



The nuisance cost of tariffs

Research paper

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The Productivity Commission

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ISBN 978-1-74037-746-1 (online)
ISBN 978-1-74037-745-4 (print)

An appropriate reference for this publication is:
Productivity Commission 2022, The nuisance cost of tariffs, Research paper,
Canberra

Publication enquiries:
Media, Publications and Web | phone 03 9653 2244 | email publications@pc.gov.au

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Acknowledgments

The Commission has drawn upon a range of information sources in estimating the fiscal and economic costs of tariffs.

The report was made possible by the close collaboration of many staff across Australian Government agencies. The Commission is grateful to these staff and all participants to the study for their valuable input.

The Commission would also like to thank the staff who worked on the inquiry. The team was led by Patrick Jomini and comprised Hudan Nuch, Annie Savvas, Lawson Ashburner, Marco Hatt, Umme Salma, Jonathan Vandenberg and Yvette Goss.

Alex Robson
Deputy Chair

Executive summary

This report argues that the costs of the Australian tariff system arise mainly from its complexity. In Australia's low tariff-rate environment, the costs of the tariffs arise primarily from the complexity of the system rather than from distortions to the economy.

Simplifying the tariff system will lead to cost savings for businesses that will eventually flow through lower prices to Australian consumers. The main savings are likely to be achieved by reducing the costs associated with concessions and preferences — or by simplifying the entire tariff system. Some savings are also likely to arise from trade facilitation initiatives, such as the Simplifying Trade System initiative already underway.

Tariffs are only applied to a small number of imports with nearly 90 per cent of imports entering Australia duty-free. A tariff of 5 per cent is paid on about 10 per cent of imports, raising about \$1.5 billion in revenue (this represents about 0.3 per cent of revenues collected by the Australian Government).

The Government incurs costs to administer the tariff system. Those that could be estimated amount to between \$11 million and \$20 million. To the extent that agencies use cost recovery mechanisms, the costs are borne by businesses, and eventually, consumers — otherwise, administrative costs are borne by taxpayers.

Now that they are so small, both in level and coverage, tariffs protect very few Australian producers. Distortions from reallocating labour and capital toward relatively inefficient businesses are much smaller compared to when tariffs were more prevalent: some tariffs are applied to imports that do not compete with domestic products, the tariff rate is low (five per cent), and tariffs are applied to a small number of imports.

The main effect of the current tariff system is to increase the cost of inputs to businesses that use imports and eventually increase consumer prices. Aside from the cost of the tariff itself, there are costs to businesses from complying with the system, such as identifying whether they qualify for any concessions or for a preference under a preferential trade agreement. In accessing a preference, businesses incur an average cost of 0.9–2.8 per cent of the value of the imports to which the preference was applied in order to avoid paying the tariff of five per cent of the value of imports. This includes the costs to foreign exporters of meeting the local content requirements necessary to qualify for the preference, which are largely passed through to Australian businesses and consumers. In some cases, businesses do not access a preference either because they are unaware of its existence or because the cost of accessing it is too high.

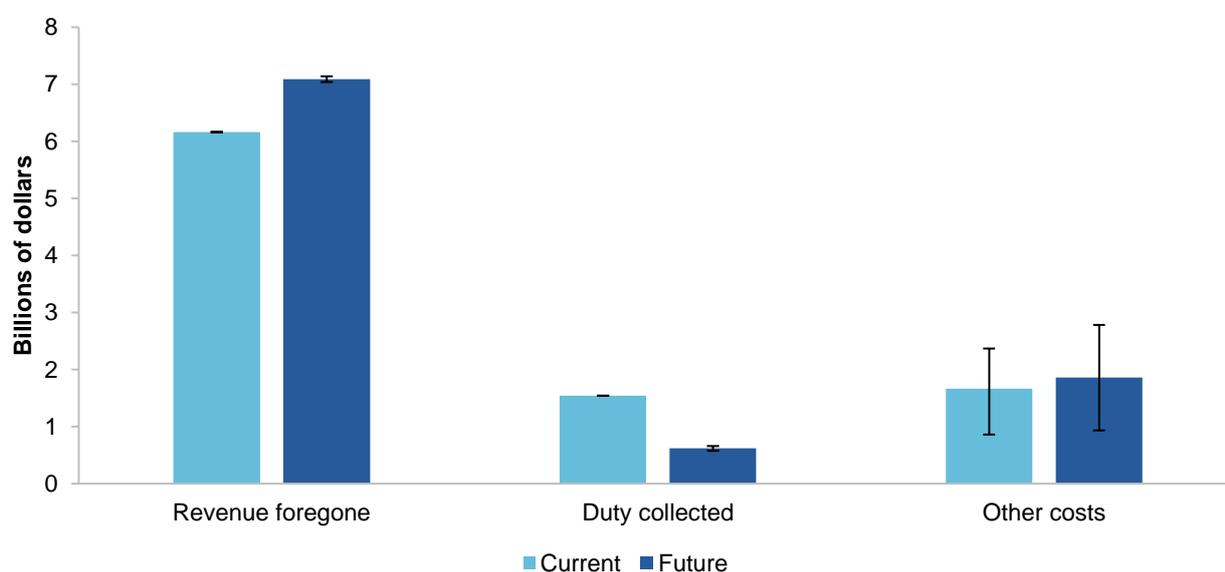
When applied to imports that do not compete with domestic producers, taxes on imports can be an efficient source of revenue compared to other sources of revenue — they are administratively easy to collect and result in small economy-wide distortions if the tariff rate is low. But the costs of collecting tariffs is also a function of the complexity of the system, which affects administrative and compliance costs. The costs of the system are estimated to be in the order of \$0.59 to \$ 1.57 per dollar of revenue raised (table 1)

The cost-to-revenue ratio increases as costs increase and as revenues decrease. As the number of concessions and the number of PTAs increase, the costs of the system increase and the amount of revenue decreases, making each dollar collected more expensive to collect. The implementation of agreements with the UK, India and the EU could reduce revenues from \$1.5 billion currently to \$579–664 million, raising system costs to \$1.41–4.81 per dollar of revenue collected (figure 1).

Table 1 – Cost of tariff system per dollar of revenue collected
Aggregate costs divided by aggregate tariff revenue (\$1.5 billion)

Costs per dollar of tariff collected (\$)	Notes
Administrative costs	Less than 0.02 Only partial accounting of costs — mainly staffing costs based on FTEs.
Compliance costs	0.49–1.45 Compliance with PTAs (includes costs of RoO) and concessions.
Distortions	0.10 GDP foregone due to distortions.
Total	0.59–1.57

Figure 1 – Revenue foregone and costs will rise and duty collected will fall once forthcoming PTAs are implemented^{a,b}



a. Future values are estimates following the implementation of trade agreements with UK, EU and India. **b.** Ranges: revenue foregone and duty collected – based on previous 3 years; other costs – 50 per cent above and below central estimate.

1. What this study is about

Since the 1970s, tariffs have declined from rates in excess of 50 per cent, applied to many imports, to five per cent, applied to a relatively small number of imports. As tariff rates and the number of products subject to tariffs have declined, their protective effects for some Australian producers have declined, improving the allocation of resources across the economy. Nowadays, businesses that compete with imports are often faced with fluctuations in exchange rates within a year that exceed the impact of the tariff rates on the cost of imports — for many, fluctuations in exchange rates are more important to their operations than the existence of the five per cent tariff margin.

From a fiscal point of view, tariff revenues form a diminishing part of Australian Government revenues and administrative costs are incurred from collection and management of the tariffs.

From an economic point of view, tariffs create costs in the form of distortions across the economy as industries and consumers reduce their use of imports and increase their use of protected goods in response to changes in their relative prices. That said, the smaller role of tariffs, both in their size and their coverage, has reduced the importance of such costs. Unless an import qualifies for a preferential or concessional rate of customs duty, tariffs increase the costs of imports, thus increasing costs for businesses that use imported inputs and eventually, for consumers too. Qualifying for a preference or a concession and demonstrating eligibility for it also increases costs for businesses, which are passed on to Australian households. The magnitude of these costs depends on the complexity of the tariff system that businesses must navigate.

Tariffs have provided Australian negotiators with some leverage in preferential trade agreement (PTA) negotiations. That said, as tariffs have decreased, their value as leverage has decreased. There is some debate about how much they can contribute to Australia's negotiating position and to increasing market access for Australian exporters in future negotiations.

This report is designed to shed some light on the tariff system in Australia. In particular, we investigate the claim that some tariffs can be considered 'nuisance tariffs', as defined in box 1.1, and whether the tariff system as a whole might be thought of as generating nuisance costs.

The tariff system is complex. Businesses can avoid paying tariffs on their imports under the terms of various PTAs and concessions but incur costs in doing so. Most of these preferences and concessions reduce the rates of customs duty to 'Free', reducing any protection and revenue, and increasing costs to government.

A complex tariff system with many exemptions is more costly to manage than one with few exemptions and generates compliance costs for businesses as they must determine what rate applies to their imports and whether they qualify for a preferential or concessional rate of customs duty. The rules of origin under a PTA can also increase the cost of imports when a foreign business changes production patterns to both increase the amount of domestic value added and qualify for a preference.

Australia is a signatory to the World Trade Organisation's Trade Facilitation Agreement, which came into force in 2017 and commits signatories to reducing the costs of trade. Consistent with its commitments under the Trade Facilitation Agreement and in view of the complexities outlined above, the Australian Government is pursuing an agenda to develop a Simplified Trade System. Within this agenda, the Minister for Trade,

Tourism and Investment and the Minister for Employment, Workforce, Skills, Small and Family Business announced on 18 June 2021, a Task Force to 'review international trade regulations and modernise outdated ICT systems' and 'to assist more than 57 000 Australian exporters, and more than 380 000 importers' by 'cutting red tape and simplifying border processes' (Tehan and Robert 2021).

Box 1.1 – What are nuisance tariffs?

Nuisance tariffs have been defined as tariffs that raise little revenue, have negligible benefits for producers, but impose compliance burdens.

Definitions from the OECD (2002) and WTO (2021) rely on similar concepts:

[a tariff] so low that it costs the government more to collect it than the revenue it generates. Sometimes, a tariff that does not have any protective effect — some countries defend this as necessary in order to raise revenues (WTO 2021).

While these definitions make reference to both the tariff rate and the relativities between collection costs and revenue, analyses typically assume a threshold rate for 'nuisance tariffs' of two per cent (Foreign Affairs, Defence and Trade References Committee 2005; WTO 2020) The UK government recently investigated the possibility of removing 'nuisance tariffs' defined as less than 2.5 per cent (UK Department for International Trade 2020). An Australian Government review of 'nuisance tariffs' in 1998 used:

... tariff items that attract a duty of 5 per cent or less; raise less than \$100 000 in revenue a year (in 1996-97); and apply to items where there are few or no local producers (Vanstone 2000).

In Australia, almost all imports are subject to a statutory rate of either zero or five per cent — and many raise more than \$100 000 in revenue. Further, tariffs on imports that do not compete with domestic production are relatively efficient since they do not have a protective effect and are relatively easy to collect as they cross the border. The argument for not collecting tariffs where collection costs exceed revenues is a weak threshold criterion for determining whether to keep or eliminate a tariff: collection costs should be well below revenues raised.

1.1 Scope

With this context, the Commission initiated a project to investigate the likely effects of eliminating so-called 'nuisance' tariffs. As explained in box 1.1, there is no unique definition of what constitutes a nuisance tariff. For this reason, we investigated the costs associated with all tariffs.

The study also investigates the administrative costs that the Australian Government incurs in managing the tariff system (as implied in the counterfactual section below) and the compliance costs that businesses incur when interacting with the system. If tariffs are required, then it is important for the system to avoid large administrative and compliance costs.

The study excludes the effects of other taxes, charges and costs that do not relate directly to tariffs, their collection or related compliance costs. In particular, the effects of excise taxes and GST are excluded from this study, as well as any processing costs or charges borne by businesses that might be associated with quarantine, security or any other operations that are required to process imports.

The counterfactual

Estimating the contribution of the tariff system — in its entirety — to revenues and to administrative, compliance and economic costs implies a comparison with a counterfactual. This counterfactual can be thought of as ‘what would the Australian economy look like without import tariffs?’ or ‘what would the Australian economy look like if all its rates of duty were set to ‘Free’?’ Practically, since the analysis is based on recent data (rather than future projections), the counterfactual is more akin to: ‘what would the world have looked like if the tariff had not existed?’ or ‘what would the world have looked like if all rates of duty had been set to ‘Free’?’ This exercise provides therefore, an outer envelope estimate of the impact of Australia’s tariffs on public finances and on the economy and businesses — other counterfactuals would need to be explored to determine the contribution of particular parts of the tariff system (for example, certain tariff lines) to revenues and costs.

The counterfactual can be difficult to implement in some parts of the study. For example, the contribution of tariffs to revenues is relatively straightforward to estimate from trade statistics. On the other hand, although conceptually simple, it is not easy in practice to identify administrative or compliance costs that can be attributed solely to the existence of the tariff system. Importing involves many complex processes, including regulations and inspections that are designed to protect consumers, agriculture or other parts of Australia’s economy and society. When deciding whether a particular administrative or compliance cost is in-scope or not, we have applied the test about whether it related strictly to the existence of a positive rate of customs duty. For example, costs relating to biosecurity processes are out of scope, as biosecurity processes apply to all imported goods, regardless of whether they are subject to a tariff. The costs that are associated with accessing a preference under a PTA, however, are in scope, because the PTA would have been redundant had the corresponding rate of customs duty been ‘Free’.

Other types of costs that are associated with the existence of the tariff system are easier to assess, if one is willing to make appropriate assumptions. For example, the effects on revenues from implementing new trade agreements can be simulated with current data, using appropriate assumptions. The economic costs of distortions from existing tariffs can be modelled, subject to the careful assumptions that underlie the chosen model.

The main statistics underlying the analysis are from ABS import clearance data (*ABS, cat. No. 5368.0, International Trade in Goods and Services, Australia*). The analysis is based on aggregations from the HTISC8 classification. The data may exclude some items for confidentiality reasons.

1.2 Organisation of the report

This report is a simple analysis of the fiscal and economic effects of the tariff system. Although the framework is simple, the analysis is based on detailed consideration of each element. That said, not all aspects could be quantified, in particular in the area of administrative collection costs.

Chapter 2 investigates the nature of the tariff system, and the preferences and concessions that can reduce the amount of duty payable, including whether an import can benefit from a preference under a PTA.

Chapter 3 summarises the fiscal implications of collecting tariffs in terms of the revenues collected and the administration costs.

Chapter 4 summarises the main economic costs, that is, the degree to which the tariff system and the various costs that businesses bear in navigating and complying with the system increase input and final consumer costs.

Chapter 5 brings the main threads of the analysis together.

1.3 Conduct of the study

Over the course of the study, the Commission met with a range of interested parties, including government agencies, individual firms and representative bodies, and conducted two work-in-progress workshops with government agencies. As a research project, it did not include the extensive type of industry consultations that characterises the Commission's inquiries and other commissioned work. Appendix A provides details. The Commission received four submissions, which are available on the Commission's website and form part of the evidence base for the report.

2. The tariff system

Key points

- * **Tariffs are levied at the statutory tariff rate by default. But, if eligible, importers can apply for a preferential or concessional rate of customs duty (usually 'Free'), most commonly via a preferential trade agreement or the tariff concession system.**
- * **In 2019-20, 90 per cent of imports — by value — faced a zero tariff. For 49 per cent, this was because the statutory tariff rate was zero. The other 41 per cent entered under preferential trade agreements (28 per cent), the tariff concession system (11 per cent) and other concessions (the remainder).**
 - Of imports that faced a positive tariff, about 37 per cent were consumption goods, and the remaining 63 per cent were intermediate and capital goods.
- * **Because of the widespread use of preferences and concessions, the average applied tariff rate is extremely low among many tariff classifications with a positive statutory tariff rate. These tariffs collect little revenue relative to the associated administrative and compliance costs.**
 - In 2019-20, 58 per cent of imports facing a positive statutory tariff (whether they paid the statutory rate or a reduced rate) fell into a tariff classification with an average applied tariff rate of less than one per cent of import value.
- * **Tariff rates have declined over the past few decades, both in Australia and around the world.**

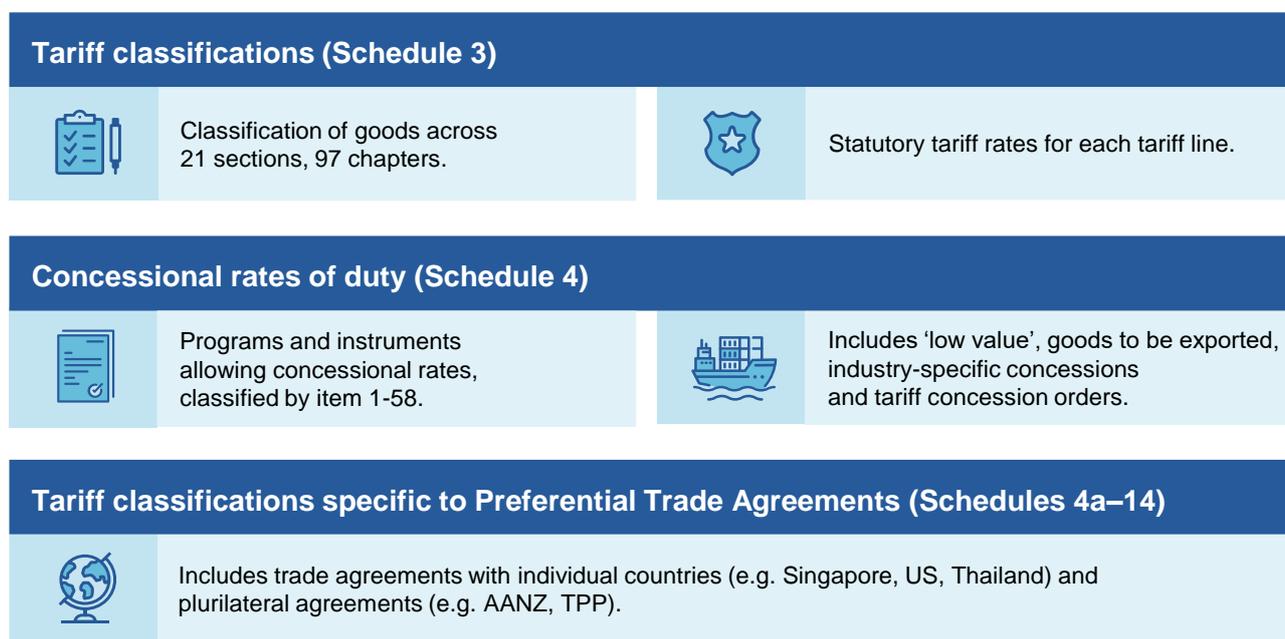
This chapter provides an overview of the tariff system, the coverage of statutory rates and the various ways in which exceptions reduce them. Section 2.1 outlines the main components of the system and section 2.2 presents data on its use.

2.1 Statutory tariffs, preferences and concessions

By default, tariffs on imports into Australia are levied at the statutory rate (figure 2.1). Many imports are eligible for a reduced rate of customs duty (usually 'Free'¹), via a preference or concession, although the importer must apply, since reductions in rates are not applied automatically.

¹ 'Free' is the terminology used in Schedule 3 to indicate a zero rate of duty. In this report, we refer to the Schedule 3 rate as the statutory rate. Where a Schedule 3 rate is positive, it can be reduced to a rate of 'Free' through a concession, as described in Schedule 4, or through a preference.

Figure 2.1 – Components of the tariff system



Statutory tariffs

Statutory tariff rates are specified for each class of imported goods (specified by 8-digit code) in schedule 3 of the *Customs Tariff Act 1995* (Cth). Some examples of tariff classifications and corresponding statutory rates are set out in table 2.1.

