imports. The analysis confirms that the impact of INOVAR-AUTO on the exports of the automotive sector is not different from zero from a statistical point of view. Those results suggest that INOVAR-AUTO did not have any meaningful effect on the exports of the sector. Therefore, any expectation that the programme could have boosted productivity in the industry seems elusive.

¹⁷ Indeed, the analysis of Sturgeon et al. (2018) indicates that INOVAR-AUTO failed to promote R&D and innovation in Brazil’s automotive industry.

¹⁸ See, for example, the recent survey by Shy and Steinwender (2018).

¹⁹ Analysing a WTO dispute on several trade measures implemented by Argentina, Conconi and Schepel (2017) explain that the inefficiencies of LCRs are accentuated in industries where global value chains play an important role.

²⁰ One explanation is that automakers could be particularly well positioned to export when domestic demand plunges, as in the analysis of Almunia et al. (2018).

Figure 3: Brazil's annual exports (2006 = 100)



Source of data: WITS database

3. Overview of the Panel report

Even though INOVAR-Auto was, most likely, the main trigger of the WTO dispute, the European Union and later, Japan, brought claims against seven different industrial programmes, including the ICT programmes. As the disputes were not solved through consultations, both complaining parties requested the establishment of a panel. In view of the single subject matter, the two complaints were addressed jointly by a single panel.

In its report, the Panel ruled that certain aspects of the ICT and INOVAR-AUTO programmes were taxing imported products in excess of the domestic like products (thus violating article III:2 GATT) and that imported goods were also subject to less favourable regulatory treatment (thus violating article III:4 GATT). As the programmes in the dispute were trade-related investment programmes within the meaning of the Agreement on Trade-Related Investment Measures (TRIMs), the violation of the national treatment rules in GATT's articles III:2 and III:4 also implied the violation of article 2.1 of TRIMs. At the centre of those violations were the tax reduction and exemptions, as well as the eligibility criteria contained in those programmes, including the Basic Productive Processes (PPBs)²¹ and the accreditation process.

The tax exemptions, reductions and suspensions granted under the different programmes were also considered subsidies in the meaning of the SCM. The Panel further concluded that

²¹ PPBs are product-specific criteria that set out the minimum production and manufacturing steps that need to be conducted in Brazil to obtain a benefit under certain incentives programmes.

those subsidies were contingent upon the use of domestic products and were therefore prohibited under article 3 SCM.

Moreover, the Panel dismissed all the defences raised by Brazil. It refuted Brazil's claim that pre-market measures related to production²² do not fall within the scope of GATT article III, TRIMS article 2.1 or SCM article 3. Moreover, the Panel dismissed Brazil's claim that article III:8(b) GATT would exempt subsidies, paid exclusively to domestic producers, from the NT rules under GATT article III.

Brazil also tried to justify certain measures of the PATVD and of the INOVAR-AUTO programmes on the grounds of the general exception of GATT article XX, but failed to prove that the discriminatory elements were related or necessary to the public interest objectives pursued. Moreover, the Panel considered that the complaining parties had identified a set of alternatives, which were WTO-consistent and less trade restrictive, which could have provided an equivalent or higher contribution to achieving those public goals. Therefore, Brazil was unable to justify its measures on the basis of GATT article XX general exceptions.

Finally, Brazil tried to justify the MFN violations under INOVAR-AUTO using the Enabling Clause. Furthermore, it argued that the European Union and Japan could not contest its justification under the Enabling Clause unless they had invoked it in their panel requests. However, the Panel considered that, absent a proper notification of those measures in the framework of the Enabling Clause, the complaining parties were not under an obligation to invoke the Enabling Clause in their requests. That finding, which the AB followed, has important implications for the burden of proof under the Enabling Clause.

4. The Appellate Body decision: redefining WTO-compatible industrial policies?

Having all its defences dismissed, Brazil would have had to remove the programmes which were found to be violating the NT rules under article III GATT and, as a consequence, also TRIMs, and, which were identified as prohibited subsidies under the SCM. Brazil therefore appealed several aspects of the Panel report, with the aim of reversing the findings that the measures were incompatible with the NT provision (consequently also with the TRIMs) and with the SCM.²³ The AB issued its report in December 2018.²⁴

4.1. Exemptions from credit-debit mechanism: discriminatory taxation and subsidies

The Panel found that the tax exemption regimes resulted in a tax differential contrary to GATT's article III:2 and created less favourable treatment for imported goods, in violation of GATT's article III:4. Brazil challenged that finding on the ground that the tax exemptions took

²² Pre-market regulations set the conditions for goods to be placed on the market.

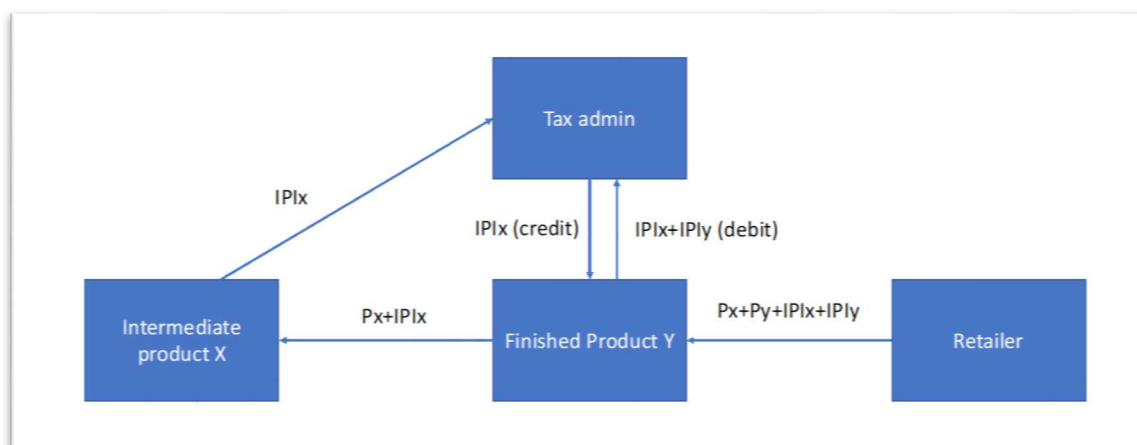
²³ Interestingly, Brazil did not appeal the Panel decisions with respect to article XX GATT. As we show in section 2, it was clear that the INOVAR-AUTO programme was mainly enacted for industrial policy reasons and could not easily be justified under article XX GATT.

²⁴ Appellate Body report, *Brazil – Certain Measures concerning Taxation and Charges* (hereafter, *Brazil – Taxation*), AB-2017-7 and AB-2017-8.

place in the framework of credit-debit mechanisms and, therefore, did not create differential treatment between accredited and non-accredited goods.

Credit-debit mechanisms are often used in the framework of indirect taxation in Business-to-Business relations, when the tax is non-cumulative, in order to levy the tax only on the value added produced at each stage of the value chain. That is the case of Brazil's IPI tax as well as of other taxes challenged in this case. The IPI must be paid at each step of the production value chain. Imported goods are also subject to the IPI tax. The (downstream) firm buying the intermediate products pays back the IPI tax to the (upstream) intermediate producer via the selling price of the intermediate good. The downstream producer, after selling its further-manufactured product, will have a credit of the same amount as the IPI tax paid on the intermediates, which it can deduct from its future tax liabilities. Figure 4 illustrates that system.²⁵ Under the disputed programmes, some locally produced intermediate and final products could obtain an exemption or a suspension from the IPI and its related credit-debit mechanism.

Figure 4: The Credit-Debit Mechanism without tax exemptions



In its report, the AB confirmed the Panel's findings. The AB highlighted that, in the context of **final goods**, while a domestic firm could obtain the tax exemption or reduction by complying with the requirements for accreditation, foreign firms could never obtain the accreditation. This meant that while accredited final goods would be exempted from taxation, imported products would have to pay it, resulting in de jure discrimination between foreign and domestic firms, leading to a higher tax burden on foreign firms than on accredited domestic firms in violation of article III:2 GATT.

In the context of **intermediate products**, the AB rejected Brazil's claim of neutrality of the credit-debit mechanism. Under the credit-debit mechanism, the buyer of a non-accredited intermediate good will recover the tax through a credit for future tax liabilities. For that reason, Brazil argued that the tax burden for the buying firm is the same for non-accredited intermediate goods (such as imported goods), where the tax is recovered in the form of credit, as for exempted intermediate goods, where the tax is not paid. Still, the AB disagreed and

²⁵ For a nice numerical example, see Carvalho and de Santi (2016); see also paragraph 2.12 of the Panel report.

upheld the Panel's conclusions, based on two related economic principles: cash availability and the time value of money.

By disbursing the money needed for the tax, the cash available for other operations at that moment is reduced for the firm buying the non-accredited good. Furthermore, the firm is disadvantaged even if it did not have an immediate use for the resources. That is the idea of the time value of money, according to which those resources could be earning, at a minimum, the nominal interest rate paid by a safe asset in the economy, so that US\$1 today is worth more than US\$1 in the future. Therefore, the effective tax burden of firms buying the non-accredited intermediate product (which have to pay the tax upfront and recover it only later) is higher than the one of firms buying an accredited intermediate good (which do not pay the tax).

The magnitude of the effective tax differential depends on the time taken by the government to reimburse the credit. If reimbursements were instantaneous, there would not be any tax differential, but both the AB and Panel considered that this was not the case in this dispute, thus confirming the violation of GATT article III:2. Furthermore, that mechanism also resulted in higher administrative burden for the firms buying the non-accredited intermediate good, relative to the firms buying the accredited product, thus violating GATT article III:4.