Table 2.1 – Examples of statutory tariffs

HS2017 classification

8-digit tariff code	Description	Statutory tariff rate
5205.11.10	Cotton yarn (other than sewing thread), containing 85 per cent or more by weight of cotton, not put up for retail sale; single yarn of uncombed fibres; measuring 20 000 decitex or more.	5% of import value
8901.10.10	Cruise ships, excursion boats, ferry-boats, cargo ships, barges and similar vessels for the transport of persons or goods; tankers; not exceeding 150 gross construction tons.	5% of import value
1001.00.00	Wheat and meslin; durum wheat; seed.	Zero
7502.10.00	Unwrought nickel; nickel, not alloyed.	Zero

Source: *Customs Tariff Act 1995* (Cwlth).

Over 99 per cent of statutory tariffs were either 'Free' (47 per cent of classifications) or 5 per cent of import value (52 per cent of classifications).²

Preferences and concessions

There are over 50 different types of tariff concessions and similar instruments and 16 preferential trade agreements (PTAs) importers can use to reduce the tariffs they face (box 2.1). However, two types comprise

² According to the HS2017 classification. A few remaining classifications are subject to rates between zero and 5 per cent.

the majority of reduced tariffs — PTAs (69 per cent of imports benefitting from a reduced tariff) and tariff concession orders (TCOs; 28 per cent of imports benefitting from a reduced tariff). In most cases, these result in a 'Free' rate of duty being applied to the imported good.

Box 2.1 – Examples of other instruments that importers use to reduce their tariffs

Instruments targeting particular goods or industries

By-laws allow concessional rates of duty of 'Free' for certain goods — for example, some scientific instruments or apparatus, or goods owned by a foreign government that are imported into Australia for use by that government.

The **cheese and curd quota** allows concessional rates of duty to apply to some imports of cheese and curds.

The **certain inputs to manufacture program** allows concessional rates of duty of 'Free' for certain inputs to production that are substantially and demonstrably superior to comparable goods produced in Australia.

The **space concession** allows concessional rates of duty of 'Free' for goods imported for use in a space project.

Instruments targeting particular importers or reasons for import

Tradex allows concessional rates of duty of 'Free' for goods that are subsequently exported.

Like Tradex, **duty drawbacks** allow concessional rates of duty of 'Free' for goods that are subsequently exported. Tradex grants exemption from payment of tariffs (and GST) from the time of import, while duty drawbacks allow tariffs to be claimed once the goods have been exported.

Goods classed as **temporary imports** are allowed concessional rates of duty of 'Free'. They include the property of temporary residents and goods imported for use at a public exhibition or public entertainment, provided that they remain in Australia for less than 12 months.

Source: ABS (*International Merchandise Trade, Australia: Concepts, Sources and Methods, 2018*, Cat. no. 5489.0); ABF (2021a, 2021b); Department of Immigration and Border Protection (2015, pp. 10–13, 29–30, 118–119); Department of Industry, Innovation and Science (2016); Department of Industry and Science (2015, p. 3); McAlester and Amon (2021, pp. 3, 8).

Preferential trade agreements

PTAs are agreements between countries to preferentially lower tariffs on their bilateral — or sometimes regional — trade. The difference between the statutory rate and the preferential rate (usually zero) is often referred to as the tariff preference. PTAs usually cover many other matters, such as investment protections, intellectual property provisions, trade facilitation, government procurement, e-commerce, and labour and environmental standards, as well as technical barriers to trade, services, the movement of natural persons and economic cooperation (PC 2010).

Australia has PTAs in place with many countries and is currently negotiating several new PTAs (box 2.2).

Box 2.2 – Australia’s preferential trade agreements

Existing agreements

Australia has bilateral preferential trade agreements (PTAs) in place with; New Zealand (ANZCERTA; since 1983), Singapore (SAFTA; 2003), the United States (AUSFTA; 2005), Thailand (2005), Chile (2009), Malaysia (2013), South Korea (2014), Japan (2015), China (2015), Hong Kong (2020), Peru (2020) and Indonesia (2020).

In addition, Australia is a member of several multilateral PTAs — the Agreement Establishing the Association of Southeast Asian Nations-Australia-New Zealand Free Trade Area (2010), the Comprehensive and Progressive Agreement for Trans-Pacific Partnership (2018), the Pacific Agreement on Closer Economic Relations Plus agreement (2020), and the Regional Comprehensive Economic Partnership Agreement (2022).

Australia also allows access to preferential tariff rates for imports from developing countries under the Australian System of Tariff Preferences (since 1966). The Australian System of Tariff Preferences is Australia’s Generalised System of Preferences scheme. It is not reciprocal — developing countries are not required to reduce tariffs on Australian exports.

Forthcoming agreements

A bilateral PTA with the United Kingdom was signed in late 2021 and an interim agreement with India was signed in April 2022, though neither have come into effect yet.

Negotiations are ongoing for a bilateral PTA with the European Union, and for several multilateral PTAs: the Australia-Gulf Cooperation Council Free Trade Agreement, the Pacific Alliance Free Trade Agreement. The Environmental Goods Agreement and the Trade in Services Agreement are being negotiated under the auspices of the World Trade Organisation.

Source: DFAT (2022); United Nations Conference on Trade and Development (2018).

To qualify for a preferential tariff, goods imported into Australia must comply with rules of origin (RoO) that are specified in the agreement. These requirements establish the minimum extent to which an import must have been produced in the partner country. RoO prevent exporters in countries external to the agreement from taking advantage of the PTA by exporting their products into a member country and then on to Australia. RoO can therefore distort production processes in Australia’s partners, preventing them from using imports that might be cheaper or of better quality and raising the cost of their exports to Australia. RoO vary across agreements. Researchers have shown that early Australian agreements tended to be part of a more restrictive class of agreements. There is also evidence that RoO in more recent agreements are less restrictive, and therefore less onerous for exporters to Australia (appendix C). Some early agreements, such as ANZCERTA and SAFTA, have been amended to make use of more modern rules of origin.

Tariff concession system

Tariff policy was designed largely as protection for Australian industries. As the Australian economy has evolved, some of these industries have disappeared and so has the need for protection, but the tariffs still exist.

The tariff concession system (TCS) is intended to remove tariffs that do not protect Australian manufacturers. Under the TCS, importers can apply for a concessional rate of customs duty of 'Free' on imported goods if it has been demonstrated that there is no substitutable good produced by an Australian manufacturer.

The TCS is underpinned by TCOs — classes of goods for which it has been determined that there is no substitutable good produced by an Australian manufacturer. TCOs are defined more precisely than tariff classifications — a TCO is comprised of a tariff classification and a description that further refines the classification. For example, a TCO applies to the eight-digit tariff code 8901.10.10 listed as an example in table 2.1, along with the following description:

CATAMARANS, submersible, including ALL of the following:

- (a) passenger AND crew capacity NOT greater than 30;
- (b) diesel AND/OR electric powered;
- (c) length NOT greater than 21 metres (ABF 2020b).

Importers apply to the Australian Border Force to create new TCOs. Australian manufacturers that produce substitutes can object to proposed TCOs or request the Australian Border Force to revoke existing TCOs.

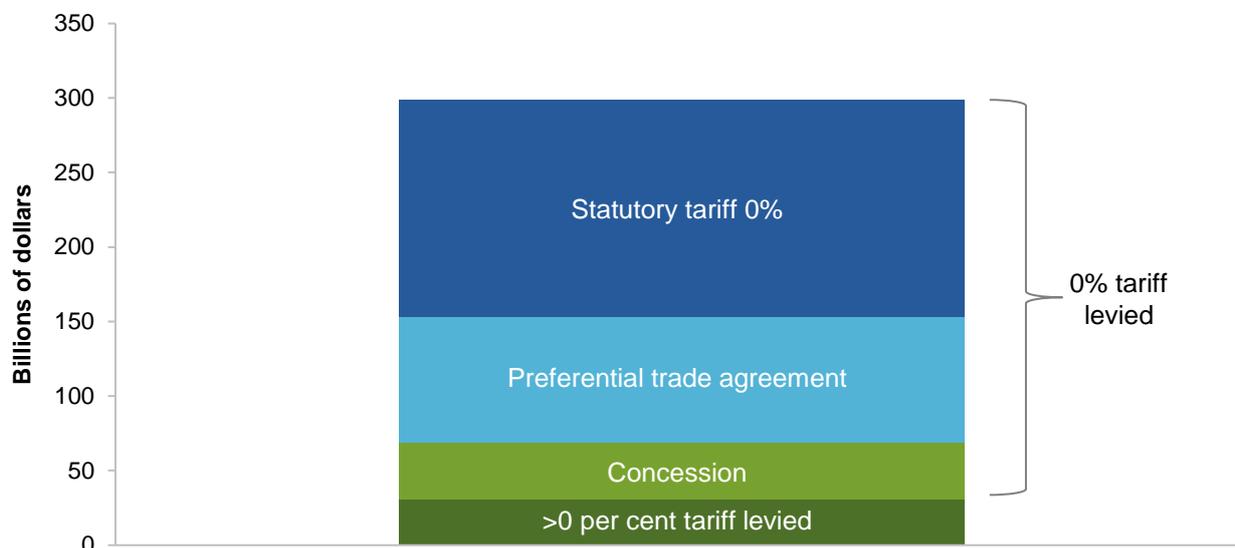
2.2 Using tariffs

Ninety per cent of imports do not pay any tariff

In 2019-20, 90 per cent of imports — by value — faced a 'Free' rate of customs duty (figure 2.2). For 49 per cent of imports, this was because the statutory rate was 'Free'. The other 41 per cent of imports entered under PTAs (28 per cent) or concessions (13 per cent).

If concessions and preferences had been used more widely, an even larger share of imports would have faced 'Free' rates of customs duty. Some importers pay the statutory rate because their goods are not eligible for the preference or concession, or they are unaware of the preference or concession. However, some importers choose to pay the statutory tariff rather than apply for a concession or preference because the associated compliance costs exceed the cost of the tariff (appendix C). Based on a detailed analysis of import data for 2019-20, PTAs were not used in about 14 per cent of the instances in which they could have been used to reduce the rate of customs duty to 'Free'. There is no data on the share of imports eligible for a tariff concession that did not claim that concession.

Figure 2.2 – About 90 per cent of imports enter Australia duty free^{a,b}
Imports by type of tariff, Australia, 2019-20



a. Excludes excise-equivalent tariffs, which are out of the scope of this report. b. Imports that claimed both a preference and a concession (less than 0.04% of total imports) are classified as claiming a preference. Imports that are recorded to have claimed either a preference or concession but still paid a non-zero tariff are classified as paying a non-zero tariff.

Source: Productivity Commission estimates using ABS (*International Trade in Goods and Services, Australia*, Cat. no. 5368.0).

Most tariff classifications feature very low average applied tariff rates

Because of the widespread use of preferences and concessions, the average applied tariff rate is very low among many tariff classifications with a positive statutory rate. Of imports facing a positive statutory rate in 2019-20 (nearly always five per cent of import value), 59 per cent fell into a tariff classification for which the average applied tariff rate was less than one per cent of import value, while 35 per cent fell into a tariff classification for which the average applied tariff rate was less than 0.5 per cent of import value (figure 2.3).³ A tariff classification with an average applied rate of less than one per cent implies that, on average, more than 80 per cent of importers accessed a preference or concession (and incurred a compliance cost doing so). For tariff classifications with an applied rate of less than 0.5 per cent, more than 90 per cent of importers accessed a preference or concession.

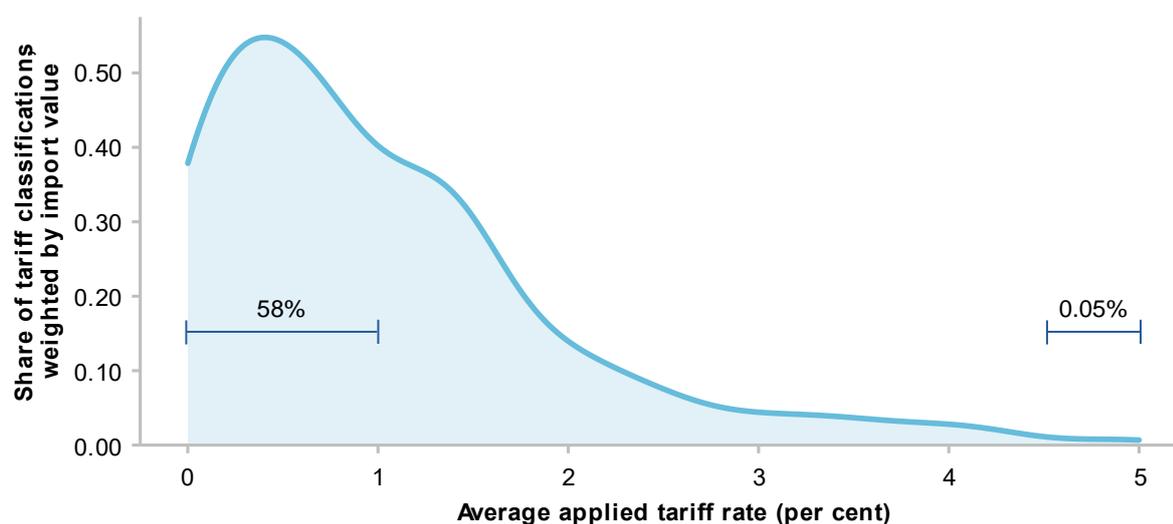
Since the tariff rate is normally five per cent, a low average tariff is an indication that only a small share of imports for the relevant classification paid the tariff and that revenue collected is low. Per dollar of imports, these tariff classifications collected less revenue and led to both higher administrative costs for the Australian Government and compliance costs for businesses than other tariff classifications (because administrative and compliance costs largely derive from accessing the preferences and concessions that lower the average tariff — see chapters 3 and 4).⁴

³ The average applied tariff rate was less than one per cent for 1515 out of 3057 tariff classifications with a positive statutory rate and less than 0.5 per cent for 954 tariff classifications.

⁴ There are many rationales for tariffs: industry protection, revenue raising, national security and environmental protection. The current low rates mean that tariffs do not contribute effectively to any of these objectives.

Figure 2.3 – Most imports for which the statutory tariff rate is positive fall into a tariff classification with a very low average applied tariff rate^a

Share of average applied tariff rates weighted by import value, tariff classifications with a positive statutory rate only, 2019-20



a. Average applied tariff rates are calculated for eight-digit harmonised tariff item statistical classification (HTISC) groups of commodities. Tariff variation in such a detailed group comes from some heterogeneity among the goods (with some subject to zero and others to five per cent tariffs), from the application of various concessional instruments or the application of a PTA.

Source: Productivity Commission estimates using ABS (*International Trade in Goods and Services, Australia*, Cat. no. 5368.0).

Tariffs are levied on many types of imports

The 10 per cent of imports on which positive tariffs were levied in 2019-20 comprises a broad variety of goods (figure 2.4). About 63 per cent of these imports were capital and intermediate goods, and the remaining 37 per cent were final goods.

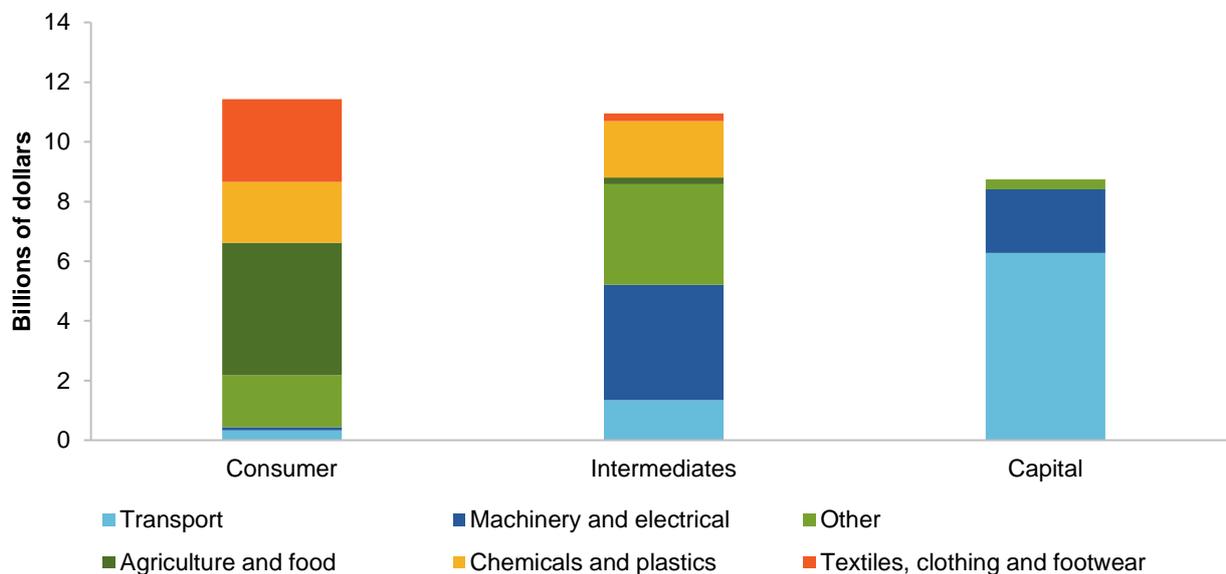
Tariffs have fallen around the world

Governments around the world have reduced tariff rates since the mid-1990s. The global weighted average applied tariff rate fell from 5.4 per cent in 1997 to 2.6 per cent by 2017, underpinned by reductions among both high income and low- and middle-income countries (figure 2.5). Australia's average applied tariff rate has fallen faster than that of other high-income countries.

Prior to the early 1990s, countries tended to reduce tariffs on either a unilateral basis or through multilateral fora such as the General Agreement on Tariffs and Trade (predecessor to the World Trade Organisation). Since then, PTAs have become an increasingly prominent means of tariff reduction, substituting for slow or stalled multilateral efforts, such as the Doha Round conducted under the auspices of the World Trade Organisation (commenced in 2001, stalled since 2008). Globally, the number of PTAs grew from about 50 in 1990 to about 280 in 2015 (Hofmann, Osnago and Ruta 2017).

Figure 2.4 – Tariffs are levied on many different types of imports

Value of imports on which positive tariffs were levied, classified by broad sector and broad economic classification, 2019-20^{a,b}

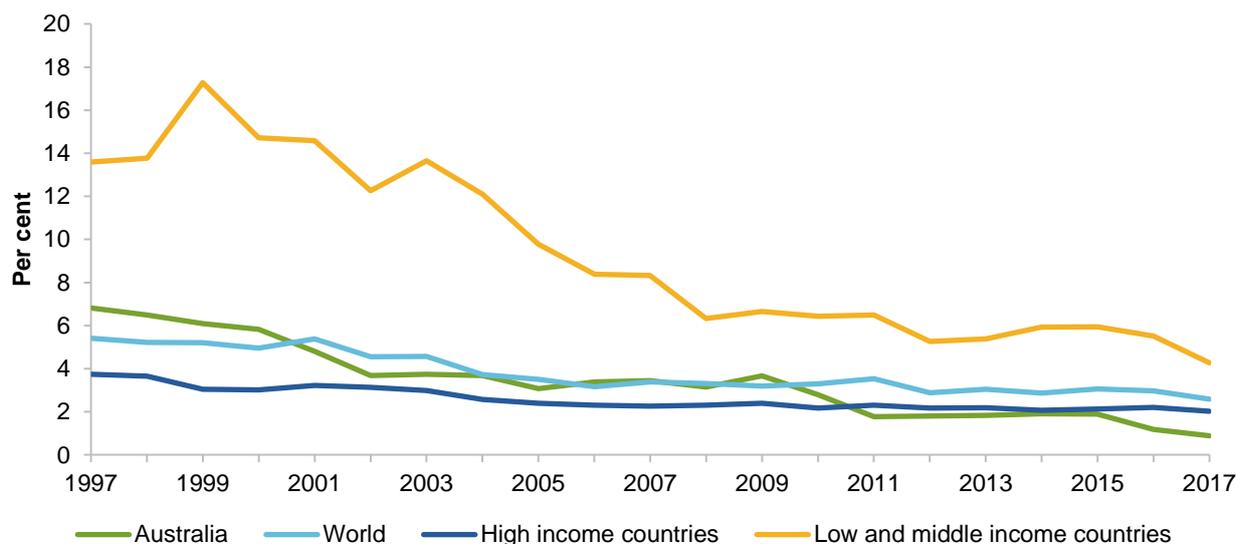


a. Sectoral aggregation based on eight-digit HTISC data aggregated and concorded to three-digit broad economic categories (BEC). b. Allocation to 'consumer', 'intermediate' and 'capital' categories according to BEC. Some transport equipment could not be allocated to an individual system of national accounts (SNA) class (see table 1 in Department of Economic and Social Affairs (2016)) and were allocated to capital as durables.

Source: Productivity Commission estimates using ABS (*International Trade in Goods and Services, Australia*, Cat. no. 5368.0).

Figure 2.5 – Tariffs have fallen globally

Weighted average applied tariff rate



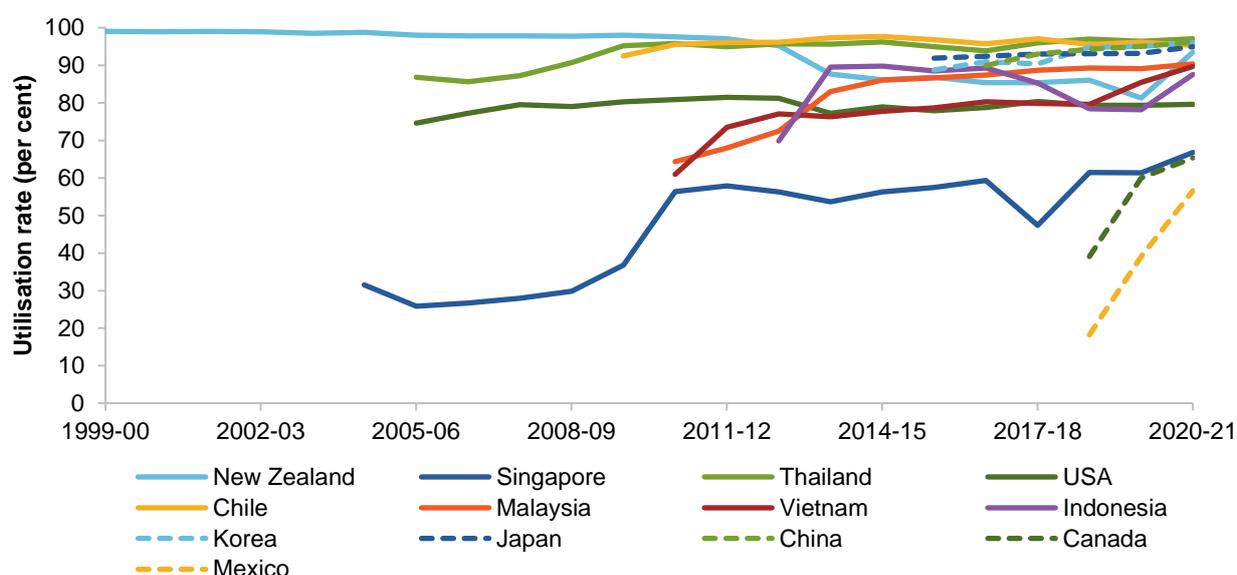
Source: World Bank estimates using the World Integrated Trade Solution system database (accessed 6 July 2022).

Alongside growth in the number of PTAs, greater utilisation of PTAs has also contributed to the fall in average applied rates (figure 2.6). Our estimates suggest that utilisation increased post-2008, despite the decline in tariff preference margins (and hence, the decline in the benefit of accessing preferences). The aggregate utilisation rate grew from 83 per cent in 2007-08 to 90 per cent in 2019-20. There are three possible reasons for this.

- More recent PTAs have less restrictive rules of origin than older PTAs (DFAT, pers. comm., 21 February 2022). Other things being equal, this would lead to more recent PTAs having higher utilisation rates than older PTAs. There is mixed evidence for this — the China and Japan PTAs have above-average utilisation rates, but other recent PTAs (for example, imports from Canada and Mexico under the Comprehensive and Progressive Agreement for Trans-Pacific Partnership) have below-average utilisation rates.
- Administrative processes for demonstrating compliance with PTAs have been simplified (DFAT, pers. comm., 21 February 2022). Other things being equal, this would lead to within-PTA increases in utilisation. The evidence for this is more solid — there has been a steady increase in PTA utilisation from most partners.
- Importers have become more familiar with each PTA over time. Other things equal, this would lead to sharp within-PTA increases in utilisation in the period after that PTA came into effect, followed by a plateau. The evidence for this is mixed — few PTAs obviously exhibit this pattern.

Figure 2.6 – Utilisation of preferential trade agreements has increased^{a,b}

Utilisation by country and financial year



a. Utilisation was not estimated for the year during which the agreement came into force to account for different commencement dates.

Source: Productivity Commission estimates using ABS (*International Trade in Goods and Services, Australia*, Cat. no. 5368.0).

Against the backdrop of this more complex PTA-based trading system, some countries have opted to unilaterally abolish tariffs because they have determined that the administration and compliance burden imposed by the system was not worth the small tariff revenues collected or the small amount of protection they provided. For example, Switzerland recently legislated to abolish its remaining tariffs on industrial products from 2024. Modelling by the Swiss Federal Government showed that foregone tariff revenue would total CHF 500 million per year on average, but the overall economic benefit of tariff removal would be equivalent to CHF 860 million per year (Sinha, Baumeler and Blöchliger 2021).

There have, however, been exceptions to the global trend of tariff reductions. Since 2018, the United States and China have been engaged in a trade war, which has led to significant tariff increases on trade between the two countries. The United States' average applied tariff on imports from China grew from 2.7 per cent to 17.5 per cent of import value and China's average applied tariff on imports from the United States grew from 5.7 per cent to 20.4 per cent (Amiti, Kong and Weinstein 2020). Studies have found that the trade war has had deleterious consequences for both the United States and China (Hass and Denmark 2020).

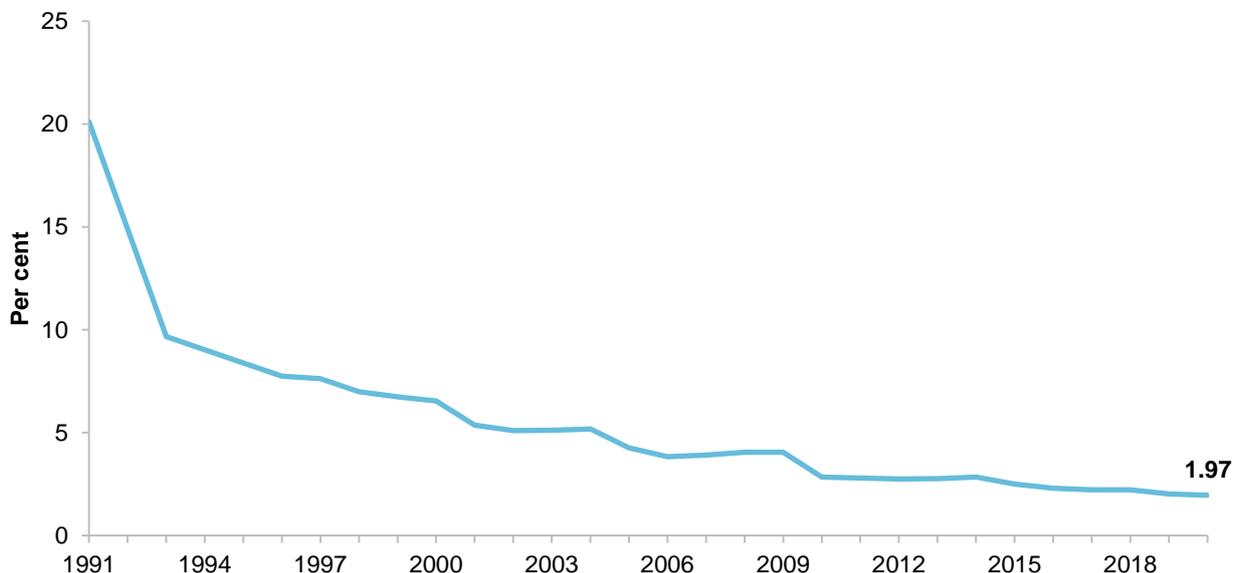
3. Fiscal implications of tariffs

Key points

- * **From a fiscal perspective, tariff revenues net of administration costs make a net positive contribution to Australia's budget.**
- * **Tariffs contributed \$1.5 billion or 0.3 per cent of total Australian Government revenue in 2019-20.**
 - Most goods enter Australia duty free, due to either a statutory tariff rate of 'Free', preferential trade agreement or one of several concessional instruments.
 - Revenue foregone through the use of preferences and concessions was \$6.2 billion — about four times as much as the value of revenue collected.
- * **Australian Government agencies incur costs administering import processes at the border. Only some of these costs relate to tariff collection; there are many other costs that relate, for example, to compliance with safety and biosecurity regulations.**
 - We estimate the annual cost of administering the tariff system to be between \$11 million and \$20 million.
 - This includes processing costs (for example, providing tariff advice and administering concessions and preferences) of between \$10 million and \$18 million and system management costs (for example, licensing customs brokers) of between \$1 million and \$2 million. Occasionally, a dispute over classification or access to a concessional rate can result in large legal costs.
- * **Most administration costs arise from preferential trade agreements and concessional instruments rather than from the existence of statutory tariffs themselves.**
 - The administration costs arising from preferential trade agreements are about \$5 million, while the administration costs arising from concessional instruments are likely between \$1.8 million and \$2.4 million.

Australia's statutory tariff rates have declined progressively since the 1980s and reduced tariff revenues (figure 3.1) (Emmery 1999). More recently, a proliferation of preferential trade agreements (PTAs) and concessional instruments has increased the amount of imports that enter tariff free, further reducing tariff revenues. This has also increased the costs incurred by the Australian Government administering the tariff system. This chapter assesses the fiscal implications of tariffs, including the revenue raised by Australia's existing tariff policy (section 3.1) and the associated administration costs (section 3.2).

Figure 3.1 – Australia’s average applied tariff rate has fallen since 1991
Average applied tariff rate, weighted by value of imports, 1991–2020

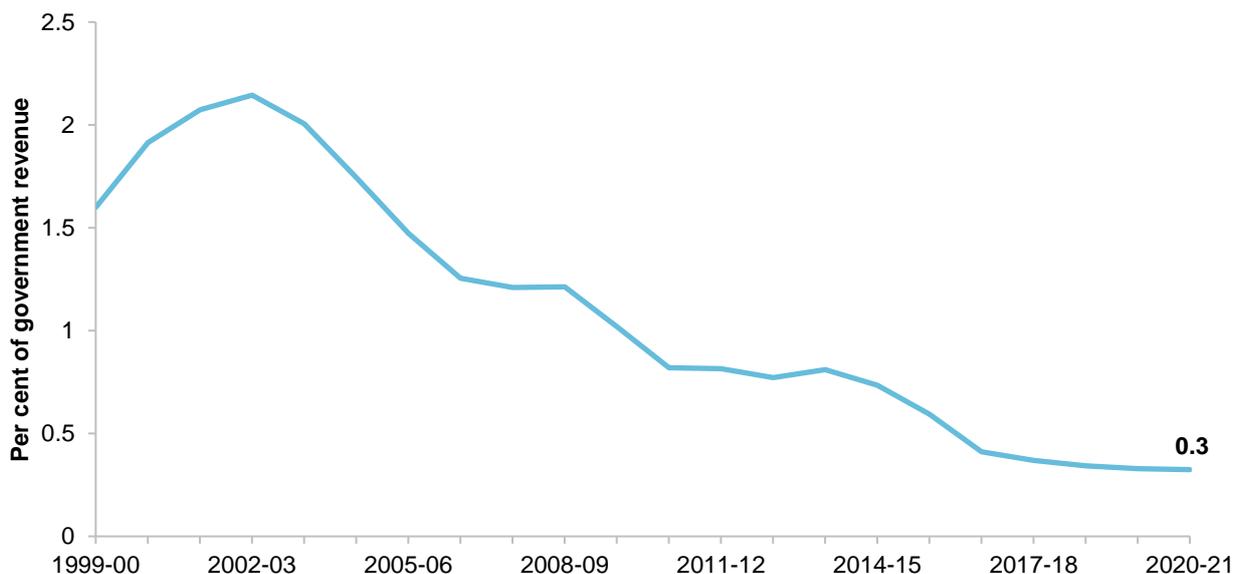


Source: World Bank estimates using the World Integrated Trade Solution system database (accessed 6 July 2022).

3.1 Revenue implications of Australia’s tariff policy

The importance of tariffs as a source of revenue for the Australian Government has diminished over the past 30 years. The contribution of tariff revenues has fallen from 2.1 per cent of total Australian Government revenue in 2002-03 to 0.3 per cent in 2019-20 (figure 3.2).

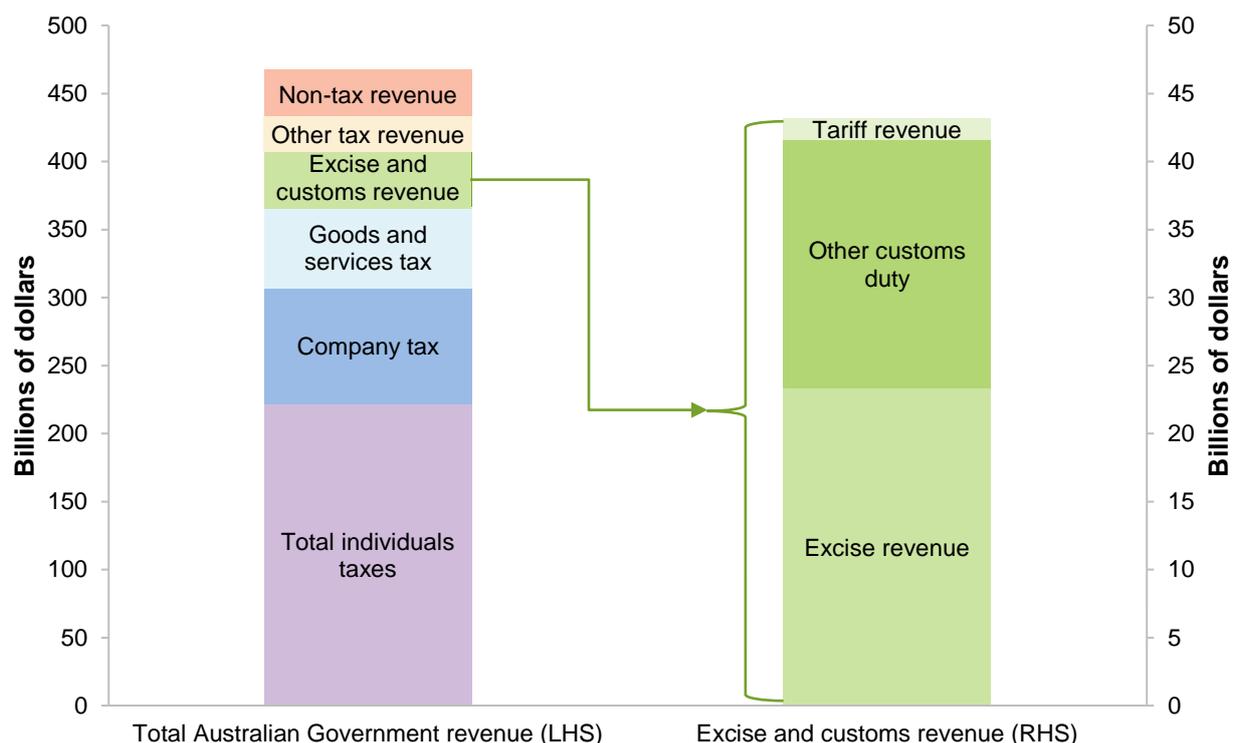
Figure 3.2 – The contribution of tariffs to government revenue has decreased



Source: Productivity Commission estimates using ABS (*International Trade in Goods and Services, Australia*, Cat. no. 5368.0); Budget Papers.

Tariff revenues amounted to about \$1.5 billion in 2019-20 — 0.3 per cent of total government revenue. For comparison, company taxation revenue was about \$85 billion in 2019-20 — 18 per cent of total government revenue (figure 3.3). The reduction in tariff revenue reflects both the low statutory rates that apply to Australia's remaining tariffs and the increased availability of PTAs and concessional instruments (chapter 2).

Figure 3.3 – Tariffs contributed just 0.3 per cent of total revenue collected by the Australian Government revenue in 2019-20^a



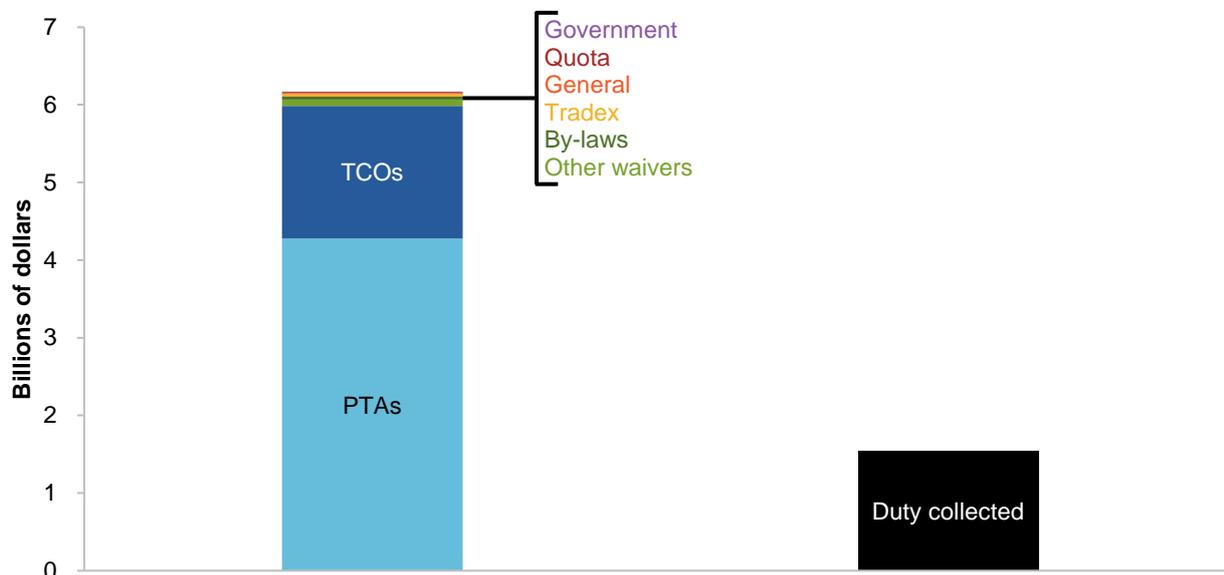
a. Other customs duty includes GST on imported goods. Other tax revenue includes superannuation fund taxes, the petroleum resource rent tax, the wine equalisation tax, the luxury car tax, the major bank levy, agricultural levies and other taxes. Non-tax revenue includes sales of goods and services, interest received, dividends and other non-taxation receipts.

Source: Productivity Commission estimates using ABS (*International Trade in Goods and Services, Australia*, Cat. no. 5368.0); Budget Papers.

Revenue foregone far exceeds revenue collected

The tariff revenue foregone due to the use of PTAs and concessional instruments far exceeds tariff revenue collected (figure 3.4). In 2019-20, the Australian Government collected \$1.5 billion in tariff revenue while revenue foregone was \$6.2 billion. The gap between the two will grow further once PTAs with the UK, India and the EU come into force (chapter 5).