Similarly, the credit-debit mechanism was considered to give the government the advantage of cash availability whenever the government retained the tax for a non-trivial period, as the government could earn interest on the money anticipated. By granting some firms a tax exemption or reduction, the government was therefore foregoing government revenue under the meaning of the SCM. Therefore, the tax exemptions and reductions both in the context of final and of intermediate goods were subsidies according to the SCM.

4.2. Can subsidies be excused from the national treatment rules?

Both the Panel and the AB determined that the tax exemptions, reductions or suspensions for incentivised goods and the accreditation systems under the ICT and INOVAR-AUTO programmes violated the NT rules under articles III:2 and III:4 of the GATT.

One of the main defences of Brazil was to try to justify those violations on the basis of article III:8(b) GATT, which provides an exception under article III GATT rules for subsidies given exclusively to domestic producers.²⁶ Had its defence under article III:8 GATT succeeded, Brazil would have had just to ensure that the subsidies were not considered prohibited under the SCM in order to prove that the programmes were WTO-compatible.²⁷

Hence, one of the main questions in front of the dispute settlement was to determine the scope of the exception granted to domestic subsidies under GATT article III:8(b). While the

²⁶ Article III:8(b) GATT states: *The provisions of this Article shall not prevent the payment of subsidies exclusively to domestic producers, including payments to domestic producers derived from the proceeds of internal taxes or charges applied consistently with the provisions of this Article and subsidies effected through governmental purchases of domestic products.*

²⁷ In this case, violations under the TRIMs agreement depended on the existence of a violation of GATT's article III.

Appellate Body reversed part of the Panel's findings, it did not support Brazil's interpretation. One of the AB members issued on this point one of the few dissenting opinions in WTO law.

4.2.1 Article III:8(b) GATT as an exception from the national treatment clause

The main disagreement between the Panel and the AB concerned whether article III:8(b) GATT exempts domestic subsidies from the disciplines under article III of GATT.

According to the Panel, article III:8(b) GATT allows WTO members to grant subsidies without violating automatically the NT principle under article III GATT, but does not *per se* exclude such subsidies from the application of the NT rules. The Panel's findings rely on two main arguments flowing from the Panel report in *Indonesia-Auto*.²⁸

First, the Panel viewed the disciplines under article III GATT and the SCM agreements as complementary, rather than substitutes. Second, it considered that the term '**shall not prevent**' does not confer a full exemption to subsidies from article III GATT. The reason for interpreting the exception in article III:8(b) more narrowly than the full carve-out for public procurement contained in article III:8(a)²⁹ is the stronger term '**shall not**' used in the latter paragraph. The difference in the verb in articles III:8(a) and III:8(b) implies a different scope of the exceptions thereunder. Therefore, according to the Panel, the existing exception for subsidies means that article III does not prohibit *per se* subsidies granted exclusively to domestic producers, but at the same time it does not secure a full exemption for subsidies from the NT disciplines under article III GATT either. Article III:8(b) would only permit a coexistence of the NT principle under article III GATT with the issuance of subsidies exclusively for domestic producers, which is allowed and regulated under the SCM, while maintaining a certain complementarity between the SCM and article III GATT.

This interpretation of the Panel has two fundamental consequences. First, the subsidies must comply with the requirements of non-discriminatory taxation under GATT article III:2. Second, the subsidies must also comply with non-discriminatory non-tax regulatory measures, including the prohibition to use domestic content regulation under GATT article III:4. In other words, Brazil could not use article III:8(b) to justify the violations of GATT article III:2 and III:4.

The AB's conclusions diverged from the Panel's reasoning with respect to the general conclusion that article III:8(b) does not *per se* exempt subsidies from the application of article III GATT. In particular, it disagreed with the finding that subsidies permitted under article III:8(b) must comply with all aspects of article III:4 GATT. That is a fundamental conclusion, as it means that subsidies complying with non-discriminatory taxation requirements (such as direct payments to producers) can violate certain aspects of article III:4 GATT and can introduce some discriminatory treatment to distinguish between imported and domestic goods.

²⁸ Panel Report, *Indonesia – Certain Measures Affecting the Automobile Industry*, WT/DS54/R, WT/DS55/R, WT/DS59/R, WT/DS64/R, 2 July 1998 (in particular pages 330-334).

²⁹ GATT article III:8(a) states: *The provisions of this Article shall not apply to laws, regulations or requirements governing the procurement by governmental agencies of products purchased for governmental purposes and not with a view to commercial resale or with a view to use in the production of goods for commercial sale.*

The AB reached that conclusion as it considered the Panel's findings to be contradictory. On one hand, the Panel considered that article III:8(b) permits WTO members to issue subsidies exclusively to domestic producers. On the other hand, it interpreted the relationship between article III:8(b) and the disciplines of article III GATT as to prohibit any discriminating characteristics of those policies, including the criteria allowing to distinguish between domestic and foreign goods.