Figure 3.4 – Revenue foregone due to preferential trade agreements and concessional instruments amounted to about \$6.2 billion in 2019-20^{a,b}



a. Revenue foregone calculated as the revenue that would have been collected based on the applicable statutory rate, had the PTA or concession not been used. b. The quota refers to Australia’s cheese and curd tariff quota, which allows 11 500 tonnes to be imported at a concessional rate of duty, after which a higher rate of duty applies.

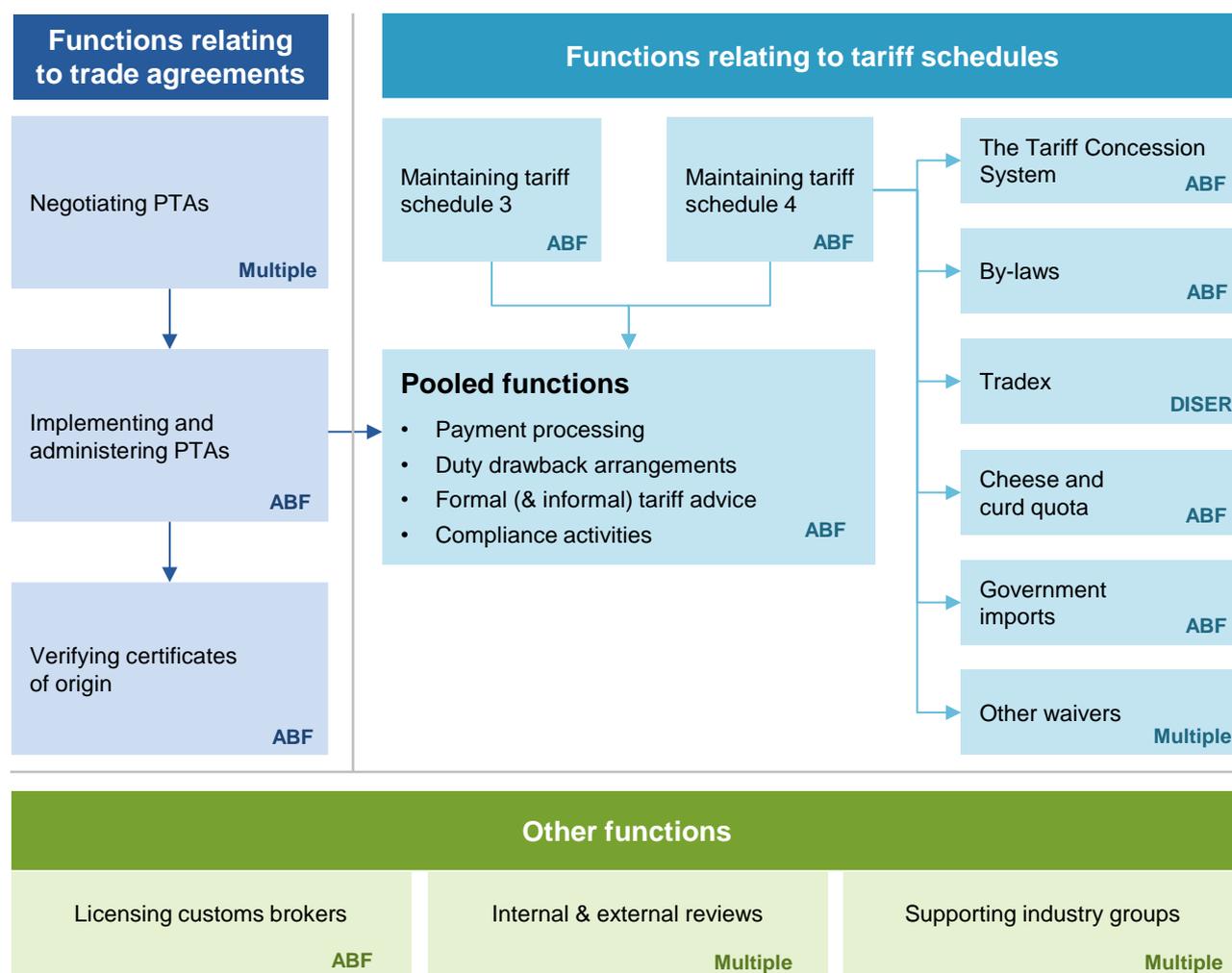
Source: Productivity Commission estimates using ABS (*International Trade in Goods and Services, Australia*, Cat. no. 5368.0).

The use of PTAs reduced tariff revenues by \$4.3 billion. The use of tariff concession orders (TCOs) reduced revenues by \$1.7 billion and other concessions reduced revenues by \$180 million.

3.2 Administration costs

Australian Government agencies incur administration costs when processing imports and managing the tariff system. This report focusses on the administration costs that are associated with the existence of the tariff system. Some costs stem from parts of the tariff system that are integrated with the broader system of importing goods and hence are difficult to isolate.

Administering the tariff system is a complex task. It involves many moving parts, including statutory tariff rates (schedule 3), concessional instruments listed in schedule 4, and PTAs. Furthermore, many agencies are involved (figure 3.5) which adds to the complexity. The Department of Foreign Affairs and Trade (DFAT) has primary responsibility for negotiating PTAs, while the Department of Agriculture, Water and the Environment and the Department of Industry, Science, Energy and Resources (DISER) are responsible for policy underpinning The Tariff (the schedules of the *Customs Tariff Act 1995*). The Treasury is also involved since tariffs are part of taxation policy. Australian Border Force (ABF) has primary responsibility for implementing and administering The Tariff and PTAs, in addition to many other functions that are required to import goods, such as inspections and licensing customs brokers.

Figure 3.5 – Administering the tariff system is a complex task

For the purpose of this report, administration costs have been split into processing costs and management costs. Processing costs derive from the day to day running of the system and can be attributed to specific parts of the system. Management costs derive from licensing, oversight and ongoing improvement functions of government. Most administrative costs are staffing costs (box 3.1).

Box 3.1 – Estimating staffing costs

The main source of administration cost is staffing. Where a cost is sourced from a report we report those costs, indexed to current dollars as appropriate, using the public sector wage price index. Where a source reports full-time equivalents, we estimate wage costs. We then add 15.4 per cent to account for superannuation expenses and a further \$15 000 per employee per year to account for office space, IT, HR and other corporate costs (Department of Finance 2019).

Processing costs

Processing costs depend on the volume of imports into Australia each year. Processing costs arise from:

- **providing tariff advice** to importers and government clients through the National Trade Advice Centre
- **administering the tariff classifications outlined in Schedule 3** of The Tariff — processing payments and refunds of customs duty
- **administering the concessional instruments and other facilitation schemes**, for example, the Tariff Concession System (TCS)
- **administering duty drawbacks**
- **administering preferences under trade agreements.**

Overall, the annual cost of processing tariffs, concessions, drawbacks and preferences is likely between \$9.5 million and \$18 million (table 3.1).

These estimates are relatively small, reflecting that tariffs are relatively inexpensive to collect from an administrative point of view. There is a lot of uncertainty in these estimates, because it is difficult to identify the costs that are strictly attributable to administering the tariff system. The estimates are likely to be conservative, but even if they were much larger, they would not change the small order of magnitude of the costs per dollar collected — between \$0.006 and \$0.012 per dollar of tariff revenue collected.

Table 3.1 – Annual processing costs^{a,b}

	Estimated administration cost
Tariff advice	\$1.7 million
Schedule 3	<\$500 000
Undertaking compliance activities	\$1 – \$8 million
Schedule 4 and duty drawbacks	\$1.8 – \$2.4 million
Preferential trade agreements	About \$5 million
Total	\$9.5 – \$18 million

a. Estimates have been scaled to include 15.4 per cent superannuation and operating costs of \$15 000 per FTE. **b.** For schemes that provide concession or exemption from charges other than tariffs, only the estimated cost associated with the tariff system has been included.

Source: Productivity Commission estimates based on ABF (pers. comm., 15 December 2021); DISER (pers. comm., 16 December 2021); PC (2010, p. 113).

The administration cost of some programs have not been estimated in this report, for example, the Australian Trusted Trader initiative, which allows accredited importers and exporters to avoid recurring compliance costs (ABF 2020a). ABF has responsibility for both accrediting firms and undertaking compliance activities. Currently, there are 828 Trusted Traders (340 new entities accredited in 2019-20 and 76 accredited in 2020-21), with expectations that there will be 1000 Trusted Traders by mid-2022 (Department of Home Affairs 2021, p. 129).

Trusted Traders can:

- receive tariff advice and origin rulings covering multiple goods under a single application
- avoid the need to provide Certificates of Origin and Declarations of Origin under some PTAs
- consolidate their duty payments into one monthly payment
- lodge a single import declaration for consignments covered by multiple cargo reports.

This has saved Trusted Traders almost \$4 million in import processing charges and reduced the number of requests for valuation and rules of origin advice that ABF has received, reducing administration costs (ABF 2020a).

Providing tariff advice

ABF provides tariff advice to importers and Australian Government clients through the National Trade Advice Centre. In 2020-21, ABF provided 1970 tariff classification advices to firms and 212 valuation and rules of origin advices (Department of Home Affairs 2021, p. 131). Staffing for the National Trade Advice Centre is 15 full-time equivalent (FTE), with total wage expenses of about \$1.3 million (ABF, pers. comm., 15 December 2021). Total operating costs, including superannuation, office space, IT and HR are likely to be in the order of \$1.7 million.

Administering Schedule 3

The ongoing cost of administering schedule 3 of The Tariff — largely processing payments and refunds — is small because the process is automated through the integrated cargo system.¹ The National Refunds Intervention team manages risks relating to refunds. Staffing for the National Refunds Intervention team is 8.5 FTE, with wage expenses of about \$1 million, though their scope extends beyond customs duty (ABF, pers. comm., 15 December 2021).² Hence, the administration cost that relates strictly to tariffs is only a small part of that cost. Assuming refunds are proportional to duty collected,³ and assuming constant marginal costs and zero fixed costs, we allocate costs of around \$75 000. This is likely an overestimate because of the simplifying assumptions made about fixed and marginal costs.

Undertaking compliance activities

The ABF has responsibility for ensuring compliance with tariff classifications, PTAs and concessional instruments. The cost of ensuring compliance with concessional instruments and PTAs is included below as part of the costs for administering schedule 4 and other concessional schemes, and administering preferences under trade agreements. Ensuring compliance with statutory tariff rates is a small part of ABF's compliance activities and was likely between \$1 million and \$8 million in 2019-20 (appendix B).

Administering Schedule 4, other concessions and duty drawbacks

Schedule 4 of The Tariff allows importers to use a variety of instruments to gain exemption from tariffs (chapter 2). ABF administers TCOs, by-laws and the Cheese and Curd Quota. DISER administers the Tradex scheme, the Certain Inputs to Manufacture program and the Space Concession. ABF also administers a few other schemes, which are not listed in Schedule 4, that exempt businesses from paying tariffs, including temporary imports and duty drawbacks.⁴

Some instruments provide exemption from GST and other duties in addition to tariffs, for example, Tradex and duty drawbacks. Hence, only part of the cost of those schemes can be attributed to tariffs. Customs warehouses provide deferment of duty rather than exemption. They are most used for goods that are subject to excise, for example alcohol and tobacco. Hence, the administration cost would not be greatly affected if all statutory tariff rates were 'Free' and the cost has not been attributed to the costs of administering tariffs. Though imports by Commonwealth departments and authorities are not subject to customs duty, they are

¹ Refunds are automatically generated when a tariff classification is changed, and a lower rate of duty applies.

² The scope of the National Refunds Intervention section of the ABF also includes GST, luxury car tax and wine equalisation tax.

³ Tariff revenue accounts for about 7.5 per cent of revenues collected by ABF (ABF 2021).

⁴ Duty drawbacks are not a concession; they provide for a refund of customs duty if an import is subsequently exported.

subject to an administrative charge. This charge is equal to the amount of duty that would be payable if they were imported commercially, ensuring that the Commonwealth is subject to the same conditions as commercial importers.

TCOs provide the most concession from tariffs (\$1.7 billion) and have the largest administration cost (table 3.2). Administering the TCS involves:

- assessing applications for a TCO to be made
- reviewing objections to a TCO being made
- assessing applications for a TCO to be revoked
- gazetting TCO applications
- maintaining and managing TCOs.

The cost of administering the TCS and the Cheese and Curd Quota was about \$1.6 million in 2020-21, which covers 9.4 FTE and expenses (ABF, pers. comm., 15 December 2021). The total administration cost of concessional instruments that can be attributed to tariffs is estimated at between \$1.8 million and \$2.4 million in 2020-21.

Table 3.2 – The annual cost of processing concessional instruments and duty drawbacks

Source of cost	Tariff revenue foregone	Estimated administration cost	Notes
Tariff Concession System	\$1.7 billion	\$1.6 million	Staffing is 9.4 FTE (ABF, pers. comm., 15 December 2021). The estimate also covers the administration of the Cheese and Curd Quota. Staffing for the TCS was 12.4 FTE in 2013-14, with total administration costs of \$1.6 million (ANAO 2015, p. 35).
By-laws	\$39 million	Likely <\$100 000	The average cost per dollar of concession for the Tariff Concession System and Tradex Scheme (\$0.0013) was used to estimate the administration cost for by-laws.
Tradex	\$38 million	Likely <\$100 000	Most of the concession provided by the Tradex scheme is from GST rather than customs duty. Staffing for the whole Tradex scheme is 5 FTE, with a total administration cost of \$915 000 (DISER, pers. comm., 16 December 2021). Between 2010-11 and 2016-17, the operating budget for Tradex was \$1.9 million (McAlester and Amon 2021, p. 24).
Government imports	\$500 000	Likely <\$100 000	The average cost per dollar of concession for the Tariff Concession System and Tradex Scheme (\$0.0013) was used to estimate the administration cost for government imports.
Cheese and Curd Quota	\$13 million	N/A	The cost of administering the Cheese and Curd Quota scheme is covered by the budget for the Tariff Concession System (ABF, pers. comm., 15 December 2021).
Certain Inputs to Manufacture	\$2.8 million	Likely <\$100 000	There has been an average of ten applications per year over the past six years (DISER, pers. comm., 28 June 2022).

Source of cost	Tariff revenue foregone	Estimated administration cost	Notes
Space Concession	Zero	Likely <\$100 000	DISER has received one applications for the Space Concession program (DISER, pers. comm., 3 June 2022).
Duty drawback arrangements	\$533.2 million ^a	Likely <\$100 000	Not all refunds provided by duty drawback arrangements are of tariff payments. Refunds are also provided for excise paid on excise equivalent goods. Staffing for the whole scheme is 6.08 FTE, with a total administration cost of \$865 000 (ABF, pers. comm., 15 December 2021).
Other waivers	About \$80 million	Likely <\$200 000	The average cost per dollar of concession for the Tariff Concession System and Tradex Scheme (\$0.0013) was used to estimate the administration cost for other waivers.
Total		\$1.8 – \$2.4 million	

a. This figure represents total refunds under the duty drawback scheme, including excise on alcohol, petroleum and tobacco products. It was not possible to estimate the value of refunded tariff revenue.

Source: Productivity Commission estimates based on ABF (pers. comm., 15 December 2021); DISER (pers. comm., 16 December 2021, pers. comm., 3 June 2022, pers. comm., 28 June 2022).

Administering arrangements under preferential trade agreements

Once negotiated and implemented, PTAs add a variety of administration costs to the tariff system.⁵ ABF has responsibility for implementing and administering PTAs, including ensuring compliance and verifying origin documentation such as declarations of origin. The cost of negotiating and implementing PTAs is discussed later (box 3.2). The cost of ensuring compliance with PTAs was \$1 million in 2008-09, according to the latest estimates the Commission was able to obtain. The cost of providing advice to Australian Government clients, importers and exporters was \$35 000. Since then, Australia has implemented a further ten PTAs, taking the total number to sixteen (chapter 2). As the number of PTAs has increased, the value of imports entering Australia from trade-partner countries has increased four-fold, from \$58 billion in 2008-09 to \$225 billion in 2019-20. Based on labour costs and the increase in the value of imports under PTAs the cost of ensuring compliance with PTAs and providing advice to importers currently, is estimated at about \$5 million.⁶

Management costs

Management costs are derived from licensing, oversight and ongoing improvement functions of government. Management costs are incurred by various agencies and departments, and arise from:

- **updating The Tariff**, which includes publishing schedules 3 and 4
- negotiating and implementing PTAs
- undertaking compliance activities

⁵ The costs involved in negotiating PTAs — which extend into the tens of millions — are treated as a sunk cost and have not been estimated in this report (appendix B). DFAT has primary responsibility for negotiating PTAs, though other agencies are involved.

⁶ The estimated cost for 2019-20 was calculated as $\$1 \text{ million} \times \left(\frac{\$225 \text{ million}}{\$58 \text{ million}}\right) \times \left(\frac{w^{ps}}{p^m}\right)$, where w^{ps} is the public sector wage price index and p^m is the import price index. Over the period, public sector wages increased by 37 per cent and the price of imports increased by 4 per cent.

- **licensing customs brokers**
- **conducting reviews of the tariff system**
- **costs arising from administration risks**, for example, legal challenges to tariff rulings.

This report has not estimated the cost of negotiating and implementing PTAs or possible costs arising from administration risk. Overall, the annual cost of managing the tariff system that has been estimated to be between \$1 million and \$2 million — 0.0006 to 0.0013 per dollar of tariff revenue collected (table 3.3).

Table 3.3 – The annual cost of managing the tariff system

Source of administration cost	Estimated administration cost
Maintaining The Tariff and Integrated Cargo System	Likely <\$100 000
Licensing customs brokers	Likely <\$100 000
Reviewing the system	>\$650 000
Administration risk ^a	Likely <\$150 000

a. Only covers cases settled in the Administrative Appeals Tribunal.

Source: Productivity Commission estimates based on ABF (pers. comm., 15 December 2021); ANAO (2015, p. 38).

Updating The Tariff

The ABF is responsible for updating The Tariff to account for changes to tariff policy. The Tariff is only updated periodically, and the cost is likely small. ABF is also responsible for maintaining the integrated cargo system, the cost of which is also likely to be small.

Negotiating and implementing preferential trade agreements

The total administration cost incurred negotiating and implementing PTAs has not been estimated because the information required to do so was not available, the costs vary with each agreement and the costs incurred in negotiating and implementing existing agreements are sunk costs (box 3.2). That said, the costs of negotiating and implementing the tariff parts of a PTA are conceptually linked to the existence of tariffs: they would not exist if tariffs did not exist.⁷

Box 3.2 – The cost of negotiation and implementation

Costs associated with negotiating trade agreements stem from the direct financial costs of staff time and other financial outlays, such as travel expenses, for DFAT and other participating Australian Government agencies. There are many stages in negotiating trade agreements. Prior to formal negotiations, departments incur costs familiarising themselves with the trading and regulatory systems of trading partners and consulting with stakeholders. Negotiation costs vary with each agreement, but they can extend into the tens of millions. The Australia-United States Free Trade Agreement (AUSFTA) was concluded after five rounds of negotiation. The Australia-China Free Trade Agreement had 21 rounds of negotiation. This report does not include an estimate of the total negotiation costs because the information required was not available and the cost of negotiating existing agreements is sunk, that is, it

⁷ The existence of tariffs can provide leverage in negotiations and can be thought of as a benefit, in that it contributes the position of Australian negotiators. This argument is discussed in chapter 5.

Box 3.2 – The cost of negotiation and implementation

has already been incurred and is not an ongoing cost. Some information can be gleaned from budget papers. For example, the Commission found that:

In the 2006–07 budget, supplementation funding of \$6 million was provided to a range of departments to participate in the negotiations for an Australia–China BRTA (Australian Government 2006). And in the 2007–08 budget, \$12.7 million was provided over two years for departments to continue those negotiations. In addition, \$4.3 million was allocated to agencies over two years to facilitate negotiation of an Australia–Japan BRTA. However, these appropriations represent only additional resources for government departments, above their baseline funding, and as such do not provide a complete picture of the costs of those *negotiations* (PC 2010, p. 109).