The AB is aware that, to institute subsidies to domestic producers, one must allow for some discriminatory elements to distinguish between foreign and domestic producers. Not allowing such a discrimination would basically render impossible to grant a subsidy exclusively to domestic producers. For that reason, according to the AB, not all the disciplines of article III GATT can be applicable to domestic subsidies under article III:8(b) GATT. So, while the AB recognises that article III:8(b) GATT does not justify LCR prohibited under the SCM, it does allow the establishment of eligibility criteria to define the "domestic producers" that would be eligible for the subsidies. Article III:8(b) GATT allows those criteria, even if the latter would have been otherwise prohibited by article III GATT (and in particular by article III:4 GATT).³⁰

As a result, the Appellate Body reversed the Panel's interpretation and considered that subsidies falling within the scope of GATT article III:8(b) are exempted from some of the NT rules (in particular, article III:4 GATT).

4.2.2 The scope of the exception under GATT article III:8(b)

The Appellate Body confirmed that article III:8(b) could provide an exception for subsidies from some of the National Treatment requirements. However, does such exception apply to all subsidies as defined under the SCM agreement? And could such exception be used by Brazil to justify the violations of its industrial programmes under article III GATT?

Brazil argued that article III:8(b) should be applicable to all kinds of subsidies within the meaning of the SCM, including subsidies derived from the exemption or remission from indirect taxation, such as those under the disputed programmes. The policy consequences of Brazil's request are straightforward. It means that subsidies under GATT article III:8(b) could be exempted from complying with the NT rule under article III:2 GATT, which prohibits tax differentials. In that case, the Brazilian programmes, which had been found to be in violation of the NT rules under both GATT articles III:2 and III:4, could have been justified thanks to the exception of GATT article III:8(b).

The Panel did not analyse in depth this issue. After all, it had concluded that GATT article III:8(b) could not exempt subsidies to domestic producers from the rules on NT. Conversely, having reversed that ruling, the AB had to analyse whether subsidies covered by GATT article III:8(b) included those in the form of discriminatory tax exemptions.

First, the AB emphasised that the definition of subsidy under the different WTO agreements and provisions thereunder (in particular the SCM, the GATT and the Agriculture Agreement) was not necessarily the same. The AB relied on the text and the immediate context of article III:8(b) GATT to interpret the meaning of the term 'payment of subsidies' in that provision. It

³⁰ Ibid. para. 5.111 and para. 5.112.

considered that such a term had a more restrictive meaning than the terms ‘subsidies’ or ‘granting’ and ‘maintaining’ of subsidies under the SCM.

Furthermore, GATT article III:8(b) provides two examples to further define the term ‘payment of subsidies.’ The first contains an inherent requirement that the subsidy is derived from taxation complying with the provisions of article III GATT; in other words, a requirement of non-discriminatory taxation and compliance with article III:2 GATT.³¹ If the term ‘payment of subsidies’ were to include also tax exemption, it would justify discriminatory taxation under article III:8(b) (as that provision only refers to subsidies exclusively provided to **domestic producers**). That would then contradict the requirement for non-discriminatory taxation present in the first example given by GATT article III:8(b). Consequently, the AB refuted the arguments brought forward by Brazil and confirmed the conclusion already reached in *Canada – Periodicals* that subsidies justifiable under GATT article III:8(b) must comply with the non-discriminatory taxation requirement under GATT article III:2.³²

Therefore, as Brazil’s programmes were based on discriminatory taxation and violated GATT article III:2, according to the AB, they could not be justified under GATT article III:8(b).

One of the AB Members, however, issued a dissenting opinion on this point. The AB Member first points out that, while the SCM defines the term subsidy ‘for the purpose of the [SCM Agreement],’ it does have linkages with the GATT. Second, the AB Member highlighted that the dictionary definition of ‘payment’ does not prevent the inclusion of foregone revenue (including tax exemptions and reductions), and that the list of examples under article III:8(b) is non-exhaustive, which therefore does not per se excludes such subsidies.

At the same time, the dissenting AB Member seems aware of the risky situation that would arise if subsidies based on discriminatory taxation would be justified under article III:8(b). That would imply that the non-discriminatory taxation requirement under GATT article III:2 could always be circumvented via the issuance of subsidies. To avoid that, the AB Member attempts to reconcile his/her reading of ‘payment of subsidies’ with GATT article III:2. He/she considers that ‘revenue foregone’ under the SCM is narrower than tax discrimination under GATT article III:2, so that “not all tax discrimination would ipso facto amount to ‘revenue foregone’ and would thereby not be justified under GATT article III:8.” The AB Member highlights that, under the SCM, ‘revenue foregone’ are actionable subsidies but not prohibited subsidies and that, therefore, an interpretation of GATT article III:8(b) as excluding ‘revenue foregone’ would be inconsistent with the SCM as it would not justify the subsidy under the NT provision. For all those reasons, the AB member considers that GATT article III:8(b) should apply to all subsidies within the meaning of SCM, and that therefore Brazil could justify the NT violations of its measures using GATT article III:8(b).

The arguments of the dissenting AB Member appear rather unconvincing. First, the existence of connections between treaties does not automatically imply that the definition of subsidy under article III:8(b) and the one under the SCM are the same. Moreover, while we agree that the list of examples in GATT article III:8(b) is non-exhaustive, we disagree with his/her conclusion. After all, what would have been the goal of including an example characterised

³¹ The first example says, ‘payments to domestic producers derived from proceeds of internal taxes or charges **applied consistently with the provisions of [article III].**’

³² Appellate Body report *Canada-Periodicals*, WT/DS31/AB/R.

specifically by a non-discriminatory taxation requirement, if the drafters intended at the same time to allow subsidies derived from discriminatory taxation as part of the non-exhaustive list of measures justifiable under that provision? That would be rather contradictory. Whereas the drafters left the list of possible subsidies open-ended, they still specified the non-discriminatory taxation requirement in the first example to make sure any subsidy falling in the framework of this open-ended list would comply with such requirement.³³

Furthermore, the attempt of the dissenting AB Member to reconcile his/her interpretation of article III:8(b) with the prohibition of discriminatory taxation is not entirely successful as it would still allow some subsidy measures based on tax differentials to be justified, incurring the risk to allow the circumvention of one of the cardinal rules in trade law (the requirement for non-discriminatory taxation).

Finally, it appears to us that 'government revenue that is otherwise due is foregone' under the SCM includes instruments beyond tax discrimination. Excluding subsidies based on discriminatory taxation from the definition of article GATT III:8(b) does not necessarily exclude from its scope other types of 'revenue foregone.' Moreover, the SCM inclusion of 'revenue foregone' among the actionable subsidies does not exempt those measures from the prohibition of discriminatory taxation, but simply allows the SCM to cover also other subsidies falling under that definition of 'revenue foregone' and that do not give rise to discriminatory taxation.

Overall, we remain unconvinced by the AB Member's dissenting opinion. The existence of such a dissenting opinion may undermine the authoritative value of the Appellate Body position, keeping the question of the proper interpretation of GATT Article III:8(b) open. Indeed, the three interpretations raised in this case give very different policy implications:

- Under the Panel reading, Brazil could not justify the industrial policies' violations under the NT using article III:8(b) and would have had to stop the programmes as they were inconsistent with article III GATT.
- Under the dissenting opinion of the AB Member, Brazil could have justified its industrial programmes under article III:8(b) GATT, so that those provisions would not have violated the NT provision. Brazil would have had only to ensure that the subsidies were not prohibited under the SCM to maintain the programmes.
- Under the Appellate Body reading, Brazil would be able to justify the subsidies' violations under the NT clause if the programmes did not resort to discriminatory taxation. In other words, to have its programmes justified under GATT article III, Brazil would need to change the way in which the subsidy is granted (for example, offering direct payments instead of discriminatory tax exemptions/reductions).

4.3. Redefining local content requirements under the SCM

Justifying the industrial support measures under article III GATT is not sufficient to ensure that those industrial programmes are WTO compatible; Brazil also had to prove that the measures

³³ This seems confirmed by the drafting history: see, for example, the Appellate Body report *Canada-Periodicals*, WT/DS31/AB/R (p. 34).

were not prohibited subsidies under the SCM. The SCM prohibits two types of subsidies under its article 3: export subsidies and subsidies contingent on the use of domestic inputs.

In the present case, the Panel and AB disagreed on what is a subsidy contingent on the use of domestic product under article 3(1)(b) of the SCM. According to the Panel's interpretation, the use of PPBs within the Brazilian industrial programmes violated WTO law, whereas the AB conclusions only require the Brazilian government to modify some of its PPBs to make the subsidies WTO-compatible under the SCM.

4.3.1 PPBs and 'contingency to use domestic inputs and intermediates'

The Panel's interpretation relied on the idea of consistency between the various agreements, leading to equal scope of the prohibitions of LCRs under GATT article III:4 and under article 3(1)(b) SCM. Thus, according to the Panel, a finding of violation under article III:4 GATT would lead to a violation of the SCM if the measures involved were subsidies.

Unlike the Panel, the AB differentiates the concept of prohibited LCRs and the required legal tests under GATT article III:4 and under the SCM. That difference follows from the analysis made by the AB with respect to GATT article III:8(b), discussed above. In line with that reasoning, as opposed to the NT provision under GATT, the SCM must allow some discrimination to identify domestic producers. Therefore, referring to *US-Tax Incentives*,³⁴ the AB considered that article 3(1)(b) SCM cannot prohibit the application of some legitimate criteria to establish what is domestic production.³⁵

The AB's problem is then to identify what is a permissible eligibility requirement to determine that the good is domestic, as opposed to LCRs prohibited under article 3(1)(b) SCM. In other words, it has to consider whether the PPBs in the Brazilian programmes are LCRs prohibited under article 3(1)(b) SCM or legitimate eligibility criteria.