Australian Government agencies also incur costs implementing PTAs and educating stakeholders.

Implementation costs can stretch over a number of years, particularly where tariff changes are phased in over an extended period. Customs provided the Commission with estimates of its implementation costs for a number of Australia’s current BRTAs. Over a four-year period, implementation costs for the AUSFTA have been approximately \$970 000 (or \$242 500 per year), while the costs for implementing AANZFTA over a one-year period were approximately \$180 000 (PC 2010, p. 113).

PTAs are reviewed periodically, and certain aspects may be renegotiated. For example, the Australia New Zealand Closer Economic Relations Trade Agreement has been revised twice, in 2004 and between 2008 and 2010, probably reducing compliance costs for businesses (see chapter 4). The review process involves extensive consultations and consequently administration costs that are incurred by DFAT.

Source: PC (2010, pp. 107–113); DFAT (2022).

Licensing customs brokers

ABF is responsible for licensing customs brokers. Prospective brokers must apply and pay an application fee. ABF then conduct a fit and proper person assessment of the applicant before referring the application to the National Customs Brokers Licensing Advisory Committee for assessment and recommendation to the Comptroller-General of Customs. Customs brokers also provide services that relate to processes separate to the tariff system, for example:

- customs and quarantine clearances
- duty drawbacks and refunds
- import declarations
- classification of goods in accordance with customs regulations
- the paying of duties and taxes on behalf of the importer.

Hence, only part of the cost of licensing customs brokers can be attributed to the tariff system.

Reviewing the tariff system

The ABF regularly reviews the administration of the tariff system. The annual cost of reviews is about \$650 000. In addition to this, external reviews are conducted periodically. The Australian National Audit Office audit of TCS administration, which was conducted in 2014, cost \$476 500 (ANAO 2015, p. 38).

Administration risks

Occasionally, the Comptroller-General of Customs or importers will challenge a tariff or concession ruling, which exposes the Australian Government to legal expenses. We cannot accurately estimate the annual cost of these proceedings because they are infrequent and the outcome uncertain.

On average, the Comptroller-General of Customs is involved in two to three cases per year that relate to the tariff system. Most of these cases are settled in the Administrative Appeals Tribunal (AAT). We estimate that the average administration cost for cases settled in the AAT is less than \$150 000 per year, but the year-to-year outcomes would vary greatly.⁸

Occasionally, cases are appealed to the Federal Court, for example:

- Comptroller-General of Customs v Smoothflow Australia PTY Ltd [2021]
- Comptroller-General of Customs v Sulo MGB Australia Pty Ltd [2018]
- Comptroller-General of Customs v Pharm-A-Care Laboratories Pty Ltd [2018]
- Alstom Transport Australia Pty Ltd v Comptroller-General of Customs [2020].

These matters are likely considerably more costly, with matters that are appealed to the High Court even more costly still. Comptroller-General v Pharm-A-Care Laboratories Pty Ltd [2019] is the only case on matters relating to the tariff system that has been appealed to the High Court since 2015 (box 3.3).

Box 3.3 – Examples of significant disputes over tariff classification

In 2016, Australian Border Force (ABF) deemed vitamin preparations and the garcinia preparations imported by Pharm A Care to be food items (which attract a five per cent statutory rate of duty), while the importer contended that they were medicaments (to which a statutory rate of 'Free' applies). In 2017 the Administrative Appeals Tribunal (AAT) ruled that the goods were classifiable under heading 3004 and that no duty was owed on the importation of the preparations. The Comptroller General of Customs appealed the decision to the Federal Court. The Full Federal Court upheld the Tribunal's classification of the preparations. By grant of special leave — with the Comptroller General agreeing to pay Pharm A Care's costs regardless of the outcome — the Comptroller General appealed to the High Court. In 2020, the High Court found unanimously that the AAT was correct in concluding that the preparations fell outside the description of 'food supplements'. Consequently, the appeal was dismissed.

In 2021, the AAT ruled in favour of an importer in a dispute with ABF about whether a tariff concession order application for driverless passenger trains should be accepted. ABF had, in 2017, rejected the importer's tariff concession order application on the grounds that non-driverless passenger trains are manufactured in Australia. ABF's decision was affirmed by the AAT in 2019, but the importer successfully appealed the

⁸ The Commission could not locate estimates of the relevant costs. The average cost incurred by Comcare for a SRC Act matter in the AAT was \$55 205 in 2012-13 (PC 2014, p. 118). This has been used as an estimate the average cost incurred by the Comptroller-General of Customs per year.

Box 3.3 – Examples of significant disputes over tariff classification

decision in the Federal Court in 2020, which set aside the original decision and referred the matter back to the AAT for re-determination, which led to the tribunal's 2021 decision in favour of the importer.

As a consequence of some of these outcome, the Australian Government updated regulation. It is important to recognise that legislation can be amended to ensure that the intended effect of legislation is maintained, as is the case with any form of legislation that may be contested.

Source: *Alstom Transport Australia Pty Ltd v Comptroller General of Customs* (2021) AATA 3816; *Comptroller General of Customs v Pharm-A-Care Laboratories Pty Ltd* (2020) HCA 2.

Total costs of administering the tariff system

The total administration cost associated with current tariff settings that was possible to estimate, is between \$11 million and \$20 million annually — between \$0.007 and \$0.013 per dollar of tariff revenue collected (table 3.4). Because it was not possible to account for many costs in this study, these costs are likely grossly underestimated. That said, the framework developed provides a guide for the data required to produce more accurate estimates.

Table 3.4 – The total annual cost of administering the tariff system

	Cost
Processing cost	\$9 million to \$10 million
Management cost	\$2 million to \$10 million
Total	\$11 million to \$20 million

Source: Productivity Commission estimates.

4. Economic implications of tariffs

Key points

- ✳ **Businesses incur significant compliance costs when importing goods into Australia.**
 - These compliance costs arise because businesses exert effort to access preferential and concessional rates of customs duty.
 - Compliance costs come in two forms: the costs of the 'paperwork' needed to demonstrate eligibility for a preference or concession, and the costs of adapting production to make the imports eligible for the preference.
 - Some foreign producers may adapt their production processes to meet preference eligibility. Australian businesses and consumers bear the increases in costs that this might involve when they are passed along the supply chain.
- ✳ **Most of the estimated compliance costs that businesses incur arise from using preferences under preferential trade agreements. We estimate preferential trade agreement-related compliance costs to have been in the range of \$0.7–2.2 billion in 2019-20. The wide range accounts for the uncertainty that surrounds the estimates.**
 - Part of the compliance costs are passed on to consumers; others increase the costs of Australian exports.
 - Yet other adjustments can occur through pressure on returns to shareholders and on wages.
- ✳ **The tariff concession system also generates compliance costs for businesses. We estimate these compliance costs to have been at least \$5 million in 2019-20. This estimate is likely to omit many costs due to lack of data.**
- ✳ **Tariffs also impose costs by distorting domestic production and consumption. These costs are now quite small, as tariffs are levied at low rates and on few imports.**

Tariffs have broad-ranging consequences for the economy.

- They protect domestic producers from competition from lower-cost foreign producers. While this benefits businesses in protected industries, it also increases costs for consumers and distorts resource allocation among Australian businesses. Moreover, tariffs on intermediate goods used by domestic producers harm Australian producers, rather than protecting them.
- They also impose compliance costs, part of which are paid by Australian importers and part of which are paid by foreign exporters to Australia. Compliance costs fall on those accessing preferences and concessions from the statutory rate, as those businesses devote time and resources to become eligible for

them (if not already eligible) and to demonstrate their eligibility. Most of these costs are passed on along the supply chain to Australian consumers in the form of increased prices, at least in the short run.¹

The magnitude of the costs depends on tariff policy and its implementation, that is, tariff rates and their coverage of imports, and the way in which tariffs are administered in practice, all of which evolve over time. The increasing role of preferential trade agreements (PTAs) and concessions has increased the compliance costs to business (section 4.1). The progressive reduction of Australia's tariff rates has reduced their influence on the economy, particularly reducing distortions to consumption and production (section 4.2). Overall, we found that given the low level of tariffs and their application to a small part of imports, compliance costs impose larger costs on society than distortions (section 4.3).

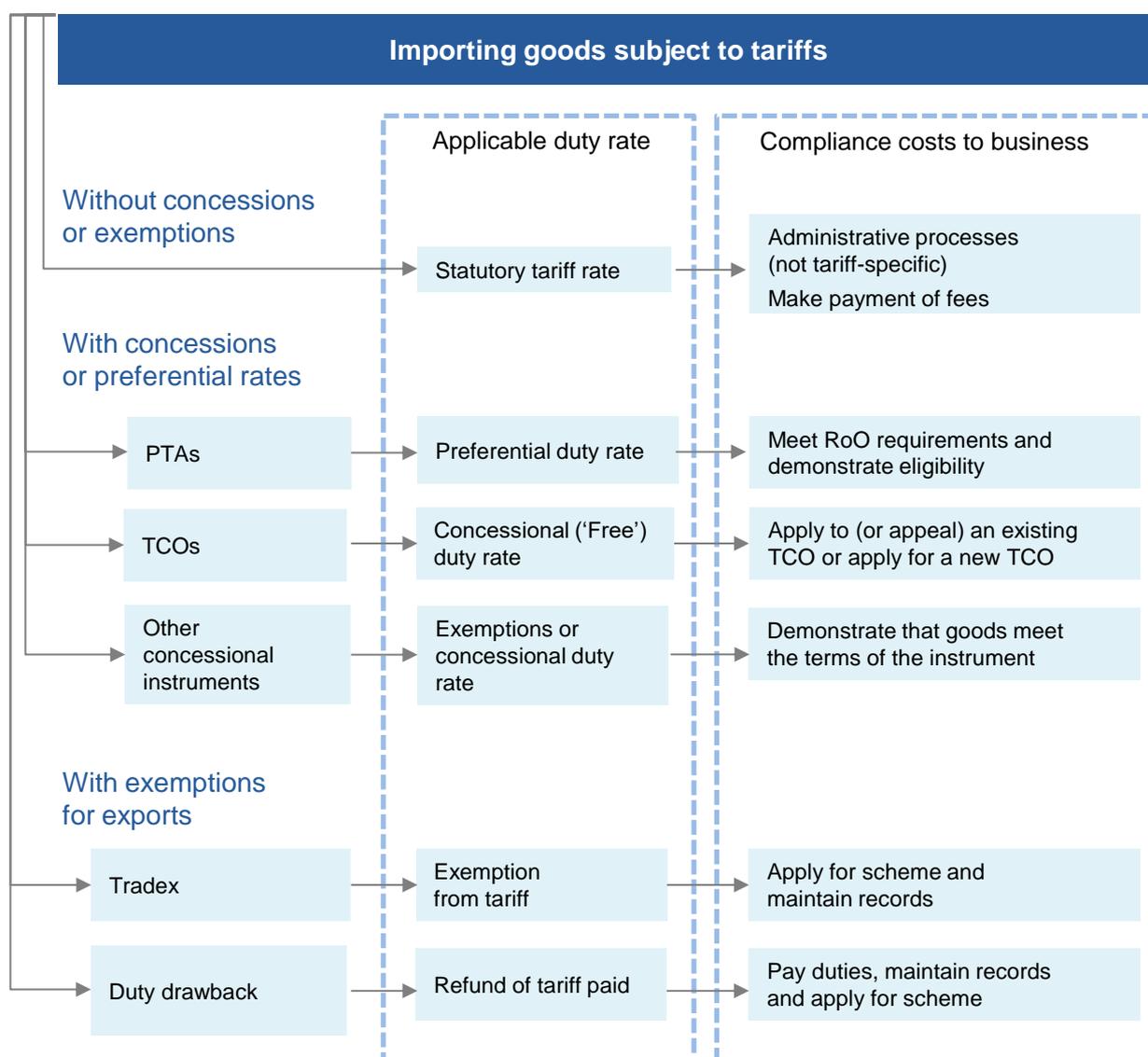
4.1 Compliance costs of avoiding tariffs

Regulations at the border result in costs for exporters to Australia and for Australian importers, but only some of these costs relate to tariffs.² All importers who face a positive statutory rate incur compliance costs. That said, the majority of these costs are incurred by businesses that access concessional or preferential rates of duty (figure 4.1). For instance, accessing a preference entails more involved interactions with the tariff administration than paying the statutory rate. Access to a preference can also require foreign producers to adapt their production process to abide by rules of origin (RoO) — or prevent them from adapting their production processes to take advantage of changes in the global economy that might make imports cheaper, or better suited to their production needs. On top of this, importers may require foreign suppliers to obtain an authorised certificate of origin. This is especially costly when shipments contain multiple parts from multiple suppliers as it can result in delays at the border.

Given that businesses can choose whether to apply for preferential or concessionary treatment, the associated compliance costs can be considered the 'avoidable' compliance costs of tariffs — that is, businesses could avoid them by paying the statutory rate. These avoidable costs are a function of tariff policy. They would not exist if all imports were simply subject to the statutory rate — although this would leave businesses that currently use preferences or concessions worse off. Neither would they exist if all statutory rates were 'Free', as there would be no need to access preferential or concessional rates. But in the current situation, the choice is to either pay the statutory rate or avoid paying it by incurring compliance costs.

¹ In the long run, adjustments occur — for example, users might find ways to adjust their processes to reduce the administrative costs that they incur in dealing with the system.

² This study excludes the costs of regulations and other taxes and charges that do not relate to the administration of tariff obligations and are related to other compliance activities. Compliance costs that relate to excise taxes, GST, quarantine, security and other operations that are required to process imports are not accounted for in any estimates in this report (see chapter 1 for discussion of the scope and of the counterfactual).

Figure 4.1 – Compliance costs that relate to tariff policy**What can be estimated?**

By their nature, compliance costs that businesses incur are not immediately visible to government or readily recorded by administrative systems. Moreover, businesses do not keep explicit records of the costs of interacting with the tariff system.

This chapter provides estimates of the compliance costs incurred as a result of tariffs on Australian imports. It estimates compliance costs incurred in 2019-20 against a counterfactual of costs that would not have been incurred had the statutory rate been 'Free'. We limit the estimation to the costs of complying with PTAs and with the tariff concession system (TCS), as these are the most common ways in which businesses reduce their tariff liabilities to zero — in 2019-20, 28 per cent of imports entered under a PTA, 11 per cent entered under the tariff concession system, and a different instrument was used to reduce the tariff to 'Free' for only one per cent of goods (chapter 2). Given data availability, we have used different approaches to estimate the compliance costs of PTAs and the TCS.

PTA-related compliance costs

In order to benefit from a PTA, a good must meet specific RoO requirements (box 4.1). This can result in compliance costs for both foreign exporters to Australia and for Australian importers.

- First, foreign exporters incur higher costs. This may include higher production costs, where producers source inputs and arrange their production processes to comply with regional value content requirements or change in tariff classification requirements. It may also include compliance costs for exporters in obtaining a certificate of origin, where this is required. These costs add to the price of imported goods, regardless of whether the Australian importer accesses the preference (box 4.2).
- Second, Australian importers who access a preference may incur administration costs in demonstrating that their goods are RoO-compliant. Some form of proof of origin is required at the time of claiming preferential rates of customs duty, unless this requirement has been waived such as under the Australian Trusted Trader origin waiver benefit. For most of Australia's PTAs a declaration of origin is usually sufficient, however, for several of Australia's PTAs, an authorised certificate of origin is required (ABF, pers. comm., 2 June 2022) Delays and disagreements with Australian Border Force about the validity of certificates can add to this part of compliance costs.

Both types add to costs along the supply chain and to the supply of goods and services that Australians consume – or export.

Box 4.1 – Accessing preferences — example: ChAFTA

There are four steps for importers to go through to access a preference under ChAFTA. First, the importers must determine the tariff classification of the good they are importing. This can be done through DFAT's FTA Portal or via a written advance ruling from Australian Border Force. Second, importers must determine how the good they are importing will be treated under ChAFTA, which can also be done through DFAT's FTA Portal. For example, in the case of butter, China's base tariff is 10 per cent. Under ChAFTA, the tariff for products of Australian origin is being reduced over ten equal annual stages. The tariff rate will reach zero per cent on 1 January 2024. Third, importers must determine whether the good they are importing meets rules of origin requirements. Under ChAFTA, goods meet the rules of origin requirements if they are:

- 'wholly obtained' or produced from wholly obtained goods in China or Australia; or
- 'wholly produced' entirely in China or Australia, or both, from materials classified as 'originating' in either country under the ROO; or
- produced in China or Australia, or both, using inputs from other countries, while meeting the Product Specific Rule (PSR) applicable to that good (DFAT 2020, p. 7).

Last, importers must prepare either a ChAFTA Certificate of Origin or a Declaration of Origin. Certificates of Origin must be issued by an authorised body in the country of origin. Declarations of Origin are only accepted for goods covered by an advance ruling and are completed by the exporter. Exporters or importers into Australia must keep all records necessary to demonstrate a good's origin for five years.

Source: DFAT (2020).

Box 4.2 – Incidence of compliance costs

Although a business might incur some compliance costs, the *incidence* of the cost often does not fall on that business — at least not entirely — and sometimes it falls entirely on downstream buyers in the form of an increase in the price that they charge their customers. This is especially the case if the demand for an import is totally inelastic, that is the demand for the import remains the same whatever the price, as represented by a vertical demand curve. This can be the case in the short term when users cannot adapt quickly to changes in prices. In these cases, the incidence of the cost (whether a tax or a compliance cost) falls on the purchasers, as the costs are passed on to successive buyers along a supply chain.

As time goes by, many buyers adapt to cost increases, usually by substituting toward less expensive goods. As buyers adapt, their demand curve becomes less vertical (more elastic), reflecting the responsiveness of quantity to price increases.

It remains that in the short term, and especially when a technology takes a long time to adjust, costs such as compliance costs are passed on along the supply chain. This explains why Australian consumers can ultimately bear the costs of compliance that exporters might incur when they adjust their production processes to adhere with rules of origin.

Estimated costs

While all importers use similar processes to access preferences, the compliance costs incurred can vary — particularly when measured relative to the value of the import. This is because:

- businesses vary in their abilities to undertake administrative processes
- the procedures for accessing a preference can vary between PTAs
- the value of imports varies
- the additional costs of producing goods in a RoO-compliant way varies.

As such, it is not straightforward to estimate how businesses are affected by PTA-related compliance costs.

A useful starting point is that businesses would *only* access a preference where the expected cost of accessing the reduced rate (the compliance cost) is less than the statutory rate. In other words, businesses compare the costs that they expect to incur when accessing the preference and the net benefit of accessing the preference (i.e., avoiding the statutory tariff but incurring the compliance costs associated with accessing the preference). Where these expected compliance costs exceed the statutory rate, businesses would not access the preference — they would instead pay the statutory tariff and incur no PTA-related compliance costs.

Researchers across the world (such as Anson et al. 2005; Cadot et al. 2006; Carrère and de Melo 2015; Francois, Hoekman and Manchin 2006) have used this idea in their method to estimate PTA-related compliance costs; there have not yet been any such studies of Australian PTAs. We estimated the compliance costs associated with Australian PTAs by following a similar method to that of these other studies and found that our estimates are in line with estimates of similar PTAs, which suggests that our estimates are credible. The full methodology and the results of the benchmarking exercise are shown in appendix C.

We estimated compliance costs associated with accessing preferences to be 0.9–2.8 per cent of the value of imports that benefitted from a preference, consistent with these costs being less than the statutory rate. This is equivalent to \$0.7–2.2 billion in 2019-20.

Tariff concession system-related compliance costs

The establishment, use, and repeal of tariff concession orders (TCOs) can involve compliance costs for importers and domestic manufacturers.³

- Importers can apply to establish a TCO if a suitable one does not exist. An application must contain a description of the goods and information to support the claim that there are no manufacturers of substitutable goods in Australia — and can run to 100 pages (Trade Consultants 2017). There can also be some costs associated with delays — Australian Border Force (ABF) has 28 days to process the application, after which it must be gazetted for at least 50 days to allow manufacturers to object — although if ultimately accepted, the TCO is deemed to apply from the date of application and the importer can apply for any duty paid to be refunded (ANAO 2015, pp. 28–29).
- Using an existing TCO requires the importer to locate a TCO that precisely matches their good and make a declaration to that effect. Complexities (and, hence, compliance costs) arise when it is unclear whether one of the 15 000 existing TCOs applies to the good in question. For example, legal precedents have now established that the TCO must cover the entirety of the goods being imported, unless additional components are clearly integral to the goods described by the TCO (Hunt & Hunt Lawyers 2015). Importers will sometimes request formal advice from ABF on whether an existing TCO is applicable.
- Australian manufacturers can appeal to revoke an existing TCO if they produce a substitutable good.⁴ Manufacturers incur compliance costs through this process as they are required to provide evidence that they manufacture goods that can be substituted for those described by the TCO (ANAO 2015, p. 15).

Estimated costs

While the processes for using, applying for, or revoking a TCO are well-documented, the associated compliance costs are not. Our approach was to seek advice from four customs brokers on the typical rates they charge for TCO-related services, and to make use of previous estimates where possible.

To apply for a TCO on behalf of an importer, brokers advised that they charge — on average — a flat rate of \$4250 per TCO application, except for rare cases of exceptional complexity.⁵ As there were 864 TCO applications made in 2018-19 (ABF, pers. comm., 15 December 2021), we estimated this component of TCS-related compliance costs to be about \$3.7 million in 2019-20.⁶

Similarly, our estimates of the costs of seeking TCO-related advice from ABF is based on customs brokers' typical charges to importers. Brokers advised that they charge — on average — a flat rate of \$650 per application, except for rare cases of exceptional complexity. As there were 2244 cases of advice requested

³ In addition, it is plausible that foreign exporters incur compliance costs by producing goods specifically to meet the conditions of a TCO, in the same way that foreign exporters incur compliance costs by producing goods specifically to meet the RoO requirements of a PTA. In the case of TCOs, foreign producers would modify their products to avoid them being considered substitutable for Australian made products, rather than meeting some local content requirement.

⁴ In the context of TCOs, a substitutable good is one that can be used in the same way as the import that is specified in the TCO (ABF 2018). This does not require the goods to be identical. For example, in the case of *Alstom Transport Australia Pty Ltd v Comptroller-General of Customs* [2020], imported driverless trains were found to be close enough substitutes for domestically produced driver-operated trains that a TCO was not granted.

⁵ This rate includes the average additional charge of contacting industry associations to provide evidence that there is no domestic producer of the type of good to which the proposed TCO applies.

⁶ Data on the number of TCO applications made in 2019-20 were not available.

in 2019-20, we estimated this component of TCS-related business compliance costs to be about \$1.46 million in that financial year.⁷

We estimated the compliance costs of objecting to the creation of a proposed TCO and seeking to have an existing TCO revoked by drawing on the Australian National Audit Office's finding that 'user estimates of the cost to object to a TCO by local manufacturers have started at around 16 hours and approximately \$750–\$1000' (ANAO 2015, p. 69). Assuming \$1000 as the current cost of applying for a revocation or objection and noting that there were 61 objections and 61 revocation applications made in 2018-19 (ABF, pers. comm., 15 December 2021), we estimated this component of TCO-related compliance costs to be about \$0.1 million in 2019-20.⁸

Chapter 3 outlined a few cases in which disputes resulted in significant costs both for the government and the businesses involved. The costs to individual businesses involved in prolonged disputes can be significant — particularly in cases that are escalated to the Administrative Appeals Tribunal, the Federal Court and the High Court, potentially over a period of several years. It is difficult to accurately estimate the likely total costs of such disputes on aggregate, as they do occur only occasionally. We have not estimated these costs. Estimating these expected costs would involve multiplying the cost of litigation and associated costs by their probability of occurring. Although the costs associated with a particular event can be large, the probability of it occurring is relatively low. That said, the probability could vary depending on the sector of activity or whether something has been tested in the past or not.

We have also not estimated the costs of using existing TCOs, as customs brokers advised that they typically do not itemise these costs separately.

Hence, we estimate annual TCS-related compliance costs to be *at least* \$5 million. The \$5 million calculation understates the true TCS-related compliance costs, because of the uncoded components outlined above. Better information about these components would improve the estimate of total compliance costs.

4.2 Distortions and costs to the economy

A rules-based trading system with few impediments to trade provides economic gains for participating economies (PC 2001, p. 2). Developments such as the lowering of tariffs and the growth of global supply chains have boosted trade, to Australia's benefit (PC 2017b, p. 84).

The potential for tariffs to cause distortions to production and consumption (both domestically and internationally) manifests in different ways and has been well-explored (box 4.3). For example, the Centre for International Economics (2017) estimated that a 10 per cent *increase* in the price of all imported goods due to higher tariffs would result in a 14.4 per cent reduction in imports, 12.5 per cent reduction in exports, 4.7 per cent reduction in investment, 0.7 per cent reduction in wages, and 1.5 per cent reduction in consumption.

⁷ Not all businesses use customs brokers. Some pay in-house employees who are charged with these functions.

⁸ Taking the upper end of the range allows for inflation since 2015 and that the costs 'start at' \$750–\$1000. Data on the number of TCO applications made in 2019-20 were not available.

Box 4.3 – Distortions caused by tariffs

Distortions to the domestic economy

Tariffs distort domestic production and consumption.

- Tariffs on final goods (about half of the value of goods subject to tariffs) distort domestic production by protecting Australian producers from international competition. This leads to Australian resources being devoted to producing goods that could be produced more efficiently abroad. The Commission's Trade and Assistance Review 2019-20 identified the manufacturing sector as the sector that benefitted the most from tariffs on final goods (PC 2021, p. 5), and modelling undertaken for this research suggests that knitted product manufacturing is the specific industry whose price is most inflated by tariffs on final goods (box 4.4).
- Tariffs on intermediate goods (roughly the other half of the value of goods subject to tariffs) distort domestic production by increasing Australian producers' input costs, and thus placing them at a disadvantage against competitors from abroad. This leads to Australian resources *not* being devoted to producing goods that could be produced most efficiently in Australia. The Trade and Assistance Review 2019-20 found the services sector to be the hardest-hit by tariffs on intermediate goods (PC 2021, p. 5), and modelling undertaken for this research suggests that clothing manufacturing is the specific industry whose size is most deflated by tariffs on intermediate goods (box 4.4).
- Tariffs distort domestic consumption by causing consumers to alter their consumption patterns in line with these production distortions, and to substitute from tradeable goods and goods produced using tradeable inputs toward non-tradeable inputs (such as some services), whose cost is not inflated by tariffs.

Increased costs caused by distortions to foreign production

Australian businesses are also affected by distortions in foreign industries. If preferential duty rates are contingent on local content rules (as stipulated in rules of origin), this is advantageous for producers with a particular input-supply chain — not necessarily the most efficient producer. As a result, Australian consumers and importers may pay higher prices and/or obtain lower quality products. Some foreign manufacturers can adapt production processes for export to Australia to satisfy rules of origin. For the purposes of this report, these costs are included as part of the compliance costs associated with avoiding tariffs (section 4.1) rather than costs due to distortions.

Trade diversion

Tariffs that are set at different rates for different countries (for example, via preferential trade agreements) can increase the total amount of trade (trade-creating) or can lead to trade being diverted from one country to another (trade-diverting). The debate about the net effect has not been settled: Adams et al. (2003) found that many preferential trade agreements were net trade-diverting, while DeRosa (2007) found that most trade agreements were net trade-creating.

For many of the effects described in box 4.2, the magnitude of the costs or distortions depends on the structure of tariff rates. Higher tariff rates provide stronger incentives for producers and consumers to modify their behaviours, resulting in greater shifts away from more efficient choices. In this way, lower tariff rates are less protective of domestic industries than higher rates. Lower rates of protection mean that any differentials across domestic industries are smaller, and allocative distortions are therefore smaller. And given domestic

producers are afforded relatively little protection, those that operate in a low-tariff environment are efficient compared to those that could only operate in a high-tariff environment.

The magnitude of the distortions also depends on the breadth of tariff coverage. Compared to previous decades, protected industries now account for a much smaller part of the economy (chapter 2). Even if higher tariff rates were applied to these small industries, the economy-wide distortion would be small. That said, the distortion would not necessarily be small in proportion to the tariff revenue raised.

Avoiding such distortions has been a driving force behind global efforts to reduce tariffs. At a statutory rate of five per cent, Australia's remaining tariffs are less distortionary than the higher levels that prevailed historically — they are now likely to offer little protection to Australian producers and likely to produce only small distortion in the choices of Australian producers and consumers.

Indeed, evidence from economic modelling is consistent with this point.

- A study commissioned for the 2010 Henry Tax Review found that, per dollar of revenue raised, tariffs were among the least costly of all Australian taxes (KPMG Econtech 2010). It found that the average excess burden associated with tariffs (a measure of the economy-wide costs of tariffs that can be directly compared to the administrative and compliance costs) was *negative* — $-\$0.07$ per dollar of tariff revenue raised, consistent with a *benefit* to the economy of \$105 million in 2019-20.⁹ The negative distortions associated with the reallocation of resources across the Australian economy were small enough to be offset by terms of trade gains (box 4.4).¹⁰
- To update the estimates from the Econtech study, we modelled the effects of tariffs on the Australian economy for this study with a simple model of the Australian economy, PCNational (box 4.5). Consistent with the Econtech study, we found that Australia's remaining tariffs have a small economy-wide *benefit* as measured by an average excess burden of $-\$0.10$ per dollar raised. Ten years separate the Econtech study and the one conducted for this study and tariff revenues have almost halved. With a smaller tariff the cost of distortions is smaller, but the terms of trade benefits remain. The net positive effect occurs from the terms of trade gains as in the Econtech study.

⁹ Assuming that the measure of excess burden from MM900 applies to the amount of tariff collected in 2019-20, \$1.5 billion.

¹⁰ This relates to the optimal tariff argument, where a tariff can benefit a country if the costs from distortion are small enough compared to the benefits from the terms of trade gains. In most models of the Australian economy, the terms of trade gains associated with a tariff relate to the assumed market power associated with Australian mining exports, due to their large share in global markets. In such models, increasing tariffs on imports into Australia increases production costs for these exporters, reducing their quantity of exports. With reduced supply on world markets, export prices rise to Australia's benefit. The positive terms of trade effect that is observed in some modelling is contentious, arising from the assumption that the demand for Australian mining exports is relatively inelastic, and therefore the terms of trade effects are large relative to the distortion costs that are small when associated with a small tariff. The net benefit result cannot be relied on in this analyses because the positive terms of trade effect is contingent on an inelastic demand for mining exports and is therefore speculative.

Box 4.4 – Measuring excess burden in an economic model

KPMG Econtech (2010) used excess burden as a measure of the economic costs of tariffs to the Australian economy. We use a similar measure to validate our estimates of the costs of distortions, but identify the costs of distortions separately from the overall welfare effects of tariffs.

The excess burden associated with a tax is defined as the ratio between the change in welfare and the change in tax revenue that are associated with a change in tax. The *average* excess burden measures the welfare costs per dollar of tax collected. The *marginal* excess burden measures the costs associated with collecting an additional dollar of tax. The measure used in this report is the cost of collecting all tariff revenue, per dollar of revenue collected, that is, the average measure. The cost is measured by simulating the removal of the tariff.

The measure of welfare depends on the features of the model used.

MM900 model

KPMG Econtech (2010) use a model of the Australian economy called MM900, in which people are assumed to maximise the utility of current consumption, savings and leisure (pp. 18–21). The authors simulate the elimination of the existing tariff to estimate its costs to the economy. When the tariff is removed, consumer income is also reduced through a lumpsum tax^a by the amount of the revenue collected, so that their income does not change as a result of the removal of the tariff. ‘This means that the change in welfare only arises from the distortions [and] is known as the compensating variation. In the MM900 model, the compensating variation **can be interpreted as the real change in consumption, saving and leisure** [emphasis added]’ (p. 21). The change in welfare is therefore calculated as the sum of changes in the value of consumption, savings (future consumption) and leisure, deflated by the relevant price index to obtain the change in people’s purchasing power.

PCNational

As a simpler model, the PCNational (PC 2017a) model does not include a representation of labour supply or the labour-leisure trade-off — the supply of labour, and therefore the amount of leisure, are both assumed to be fixed, or unaffected by changes in tariffs. Assuming the same closure (set-up) as in MM900 (including a lumpsum tax of the amount of tariff to keep income constant) and by analogy with the measure in MM900, the change in the measure of welfare can therefore be approximated with the change in real gross domestic product (the sum of changes in consumption and savings), deflated by an appropriate price index to capture changes in purchasing power. In PCNational, we use real gross national absorption (GNA) as the measure of welfare as described in PC (2017a, p. 19). The average excess burden is therefore calculated as the change in real GNA divided by the total amount of tariff collected.

a. In this context, the lumpsum tax is used as a device to simulate the income adjustment required to calculate the excess burden. It is not intended to simulate a policy or method by which tariff revenue might be replaced by another source of revenue.

Source: KPMG Econtech (2010); PC (2017a).

Box 4.5 – Modelling the effects of tariffs on the Australian economy

The Commission used the PCNational model to illustrate the costs of distortions to the Australian economy. PCNational is a simple computable general equilibrium model of the Australian economy, which was used in Commission's 2017 report *Rising Protectionism* (PC 2017b). The version used for this study is based on the Australian input-output tables 2018-19 (ABS 2021).

We modelled the distortions induced by tariffs by simulating the removal of all tariffs. Further, to emulate the excess burden calculation in the Econtech (2010) report, the reduction in tariff revenue was compensated by a transfer to government of income from the users of imports whose income increased by the amount of the tariff reduction (the lumpsum tax). This transfer of tariff revenue leaves importers' incomes unchanged, isolating the substitution or reallocation effects. The result of the simulation is therefore interpreted as the change in welfare that is attributable to the distortions that are associated with the existence of the tariff (box 4.3). In the first instance, eliminating tariffs leaves expenditure nearly constant, but increases the share of imports.

Tariffs constrain trade and increase production costs

Removing tariffs reduces the average price of imports by 0.46 per cent (table below; tariffs are modelled as applied rates, and therefore account for TCOs and PTAs reducing the rates below the statutory rates) and reduces the CPI by 0.12 per cent. Assuming that labour can adjust across sectors within Australia and capital can also adjust internationally to equate its rate of return (that is, allowing for international capital flows), the demand for imports increases by 0.34 per cent. As in the MM900 simulation, the reduction in tariffs reduces the cost of production and increases exports (by 0.64 per cent). With downward sloping demands for Australian exports (mainly minerals and agricultural products), the price of exports declines (-0.08 per cent) and the terms of trade deteriorate. Real national expenditure (gross national absorption or GNA, the indicator of welfare) falls by \$189.89 million with the removal of tariffs.

Effects of tariff removal on aggregate variables

Variable	Per cent changes	\$ million
Real GDP	0.072	1410.31
Real GNP	0.011	193.24
Real GNA	-0.011	-189.89
Import price	-0.459	na
Export price	-0.083	na
Import volume	0.341	1,399.89
Export volume	0.638	2,930.93
Terms of trade	-0.083	-383.12
Returns to capital ^a	0.162	1217.07

a. Changes in returns to capital used in Australia, equivalent to changes in returns to capital owned by foreigners, net of Australian income tax and therefore paid to foreigners. **na** Not available.

Source: PC estimates.

Industries adjust differently

Removing tariffs increases imports and triggers a reallocation of resources between industries. The effects on an industry depend not only on the level of protection afforded to its output, but also on any

Box 4.5 – Modelling the effects of tariffs on the Australian economy

tariffs on its intermediate inputs. In most cases, removing tariffs increases imports and decreases the output of domestically produced goods. However, if removing tariffs substantially reduces the costs of intermediate inputs of an industry, the price of its output falls and the domestic and foreign demand for its product increases. As a result, the industry expands. The ten most affected industries from the simulations are listed in the table below.

Effects of tariff removal on industry size and price

Industry	Output	Price
Knitted Product Manufacturing	2.13	-0.49
Accommodation	0.88	-0.11
Iron Ore Mining	0.66	-0.12
Oil and gas extraction	0.57	-0.12
Coal mining	0.57	-0.10
Sawmill Product Manufacturing	-1.05	-0.05
Furniture Manufacturing	-1.24	-0.01
Textile Manufacturing	-1.99	-0.06
Textile Product Manufacturing	-4.09	0.00
Motor Vehicles and Parts; Other Transport Equipment manufacturing	-6.06	0.10

Source: Productivity Commission estimates.

The knitted product industry size expands the most, and some textile industries size contract the most. As these products receive similar protection, removing their tariffs reduces the domestic prices of these imports by a similar proportion. However, the removal of tariffs has very different impacts on the costs of their intermediate inputs. The prices of domestically produced textiles decline less than 0.06 per cent, while the price of knitted products declines by 0.49 per cent. This is largely due to the decrease in the costs of intermediate inputs (both imported and domestically produced) in the knitted product industry, which is much more than the decline in the price of imported knitted goods. This difference explains the sharp contrast in their output responses.

Calculating the excess burden of the tariff

The aggregate welfare effect of the tariff can be measured as the change in real GNA that is foregone while the tariff is in place compared to a 'no tariff' counterfactual. Assuming that capital use adjusts across industries and countries, the welfare loss associated with eliminating the tariffs is estimated at \$189.89 million in 2018-19 prices (the input-output table reports aggregate tariff revenue as \$1.89 billion, slightly different from the value used in the rest of this report). The excess burden of a dollar of tariff is therefore calculated as -\$0.10 per dollar collected. This is close to the -\$0.07 per dollar collected estimated with MM900, but larger, because tariff revenues (the denominator in the excess burden calculation) have declined since the MM900 estimate was produced (when tariff revenue exceeded \$3.5 billion).

In both simulations, this welfare loss needs to be interpreted with caution. A tariff generates *distortion costs* from reallocating resources toward relatively less productive industries and *benefits* from improved terms of trade. The net effect on welfare depends on which effect is greater. Under normal conditions, a tariff generates a net welfare loss to the economy because the distortion costs outweigh the terms of

Box 4.5 – Modelling the effects of tariffs on the Australian economy

trade gains. However, when tariffs are sufficiently low, distortion cost can be small enough for the gains from the improvement in the terms of trade to turn the welfare result into a net gain.

The small net benefit in the model simulation comes from the terms of trade improvement, which is based on the assumption that Australian exports face a downward sloping demand (see footnote 7). This assumption could overstate the terms of trade gain. In the long run in particular, competition from other countries is likely to make export prices less responsive to changes in Australian supply to the global market.

Calculating the cost of distortions

If the terms of trade benefit were zero, then the numerator in the excess burden calculation would reduce the costs of the distortions, which are measured by the change in real GNP. The cost of distortions amounts to \$193.23 million,^a or \$0.10 per dollar of tariff collected,^b a net cost, instead of the net benefit shown when the terms of trade benefits are included in the overall welfare costs.

a. Change in real GNA less terms of trade effect, that is: $-\$189.89 - (-\$383.12) = \$193.23$. b. Tariff collected in the PCNational database is \$1.89 billion.

4.3 Overall assessment of economic costs

In this chapter, the economic costs of tariffs are assessed via two types of modelling.