Like the Panel, the AB distinguishes in its analysis between nested PPBs and other PPBs. A nested PPB requires the use of certain inputs, which must themselves comply with their own PPB rule. The PPB for Speed Alarm and Tracking Control is an example of nested PPB, which requires at least 90% of the GSM modules used to be produced in compliance with their own PPB. Because of that nested requirement, the AB agreed with the Panel that a nested PPB was a subsidy, *de jure* contingent upon the use of domestic over imported goods, and therefore violating article 3 SCM.

The situation was different with respect to non-nested PPBs. In that instance, the AB stressed that PPBs are a 'minimum set of operations'³⁶ and are not more restrictive than 'a collection of production steps' to be carried out domestically to obtain the benefits under the subsidies programmes. While the AB confirmed that those PPBs would provide more favourable treatment to domestic components and violate article III:4 GATT, it did not find it sufficient to conclude that those PPBs constituted LCRs in violation of article 3 SCM. The AB therefore reversed the Panel findings with respect to non-nested PPBs and considered that those

³⁴ United States - Conditional Tax Incentives for Large Civil Aircraft - AB-2016-8 - Report of the Appellate Body, WT/DS487/R.

³⁵ AB report, *Brazil – Taxation*, para. 5.246.

³⁶ *Ibid.* para. 5.270.

requirements were not LCR but legitimate eligibility criteria. Subsidies using non-nested PPB were therefore not prohibited subsidies under article 3(1)(b) SCM.

4.3.2 The problems with the test adopted by the Appellate Body to identify LCR

We agree with the AB that the scope of the prohibition under article 3 SCM must allow for the existence of some eligibility criteria for subsidies given exclusively to ‘domestic producers.’ However, we are unconvinced by the approach used by the AB to establish the proper scope of the prohibition under article 3 SCM.

First, the AB relies on the fact that non-nested PPB are supposedly ‘minimum production requirements.’ However, the AB does not verify that claim, nor does it propose a test to do so. PPBs were conceived as production requirements for specific and preferential customs arrangements (such as the Manaus Free Trade Zone and industrial policy measures). Brazil also has non-preferential rules of origin (NPROO),³⁷ which are used mainly to avoid circumvention of antidumping duties. NPROO rely on either wholly obtained requirements or apply the *substantial transformation* test (requiring a change of classification heading), except in the case of mere assemblies, packaging, fractionation in lots, selecting, marking and diluting.

Consider the PPB for Optical Splice Closures, the example given by the AB of a non-nested PPB. It requires the local manufacture of moulds for the injection of the plastic parts, which cannot be imported. Why would the term ‘contingent (...) upon the use domestic over imported goods’ not cover such a provision, when it is clearly conditioned on the use of domestic content? Moreover, in the context of the NPROO, the manufacture of the moulds would not be required to obtain origin. Hence, not only the PPB in question requires local sourcing, it also appears to go beyond the minimum possible mechanism to obtain origin.

On that point, we fail to see how a requirement to manufacture one specific intermediate product locally does not entail a condition to use a domestic input. Indeed, while a nested PPB requires that the locally-produced intermediate good is manufactured in accordance with specific production requirements, a non-nested PPB can still require the local manufacturing of an intermediate good, even if it is produced using some imported inputs. In both cases, the intermediate good cannot be imported and what really matters under article 3 SCM is not whether PPBs set minimum processing requirements, but whether they require the sourcing of domestic inputs.

Furthermore, while we agree that the prohibition under article III:4 GATT and article 3 SCM must be differentiated, a parallel could have instead been drawn between the first sentence of GATT article III:5 and article 3 SCM. The history of the first sentence of GATT article III:5 indicates that the local content measures must be compulsory.³⁸ GATT article III:5’s first sentence was interpreted broadly, accounting for situations in which the regulation requires the use of domestically produced rather than imported goods. All those aspects make it similar to the prohibition under article 3 SCM. Considering the parallelism between article III:5 GATT and article 3 SCM, and considering that GATT article III:8(b) exempts certain subsidies from the rules of GATT article III:5, the prohibition under article 3 SCM could actually

³⁷ WTO, *Trade policy Review – Brazil*, 2017.

³⁸ Hestermeyer (2011), Article III GATT, in R. Wolfrum et al. (eds), *WTO – Trade in Goods*, Martinus Nijhoff

be seen as a substitute for the LCR prohibition otherwise contained in GATT article III:5. In other words, article 3 SCM would avoid the circumvention of the LCR prohibition via subsidies justified under GATT article III:8(b) and not subject to GATT article III:5. Thus, we are inclined to consider that the tests under article 3 SCM and article III:5 GATT could be fairly similar. A requirement to manufacture an input or component domestically within a PPB, whether nested or not, would violate GATT article III:5 and we fail to see how it would not violate article 3 SCM.

Overall, we find that the distinction used by the AB between nested and non-nested PPBs is not thorough enough to ensure an effective enforcement of the prohibition under article 3 SCM.