Results from section 4.1 indicate that there are sizable costs to businesses in navigating the noodle bowl formed by the multiple PTAs with various and complex RoO. We estimate compliance costs to exceed \$0.7–2.2 billion — or \$0.49–1.45 per dollar of tariff revenue (table 4.1).

Results from section 4.2 show that the cost of distortions is estimated at \$0.10 per dollar of tariff collected.

The compliance cost per dollar of tariff revenue adds to the administrative costs and the cost of distortions. Accounting for compliance costs and distortions results in an estimated economic cost of \$0.59–\$1.55 per dollar of tariff collected.

Table 4.1 – Estimated economic costs

	Cost	Cost per dollar of tariff revenue
PTA-related compliance	\$0.7-2.2 billion	\$0.48-1.44
TCS-related compliance	At least \$5 million	At least \$0.01
Cost of distortions	\$150 million ^a	\$0.10
Total economic costs	\$0.8-2.4 billion	\$0.59-1.55

a. Value reported in box 4.4 is adjusted to be consistent with the value of tariffs in 2019-20.

Source: Productivity Commission estimates (see appendix C).

5. Why the nuisance costs of tariffs matter

Key points

- ✳ **In Australia's low-tariff environment, the influence that tariffs have on businesses and the economy is shaped by administrative and compliance costs.**
 - Most imports into Australia are duty-free and the remainder are subject to low tariff rates. Australia's tariffs are unlikely to provide significant protection to industry, nor significant distortions to production and consumption.
- ✳ **As more preferences and concessions have been introduced into the tariff system, compliance costs have increased, and revenues decreased**
 - In 2019-2020, businesses incurred costs estimated at \$0.7–2.2 billion to access preferences. Compliance costs are additional to the direct costs of paying tariffs in the order of \$1.5 billion per year. All these costs are eventually borne to some degree by consumers.
 - We estimate that tariff revenues fall by \$106–134 million once the Preferential Trade Agreements (PTAs) with the UK is implemented, by a further \$61–68 million once the PTA with India is implemented, and by a further \$704–774 million once the PTA with the EU is signed and implemented. The implementation of these three agreements would extend the coverage of preferences by 22–26 per cent, increasing the tariff-related compliance costs incurred by businesses by about 22–26 per cent.
- ✳ **The relatively low rate of tariffs makes them a relatively efficient tax. But once compliance costs are considered, tariffs are inefficient compared to other taxes.**
 - Small changes to personal income tax would raise as much revenue as import tariffs but at lower cost. The social cost has been estimated at \$0.20-0.30 per dollar of income tax raised.
 - By comparison, we estimate the average social cost of raising \$1.5 billion in tariff revenue to be \$0.59-1.57 per dollar of revenue collected.
 - Once PTAs with the UK, India and the EU are implemented, we estimate the average social cost of what will then be \$579–664 million in tariff revenue, to rise to \$1.41–\$4.81 per dollar of revenue collected.
- ✳ **More analysis prior to the negotiation of PTAs is required to consider the costs of Australian tariffs and their value in negotiating positive outcomes for Australian exporters and other stakeholders.**

While the vast majority of imports to Australia enter duty-free — either through the use of preferences or concessions, or because the statutory rate is 'Free' — the rest, that is about 10 per cent of imports, are almost all subject to a tariff rate of five per cent. As such, the most common definition of 'nuisance tariffs'

(those under a threshold rate of two per cent), which is based on the fiscal concept of a tax that does not raise enough revenue to cover its collection costs, is not relevant to an analysis of the Australian tariff system, in which all goods are subject to a tariff of five per cent or 'Free'. That said, tariffs still raise questions regarding their role in raising revenue, protecting industry, and their costs to businesses and the broader economy. For this reason, this report investigates the *nuisance costs of the tariff system* as a whole.

This chapter considers the overall impact of tariffs, including the fiscal implications that are investigated in chapter 3 and the economic implications investigated in chapter 4 (section 5.1). It considers how these costs shape the role of tariffs in the economy — for instance, their cost-efficiency as a source of public revenue — and the implications of these findings for further research (section 5.2).

5.1 What do Australia's tariffs cost?

This study uses a simple framework to identify and account for how tariffs contribute to increasing the costs of imports to Australians. Although the framework identifies many possible costs, some are difficult to estimate, and our estimates are likely to be conservative. The key costs summarised in table 5.1 are reported in terms of aggregate costs and costs per dollar of tariff revenue raised.

- Tariffs themselves add to the costs of imports that Australian businesses, and eventually consumers bear, by around \$1.5 billion. Modelling for this project indicates that tariffs increase consumer prices by 0.12 per cent (see box 4.5).
- The costs to government departments of administering the tariff system are estimated to be between \$11 million and \$20 million. These costs consist largely of staffing costs associated with administering the system – including collecting tariffs, ensuring compliance with PTAs, administering the tariff concession system, providing tariff advice, maintaining the tariff system, resolving disputes and legal costs.
- Costs to businesses of interacting with the tariff system are estimated at \$0.7-2.2 billion.
- With relatively small rates affecting a small number of imports, economic distortions are difficult to estimate, but are likely small (chapter 4). Commission estimates for this report found that distortions from current tariffs reduce gross national product by a relatively small amount — \$150 million in 2019-2020.

Table 5.1 indicates that tariff revenues greatly outweigh the estimated costs to government of administering and collecting tariffs. However, when compliance costs are accounted for, the costs associated with the tariff system can exceed the revenue collected.¹ The costs associated with tariffs will considerably exceed the revenue collected as new PTAs are agreed. The relatively wide range of estimated compliance costs implies a lot of uncertainty around the estimates but shows that they could be high. Similarly, the estimates per dollar collected could be high, especially relative to other possible sources of tax revenue.

¹ It is worth remembering that from a fiscal point of view, the administrative costs to government of collecting a tax should be significantly smaller than the revenue it collects. Similarly, from an economic point of view, the costs associated with the tariff (especially the compliance costs) should be much smaller than the revenue collected, unless the tariff produces other benefits that can justify the costs.

Table 5.1 – Key costs arising from Australia’s tariffs

	Aggregate costs (\$)	Costs per dollar of tariff collected (\$)	Source
Tariff revenue	1.5 billion	–	Chapter 3
Administrative costs	11-20 million	Less than 0.02	Chapter 3
Business compliance costs	0.7-2.2 billion	0.49-1.45	Chapter 4, appendix C
Cost of distortions	150 million	0.10	Chapter 4
Total	0.9-2.4 billion	0.59-1.57	

Source: Productivity Commission estimates.

Costs not estimated — the value of tariffs in trade negotiations

Some indirect costs and benefits of tariffs have not been estimated in this report. For instance, tariffs can play a role in the negotiation of future PTAs (box 4.2), providing leverage for negotiators to obtain market access for Australian exporters of goods and services. According to this argument, the existence of tariffs provides negotiators with leverage that they can use to obtain concessions when negotiating terms to an agreement.

Following this logic, the existence of tariffs can benefit Australian *exporters* into the future by enabling negotiators to obtain better market access than would be the case if they did not have tariff reductions to offer. That said, while it might be possible to estimate the value of increased market access for Australian exporters, it would be difficult to determine the contribution that tariffs, used as leverage, might make to the negotiation. The contribution of tariffs to negotiations will decrease as the focus of new PTAs shifts towards behind the border issues. In addition, there are other sources of leverage, for instance, domestic economic reforms:

Australia’s ability to pursue the reduction of barriers to our exports has been heightened when Australia has itself pursued an ambitious economic reform agenda domestically. This is for two reasons. First, such reform enables the economy to be more competitive and thereby enables economic actors to be able to compete in global markets. Second, it provides a valuable demonstration effect. Domestic reforms give Australia credibility in trade negotiations. Agreeing to bind such reforms provides useful negotiating coin (DFAT 2010, p. 3).

The Commission has previously found that most gains from trade liberalisation are likely to arise from domestic liberalisation, and as such, domestic reforms should be pursued regardless of marginal effects on trade negotiations (PC 2001, p. 5). The value of tariffs as a bargaining chip has been questioned, given the small size of the Australian market as a share of global trade and the low rates of Australian tariffs (PC 2010, pp. 214–216).

The gains from unilateral liberalisation are increasingly likely to outweigh the value of tariffs as leverage in negotiations as additional PTAs are agreed. That said, the Commission has argued that, before negotiating international trade agreements, the Australian Government should undertake thorough pre-negotiation analysis to ‘provide a preliminary assessment of the expected costs and benefits ... under different scenarios’, including an assessment of the opportunity cost of ‘holding back domestic reform to maintain negotiating coin’ (PC 2020, pp. 11–12).

How might costs change?

There has been no indication to date that Australia’s statutory rates will rise over time, and no evidence to suggest that such a move would be warranted. Indeed, previous investigations by the Commission (2017b)

suggest that a return to greater protectionism would be costly. Rather, Australia is set to continue to reduce average tariffs via the implementation of new PTAs. As such, tariffs are likely to continue to have relatively low levels of influence in the economy, with small costs from limited economy-wide distortion.

Some Australian Government initiatives have reduced the compliance costs related to the administrative interaction between businesses and the tariff system. For instance, the implementation of programs such as the Australian Trusted Trader has reduced business compliance costs on 19 per cent of imports (Department of Home Affairs 2021, p. 27). Marginal reductions to compliance costs could be achieved by improving administrative interfaces — at the time of writing, work is being undertaken to simplify the interface between businesses and the tariff system. If this were to greatly reduce the time and other resources required to access, for example, tariff concession orders, this could reduce compliance costs for businesses, though the effects would be small relative to the effects of removing tariffs comprehensively.

Effect of new PTAs on administration and compliance costs

At the same time, the implementation of new PTAs is likely to increase costs and decrease revenues. Revenues would decrease by the amount of tariff foregone; business costs would decline by the same amount, but they would incur new additional costs when accessing the preferences.

The implementation of PTAs with the UK (signed on 17 December 2021), with India (interim agreement signed on 2 April 2022) and with the EU, will reduce the amount of revenue collected through tariffs. We project that tariff revenues will fall by \$106–134 million once the PTA with the UK is implemented, by a further \$61–68 million once the PTA with India is implemented and by a further \$709–779 million once the PTA with the EU is signed and implemented.² The new PTAs will likely increase the total amount of preferences by about 20 per cent. Once these agreements are in force, the remaining tariff revenue is projected to be between \$579 million and \$664 million. As these revenues decrease the costs of the system per dollar collected increase.

New PTAs are likely to add complexity, increasing the costs of administering the system. We estimate administration costs would rise by \$1–1.15 million.³ This would increase the processing costs of administering PTAs to about \$6 million and the total administrative burden of the tariff system to between \$12 million and \$21 million — \$0.018–0.037 per dollar of tariff revenue collected.

Compliance costs will also be influenced by new PTAs, particularly with regard to their structure, complexity, and coverage. The implementation of new PTAs would likely lead to an increase in aggregate compliance costs, although this depends on the content of the agreements. For example, some compliance costs arise due to Rules of Origin (RoO); if RoO were to feature heavily in Australia's future PTAs, then more businesses would likely be subject to those compliance costs.⁴ On the other hand, making RoO less

² Foregone revenue was estimated by multiplying the value of imports from each partner country by the average utilisation rate. The range for the value of imports was calculated using the value of imports from each of 2017-18, 2018-19 and 2019-20. The average utilisation rate was calculated as the pooled utilisation of preferences across 2017-18, 2018-19 and 2019-20.

³ The costs from administering preferences under trade agreements are likely relate to the *number* of consignments that use the preference. We have used the value of preferences relative to the value of imports (rather than per consignment) as a proxy to estimate the increase in costs.

⁴ The analysis concentrates on the RoO that Australia enforces on exporters to Australia. RoO that increase the costs of could of Australian exporters are likely to remain as part of conditions enforced by Australia's trading partners, unless they considered removing them unilaterally.

stringent (or omitting them altogether) would significantly reduce PTA-related compliance costs. Increased complexity of the system increases costs too.

Both the compliance costs and revenue associated with tariffs will be significantly reshaped by the agreement and implementation of additional PTAs. In particular, the implementation of agreements with the UK, India and the EU would extend the coverage of preferences by 22–26 per cent, increasing the proportion of imports that arrive duty-free. It is likely that tariff-related compliance costs would grow by 22–26 per cent.⁵ This would result in aggregate compliance costs of \$1.39–4.77 per dollar of tariff revenue, and combined administration and compliance costs of \$1.41–4.81 per dollar of tariff revenue.⁶ Once proposed PTAs are enacted, compliance costs will exceed tariff revenue by between 41 and 381 per cent.

5.2 Costs and revenues, now and in future

As a result of Australia's low tariff rates and broad coverage of preferences, tariffs afford much lower levels of protection, return less revenue, and result in smaller distortions to the economy than they did in previous decades (chapters 3 and 4). Given their limited value in protecting domestic industries, it is worth considering the efficiency of Australia's tariffs as a revenue source relative to other taxes. In particular, when applied to imports that do not compete with domestic producers, taxes on imports can be a relatively efficient source of revenue — they are relatively easy to collect from an administrative point of view and result in small distortions economy-wide.

Are low-rate tariffs an efficient tax?

The efficiency of the tariff system as a source of revenue depends largely on the costs incurred to access preferences under PTAs (in addition to other, smaller, costs associated with the complexity and maintenance of the system). The costs that a tax impose are typically measured as 'excess burden', which is designed to measure the welfare costs that it imposes on the economy but omits administrative and compliance costs.

As a first approximation, a simple approach would be to focus solely on the compliance costs for accessing a preference — as this is the largest single source of costs — and comparing this to the amount of revenue collected. Businesses incur compliance costs of \$0.48–1.44 per dollar of revenue collected.⁷ As noted above, the ratio of compliance costs to revenue will likely rise with the implementation of each new PTA, as each PTA adds to the complexity of the system and its cost, while reducing the amount of revenue collected.

Comparable sources of revenue

It is beyond the scope of this report to explore potential reforms to the tax system, or to suggest which taxes would be the most efficient comparator for tariffs as alternate sources of revenue. The comparison with other taxes simply highlights how tariffs fare in terms of efficiency in raising revenue — or alternatively, how efficiently other taxes could raise an additional \$1.5 billion or 0.3 per cent of Australian Government revenue.

Personal income taxes are a useful comparator, in part because they involve significant administration costs (via the Australian Tax Office) and compliance costs (in terms of the preparation of individual tax returns). The revenue raised through personal income taxes (\$231 billion) dwarfs the \$1.5 billion collected through

⁵ Estimate based on the value of imports from the UK, India and the EU for each of 2017-18, 2018-19 and 2019-20 (2020-21 was excluded to avoid pandemic-related effects). Remaining tariff revenue will be between \$579 million and \$664 million.

⁶ Estimate excludes the costs imposed by distortions, which are not modelled into the future.

⁷ Estimate reflects only the compliance cost of accessing preferences under PTAs.

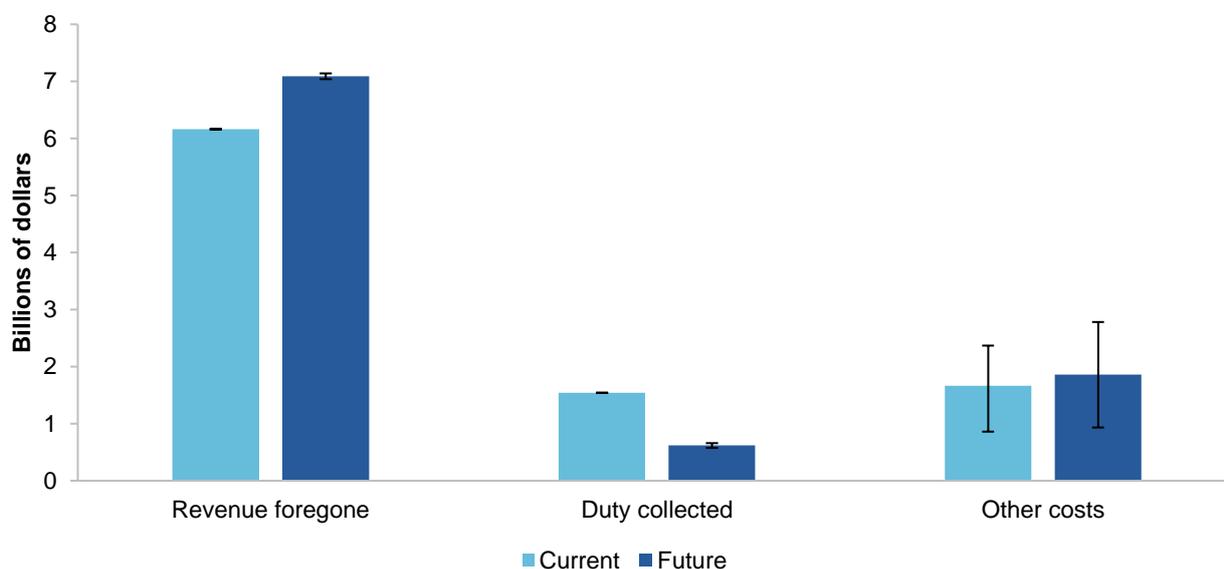
tariffs. As such, personal income taxes could recover an additional \$1.5 billion with relatively trivial changes to tax rates. Indeed, with the current tax schedule held constant, bracket creep will quickly raise this amount of extra revenue.

For personal income taxes, estimates for the marginal excess burden of taxation range between \$0.20 and \$0.30 per dollar of revenue raised, excluding administrative or compliance costs (Murphy 2016; Treasury 2015). The marginal increase in administrative and compliance costs associated with collecting additional income taxes would depend on implementation. For instance, if the additional revenue were to be collected solely through bracket creep, the additional administrative and compliance costs would be negligible. On conservative estimates, it is reasonable to consider that the marginal social cost of raising \$1.5 billion via personal income taxes would be less than \$0.35 per dollar of revenue raised.⁸⁹

By comparison, the entire import tariff system raised \$1.5 billion of revenue in 2018-19 with an estimated social cost of \$0.59–1.57 per dollar of revenue collected, once administrative and compliance costs are accounted for. By this accounting, Australia’s tariffs are likely more costly than some other sources of Australian Government revenue.

This comparison is likely to grow starker as trade agreements are implemented with the UK, India and EU (figure 5.1). Based on the revenue likely to be forgone as a result of these agreements, and excluding the future cost of distortions, the average social cost of tariffs would be \$1.41–4.81 per dollar of revenue raised.

Figure 5.1 – Revenue foregone and costs will rise and duty collected will fall once forthcoming PTAs are implemented^{a,b}



a. Future values are estimates following the implementation of trade agreements with UK, EU and India. **b.** Ranges: revenue foregone and duty collected – based on previous 3 years; other costs – 50 per cent above and below central estimate.

Source: Productivity Commission estimates based on ABS (International Trade in Goods and Services, Australia, Cat. no. 5368.0).

⁸ Social costs capture excess burdens, administrative costs and compliance costs (Slemrod and Yitzhaki 1995, p. 173).

⁹ The Australian Tax Office’s operating budget is \$3.8 billion — \$0.016 per dollar of personal income tax revenue collected and Australians claimed \$2.3 billion in deductions relating to the cost of managing tax affairs — \$0.01 per dollar of revenue collected. Given neither administrative costs nor compliance costs are likely to change greatly due to bracket creep, a marginal social cost of \$0.35 per dollar is viewed as conservative.

Implications and future research

This report argues that Australia's tariff system does not produce large distortions to production and consumption but does entail high (and increasing) compliance costs for businesses, which add to the costs of goods and services. Low statutory tariff rates and a range of preferences have reduced the protective effects of the tariff system. The progressive and wide-spread reductions in effective tariff rates have largely come with preferences. Both PTAs and concessional instruments give rise to the benefits of lower tariff rates, but at the same time, the additional complexity for the tariff system increases administration and compliance costs.