NPROO could be used as a better test to distinguish prohibited LCR from legitimate eligibility criteria. Following the requirement under article 2(d) of the Agreement on Rules of Origin, NPROO cannot be more restrictive than the rules to establish that a good is domestic. Therefore, NPROO represent a lower bound for processing requirements, established to determine the origin of products. As such, NPROO could be used to test the presence of LCRs.

5. Concluding remarks

We evaluate a dispute brought to the WTO by the EU and Japan with respect to taxation benefits that Brazil provided to domestic firms under different programmes. Among them, it included tax reductions/exemptions for the automotive sector, one of Brazil's largest manufacturing sectors. Those measures look like a crisp example of policies dictated by strong domestic political-economy forces. There seems to have been no appraisal of the consequences of the policy for Brazilian consumers. Similarly—and critical for the effectiveness of international trade agreements—the interests of foreign exporters were also entirely disregarded. Hence, it is unsurprising that the case was brought to the WTO.

In its analysis, the Panel followed closely the previous WTO jurisprudence by considering that several measures (including tax exemption and production-steps requirements) were violations of the GATT and the SCM agreements. The main additions to the jurisprudence by the Panel (upheld by the Appellate Body) are its findings on the burden of proof in the context of the Enabling Clause and on the violation of article III GATT (both GATT articles III:2 and III:4) by tax exemptions/reductions in the context of credit-debit mechanisms.

However, the AB reversed the Panel findings and diverted from past jurisprudence on some aspects of the case. The AB did so to reconcile the existence of subsidies exclusively provided to domestic producers with WTO law. In particular, the AB concluded that subsidies that are not based on discriminatory taxation could be justified under article III:8(b) GATT and could have some discriminatory elements to distinguish between domestic and foreign producers without violating the NT rules. Similarly, and in line with recent findings in cases concerning subsidies for aircrafts in the US,³⁹ the AB concluded that eligibility criteria under a subsidy

³⁹ Such as in the US-Tax incentives case (see *supra* fn. 35).

programme could not be automatically construed as subsidy contingent on domestic content prohibited under article 3 SCM.

As a result of the AB report, Brazil would need to make the following modifications for its subsidies programmes to become WTO-compatible:

- Remove the tax differential component to justify the programmes under article III:8(b) GATT and avoid incompatibility with the NT clause under GATT article III. For example, Brazil could keep subsidies to domestic producers, although in a different form (e.g., through direct payments to them).
- Remove the nested PPBs and replace them with non-nested PPBs, to ensure that the subsidies are not prohibited under article 3 SCM.

If Brazil undertook those changes, the measures would still be actionable subsidies, but they would not be prohibited under the SCM or under GATT article III and the TRIMs.

This is not a small difference. Indeed, actions against actionable subsidies can only be taken if the subsidies in question cause injury to the industry of a like product in another WTO member via the channel of exports and a causality can be proved between the subsidy and the injury found. In contrast, no action can be taken against actionable subsidies if the effect of such subsidies is to substitute domestic for imported goods. Moreover, in the case of actionable subsidies, affected WTO trading partners can introduce countervailing measures but cannot request the withdrawal of the measure, as in the case of prohibited subsidies under article 3 SCM or measures violating article III GATT.

While we agree that eligibility criteria to obtain domestic subsidies should not automatically amount to violations of either article III GATT or article 3 SCM, we fear that the AB pushed itself too far in reducing the scope of article 3 SCM. The test devised by the AB to distinguish legitimate eligibility criteria from prohibited local content requirement measures seems to open the possibility to bypass LCR prohibition in ways that could have an impact on trade flows.

Indeed, our analysis of the Brazilian automotive sector shows that the trade flow impact of such policies can be very significant. If INOVAR-AUTO had as its main goal to deter imports, as it seems, it was very successful. Imports of final automotive goods fell quickly and significantly after the introduction of the programme, mainly from the countries that challenged Brazil in the WTO.

Thus, in light of the economic and trade consequences of discriminatory industrial policies, we worry that reopening this Pandora's box could create future challenges for multilateral trade disputes. To avoid the circumvention of the SCM prohibition, a better test to identify local content requirements is needed. Here, we suggest two possible ways to achieve that. First, one could define similar tests as those under article III:5 GATT to identify contingency to domestic inputs under the SCM, as both provisions seem to have equal requirements and objectives. Second, one could use NPRoO to identify minimum requirements to grant origin to products, and therefore be able to distinguish a legitimate eligibility criteria from prohibited LCRs.

References

- Almunia, Miguel, Pol Antras, David Lopez-Rodriguez and Eduardo Morales (2018). Venting Out: Exports during a Domestic Slump. Mimeo.
- Bagwell, K. and A. Sykes (2005). India – Measures Affecting the Automotive Sector. *World Trade Review* 4, 158-178.
- Batra M. and Namit Bafna (2018). Renewable Energy: the WTO’s position on local content requirements. *Energy Law Journal* 39, 401-426.
- Charnovitz S. and C. Fischer (2015). Canada-Renewables Energy: Implications for WTO law on Green and Not-so-Green Subsidies. *World Trade Review* 14(2), 177-210.
- Carvalho C. and E. de Santi (2016). Taxation Law, in Fabiano Deffenti and Welber Barral (eds.), *Introduction to Brazilian Law*.
- Conconi, Paola and Harm Schepel (2017). Argentina–Import Measures: How a Porsche is worth Peanuts. *World Trade Review* 16(2), 349-369.
- De Negri, Joao (1999). O custo do bem-estar do regime automotivo brasileiro. *Pesquisa e Planejamento Econômico* 29(2), 215-242.
- Espa, I. and G. Marin Duran (2013). Renewable Energy Subsidies and WTO law: Time to rethink the case for reform beyond Canada-Renewable/FIT program. *Journal of International Economic Law* 21(3), 621-653.
- Grossman, Gene (1981). The theory of domestic content protection and content preference. *The Quarterly Journal of Economics* 96(4), 583-603.
- Grossman, Gene and Elhanan Helpman (1994). Protection for Sale. *American Economic Review* 84(4), 833-850.
- Hestermeyer, H. and L. Nielsen (2014). The legality of local content measures under WTO law. *Journal of World Trade* 48(3), 553-592.
- Hufbauer, G. C., J.J. Schott, C. Cimino-Isaacs, M. Vieiro and E. Wada (2013). Local Content Requirements: a global problem. *Policy Analysis in International Economics* 102, Peterson Institute for International Economics.
- Melitz, Marc (2003). The Impact of Trade on Intra-Industry Reallocations and Aggregate Industry Productivity. *Econometrica* 71(6), 1695-1725.
- Rubini, L. (2012). Ain’t wastin’time no more: subsidies for renewable energy, the SCM agreement, policy space and law reform. *Journal of International Economic Law* 15(2), 525-579.
- Sauvé, P. (2016). Life beyond local content: exploring alternative measures of industry support in the context of WTO accession. *Journal of International Trade* 1, 1-28.

Shapiro, Helen (1994). *Engines of Growth: The State and Transnational Auto Companies in Brazil*. New York: Cambridge University Press.

Shu, Pian and Claudia Steinwender (2018). *The Impact of Trade Liberalization on Firm Productivity and Innovation*. NBER Working Paper No. 24715.

Sturgeon, Timothy, Leonardo Chagas and Justin Barnes (2018). *Inovar Auto: Evaluating Brazil's Automotive Industrial Policy to Meet the Challenges of Global Value Chains*. Mimeo, World Bank.

CENTRE FOR ECONOMIC PERFORMANCE
Recent Discussion Papers

1651	Giulia Giupponi	When Income Effects are Large: Labor Supply Responses and the Value of Welfare Transfers
1650	Jonas Jessen Sophia Schmitz Sevrin Waights	Understanding Day Care Enrolment Gaps
1649	S. Federico F. Hassan V. Rappoport	Trade Shocks and Credit Reallocation
1648	Max Nathan	Does Light Touch Cluster Policy Work? Evaluating the Tech City Programme
1647	Stuart Campbell Lindsey Macmillan Richard Murphy Gill Wyness	Inequalities in Student to Course Match: Evidence from Linked Administrative Data
1646	Cong Peng	Does E-Commerce Reduce Traffic Congestion? Evidence from Alibaba Single Day Shopping Event
1645	Dan Andrews Chiara Criscuolo Peter N. Gal	The Best versus the Rest: Divergence across Firms during the Global Productivity Slowdown
1644	Christopher Cornwell Ian M. Schmutte Daniela Scur	Building a Productive Workforce: The Role of Structured Management Practices

1643	Paul Dolan Georgios Kavetsos Christian Krekel Dimitris Mavridis Robert Metcalfe Claudia Senik Stefan Szymanski Nicolas R. Ziebarth	Quantifying the Intangible Impact of the Olympics Using Subjective Well-Being Data
1642	Xavier Jaravel Erick Sager	What are the Price Effects of Trade? Evidence from the US and Implications for Quantitative Trade Models
1641	Johannes Boehm Jan Sonntag	Vertical Integration and Foreclosure: Evidence from Production Network Data
1640	Teodora Borota Fabrice Defever Giammario Impullitti	Innovation Union: Costs and Benefits of Innovation Policy Coordination
1639	Monica Langella Alan Manning	Residential Mobility and Unemployment in the UK
1638	Christos Genakos Mario Pagliero	Competition and Pass-Through: Evidence from Isolated Markets
1637	Holger Breinlich Elsa Leromain Dennis Novy Thomas Sampson	Voting With Their Money: Brexit and Outward Investment by UK Firms
1636	Maria Sanchez-Vidal	Retail Shocks and City Structure
1635	Felipe Carozzi Sefi Roth	Dirty Density: Air Quality and the Density of American Cities

The Centre for Economic Performance Publications Unit

Tel: +44 (0)20 7955 7673 Email info@cep.lse.ac.uk

Website: <http://cep.lse.ac.uk> Twitter: @CEP_LSE