In some areas, further research would be valuable to address costs and benefits that were beyond the scope of this report. For instance, the value of tariffs in trade negotiations could be investigated further, particularly in relation to their potential to influence market access for Australian exporters. It would be useful to understand in more detail the value of tariffs as leverage in the various phases of trade agreements, particularly compared to its cost to importers and other parts of the economy. A reliable approach would need to be developed to estimate the influence of tariffs in negotiations in order to compare this with the costs of incurring the costs associated with the tariff system as a whole.

This report has developed a clear framework to analyse the costs of the tariff system, but lack of data in some areas have made it difficult to produce reliable estimates of some of the costs. Where more data become available, further research would be useful in better estimating the true costs of compliance. This might include updated and expanded surveys of service fees charged by customs brokers when dealing with different parts of the tariff system. It could also include further exploring the relationship between PTA utilisation and costs to businesses.

There would also be value in developing more detailed analysis as more information about Australia's future PTAs becomes available. This would be useful in ensuring an up-to-date understanding of the costs and benefits of tariffs in an environment when almost all of Australia's trade is covered by PTAs. Notwithstanding the scope for reviews of PTAs, based in part on international developments (for example, new multi-lateral agreements or geopolitical events such as 'Brexit'), Australia's PTAs are likely to cover the vast majority of its trade, making it more difficult to justify the existence of the tariff system.

This report has not touched on the implications for policy, nor any opportunities for reform. Further evaluation could be undertaken of tariff policy in the context of Australia's trade and border policies, tax policy, and industry assistance.

Appendices

A. Consultation

The Commission received four submissions from industry groups, service operators and individuals (table A.1). The Commission also engaged with officials from the Australian Government departments and agencies (table A.2). The Commission thanks everyone who participated in this review, by providing evidence and arguments that strengthened the quality of the report.

Table A.1 – Submissions

Participant	Submission no.
Australian Chamber of Commerce and Industry	1
Freight and Trade Alliance	2
IFCBAA and Andrew Hudson	3
Thorburn, Peter	4

Table A.2 – Government agencies consulted

Participants
Australian Border Force
Department of Foreign Affairs and Trade
Department of Industry, Science, Energy and Resources
Department of Prime Minister and Cabinet
Department of the Treasury
Simplified Trade System Implementation Taskforce

B. Estimating administration costs

Where costs could not be obtained or details at the level required (that is, costs attributable to the tariff exclusively) were unavailable, we estimated costs using reports or estimates of full-time equivalents and other costs. Where reported historical costs were used, they were scaled using changes in import volumes.

Tariff advice

ABF provided almost 2000 tariff classification advices to importers and a further 212 valuation and rules of origin advices in 2020-21. Staffing for the National Trade Advice Centre is 15 FTE, comprising of five APS5 staff, nine APS6 staff and one EL1 staff. ABF reported that the operating cost was approximately \$1.3 million (ABF, pers. comm., 15 December 2021). The Commission estimated that this likely to have only included wage expenses. Consequently, superannuation expenses of 15.4 per cent and overheads of \$15 000 per employee were added, leading to an estimated total cost of \$1.7 million. Superannuation and overhead expenses have also been added to other estimates of administration costs.

ABF also administers duty drawbacks, with staffing of 6.08 FTE and wage expenses of about \$670 000 (ABF, pers. comm., 15 December 2021). Once superannuation and overhead expenses are added, the total administration cost is about \$860 000.

Staffing for the Tariff Concession System is 9.4 FTE with wage expenses of \$1.25 million (ABF, pers. comm., 15 December 2021). Once superannuation and overhead expenses are added, the total administration cost, which also covers the Cheese and Curd Quota, is \$1.6 million.

Reviews

ABF also conducts internal reviews of its management of the tariff system. Staffing for reviews is 6.5 FTE with annual wage expenses of about \$500 000 (ABF, pers. comm., 15 December 2021). Once superannuation and overhead expenses are added, the total administration cost is about \$670 000.

Tradex

The Tradex Scheme is administered by Department of Industry, Science, Energy and Resources. Staffing for the Tradex Scheme is about five, with an estimated cost of about \$730 000 (DISER, pers. comm., 16 December 2021). Once superannuation and overhead expenses are added, the total administration cost is about \$910 000.

Refunds

The NRI team manages risk relating to refunds. Staffing for the NRI is 8.5 FTE (ABF, pers. comm., 15 December 2021). Using the average of the per person costs of each of the National Trade Advice Centre and the Tariff Concession System, it is estimated that the budget for the NRI is about \$1.15 million.

About 7.5 per cent of the revenue collected by ABF is tariff revenue. Assuming the budget for the NRI is proportional to the revenue collected by ABF, the administration cost that would be avoided if all statutory tariffs were 'Free' is about \$85 000.

Preferential trade agreements

In 2008-09, Customs reported that they spent \$1 million ensuring compliance with PTAs. Australia enacted its fifth PTA in 2008-09 (with Chile) and has now enacted 16 PTAs, with further PTAs with the UK, India and the EU to come.

Between \$58 billion and \$59 billion imports entered Australia from PTA partner countries in 2008-09. That number has since grown to about \$215 billion — growth of between 266 per cent and 271 per cent. Over the same period, the public sector wage price index has grown by 36.9 per cent and the import price index has grown by 3.9 per cent.

Assuming the cost of ensuring compliance is proportional to the value of imports from trading partner nations, and accounting for changes in the public sector and import price indexes, the current estimated cost of ensuring compliance with PTA is about \$5 million.

Compliance activities

In 2013-14, Customs had a compliance budget of \$27 million, which covered a range of compliance activities, only some of which related to tariff classifications and concessions (ANAO 2015). Using the public sector wage price index, it is estimated that the current compliance budget is about \$31.7 million. The Commission has estimated the likely administration cost that would be avoided if all statutory tariff rates were 'Free' using a few methods based on; revenue collected by ABF, understated revenue identified by compliance activities and the frequency of different errors on import declarations.

ABF collected \$20.8 billion in revenue in 2019-20, of which, \$1.54 billion was tariff revenue (Department of Home Affairs 2021). Assuming the budget for compliance activities is proportional to revenue collected, the cost that would be avoided if statutory tariff rates were 'Free' is \$2.3 million.

Customs duty made up three per cent of understated revenue identified by ABF in 2019-20 and 13 per cent in 2020-21. Assuming the budget for compliance activities is proportional to understated revenue identified, the cost that would be avoided if all statutory tariffs were 'Free' is between \$1 million and \$4.1 million.

Tariff classification and tariff concession errors made up 25 per cent of errors on import declarations in 2019-20 and 21 per cent of errors in 2020-21. Assuming the budget for compliance activities is proportional to errors made on import declarations, the cost that would be avoided if statutory tariff rates were 'Free' is between \$6.6 million and \$8 million.

Judicial costs

In 2013, the average legal cost incurred by Comcare on Safety, Rehabilitation and Compensation Act 1988 (Cth) matters in the AAT was \$55 205 — \$64 500 in 2021 prices (PC 2014, p. 118). The AAT is the tribunal that hears disputes about tariff classifications and concessional instruments. Between 2015 and 2021, the Comptroller General of Customs was involved in, on average, 1.7 cases that related to tariff policy and were heard by the AAT. Using the cost incurred by Comcare as a proxy, the expected annual legal cost incurred by Customs was \$111 000. Occasionally, cases may be appealed to the Federal Court or the High Court. These cases likely incur much larger legal costs, but due to their infrequency, have not been estimated in this report.

Forthcoming preferential trade agreements

To estimate the additional administration burden associated with forthcoming PTAs it was assumed that costs were proportional to the value of imports that made use of a PTA. The value of imports using a PTA is projected to increase by 22–26 per cent and hence PTA-related administration costs are projected to increase by \$1–1.15 million. The additional compliance costs incurred as a result of forthcoming PTAs were estimated in the same way as existing compliance costs (appendix C).

C. Estimating preferential trade agreement-related compliance costs

Chapter 4 references the Commission's estimate that PTA-related compliance costs ranged between \$0.7–2.2 billion in 2019-20. This appendix explains the methodology (section C.1), the results (section C.2), and compares the results to estimates of the compliance costs associated with other PTAs to demonstrate their credibility (section C.3).

C.1 Approach

Our approach was to infer PTA-related compliance costs by examining the tariff savings necessary to induce businesses to utilise PTAs. The underpinning logic is as follows.

- If a business used an available PTA, the associated compliance cost was assumed to have been less than or equal to the associated tariff reduction (assumption 1).¹
- If a business did not use an available PTA, the associated compliance cost was assumed to have been greater than or equal to the associated potential tariff reduction (assumption 2).

The same logic underpins most other studies of PTA-related compliance costs (section C.3).

Data

Our estimates are based on annual data on imports into Australia from 2017-18 to 2020-21, reported at the 10-digit tariff code level and disaggregated by the following variables:

- The country from which the goods were imported.
- Whether an available PTA was used.²
- Whether a concession was used.
- The applied tariff rate (the preferential rate if a PTA was used, the concessional rate if a concession was used, or the statutory rate if neither a PTA nor concession was used).

¹ The PTA was deemed to have still been 'available' if the imported goods did not meet the rules of origin requirements of the PTA, as the additional costs of producing goods in a way that met the rules of origin requirements (i.e., onshoring a greater share of production) are a component of PTA-related compliance costs (chapter 4).

² For some trading partners, such as the United States, only one PTA was available (AUSFTA in this case). For other countries, such as New Zealand, multiple PTAs were available (ANZCERTA, AANZFTA, PACER Plus, and TPP-11 in this case). Future research might estimate different utilisation and compliance costs by agreement. This report chose not to do that because it would require making additional assumptions for countries with multiple PTAs available.

For each of the cases where a PTA or concession was used, we imputed the statutory tariff rate by taking the maximum of the average applied tariff rate paid on imports from France, Germany, Italy, and the United Kingdom for the 10-digit tariff code in question and the year in question. These were Australia's largest trading partners with which there were normalised trading relations and no PTAs in place.

Method

Using this data, we derived two key parameters for each combination of country (only those with which Australia had a PTA), year and 10-digit tariff code.³

- The preference margin; the difference between the statutory rate and the preferential rate. This is the benefit (tariff reduction) associated with the PTA in question expressed as a share of import value.⁴
- The utilisation rate; the share of imports (by value) for which the PTA was utilised, where doing so would lead to a tariff reduction.⁵

We then computed the utilisation rate associated with each 0.025 percentage point preference margin range (that is, the average utilisation rate of all country–year–code combinations that fall into that preference margin range, weighted by the import value).⁶

The results are shown in figure C.1. Panel a shows the relationship between preference margins and utilisation rates, with each dot representing the utilisation rate associated with the corresponding 0.025 percentage point preference margin. This shows a positive relationship — the utilisation rate was typically low for goods facing a low preference margin and high for goods facing a high preference margin. Panel b shows the distribution of preference margins weighted by the value of the imports that met each preference margin. Most preference margins were either five per cent or zero per cent, which reflects that statutory rates were mostly either five per cent or 'Free' (chapter 2), and that preferential rates were mostly 'Free'.

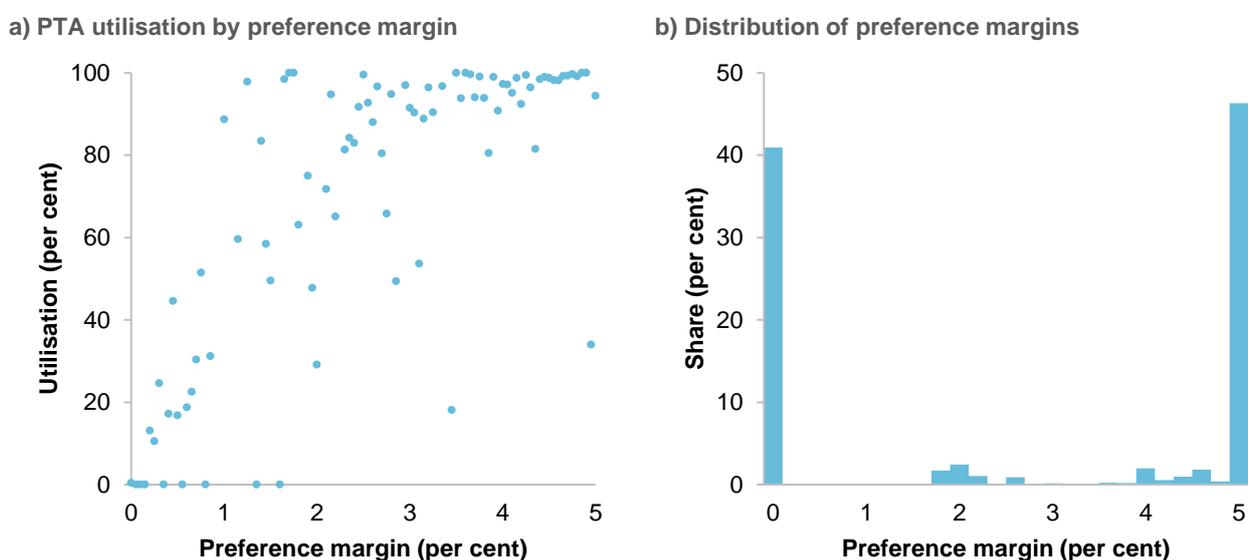
³ We disregarded data from the year in which the relevant PTA came into effect, as the PTA may not have been available for the full year.

⁴ In cases where there were multiple preference margins associated with a given country, year and 10-digit tariff code (because there were multiple PTAs available with differing tariff preference margins), the tariff preference margin was taken to be the maximum tariff preference margin. The implications of this are discussed in the 'Method' subsection below.

⁵ Accordingly, we disregarded cases where a concession was used or where the tariff preference margin was zero.

⁶ There were about 1.77 million combinations for the period 2017-18 to 2020-21. About half of them fell into the interval 4.975 per cent to 5 per cent.

Figure C.1 – Observed preference margins and utilisation rates
Shares based on value of imports



Source: Productivity Commission estimates based on ABS (*International Trade in Goods and Services, Australia*, Cat. no. 5368.0).

We then made four assumptions further to assumptions 1 and 2:

- We assumed that PTA-related compliance costs were proportional to the value of the imports from which they were derived (assumption 3). This assumption is made in nearly all studies of PTA-related compliance costs (section C.3).⁷
- We assumed that businesses only incurred compliance costs if they accessed the preference, and that they knew these costs in advance (assumption 4). Hereafter, 'ex ante costs' refers to the costs that the business knew it would incur if they used the PTA, and 'ex-post costs' refers to the costs that they actually incurred because they accessed the preference. By assumption 4, if the business used the PTA, its ex-ante and ex-post PTA-related compliance costs would be the same. If it did not use the PTA, then ex-post PTA-related compliance costs would be zero.
- We assumed no association between ex ante costs as a share of PTA-eligible imports and tariff preference margins (assumption 5). This assumption means that the underlying distribution of ex ante costs was invariant to the preference margin.
- We assumed that there were infinitely many eligible imports (assumption 6). This assumption is of little practical consequence, but it allows the method to be described more simply than otherwise.

Assumptions 1–6 imply that the process that generated the relationship between preference margins and utilisation rates is analogous to the following process:

1. Businesses decided to import PTA-eligible goods into Australia, irrespective of PTA-related compliance costs.

⁷ Expressing the cost as a percentage of the value of imports makes it comparable to the tariff rate and any other barriers expressed as ad valorem equivalents.

2. Each business took a random draw from a common distribution of ex ante compliance costs as a share of imports to determine the compliance cost it would face if it were to use any available PTA.⁸
3. Businesses whose ex-ante compliance costs exceeded the tariff saving on offer opted not to use a PTA and incurred no compliance costs (ex post compliance cost of zero). Businesses whose ex-ante compliance cost did not exceed the largest tariff saving offered by a PTA opted to use that PTA and thus incurred the compliance cost (such that their ex-post compliance cost became equal to the ex-ante compliance cost that they drew in step 2).

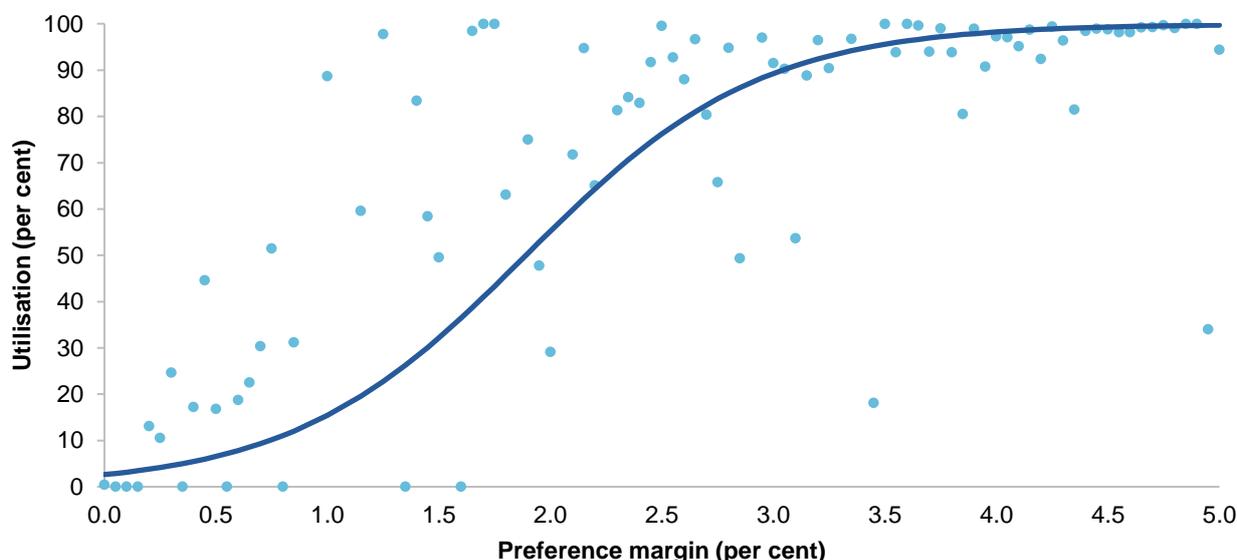
This process suggests that the relationship between preference margins and utilisation rates ought to be non-decreasing, which is consistent with figure C.1 panel a (aside from random disturbances). Moreover, the relationship between preference margins and utilisation rates appears reasonably approximated by a logistic function:⁹

$$u_p = \frac{1}{1 + e^{-\frac{p-\mu}{s} + \varepsilon_p}}$$

Where u_p is the utilisation rate associated with preference margin p , ε_p is the corresponding random disturbance, $e = 2.72 \dots$ is Euler's number and s and μ are parameters to be estimated.

Ordinary least squares estimation yields the logistic function shown in figure C.2, with $\hat{s} = 0.0052324$ and $\hat{\mu} = 0.0189011$. The dots in figure C.2 are the same as those shown in figure C.1, panel a.

Figure C.2 – Modelled relationship between preference margins and utilisation rates^a



a. The markers represent the average utilisation rate associated with each 0.025 per cent preference margin range.

Source: Productivity Commission estimates based on ABS (*International Trade in Goods and Services, Australia*, Cat. no. 5368.0).

⁸ The decision to take the preference margin to be the maximum available preference margin in cases where there were multiple PTAs available (see subsection 'Data' above) is consistent with this process (which implicitly assumes that, when a particular type of good, from a particular country, in a particular year is eligible for multiple PTAs, the compliance costs associated with using each PTA are equal).

⁹ We also tested a linear specification, but the logistic specification was found to fit the data better, as measured by the mean squared error (with the error terms converted to the same units for comparability between specifications).

The cumulative distribution function of the implied underlying distribution of ex ante compliance costs as a share of PTA-eligible imports is then this same equation, with u_p equal to the cumulative density function $F(c)$, and p equal to c , ex ante compliance costs as a share of PTA-eligible imports.

We then used this cost distribution to calculate PTA-related compliance costs.

Average ex ante costs as a share of PTA-eligible imports are equal to the mean of this distribution above zero, $\int_0^\infty f(c)c dc / (1 - F(0))$, where $f(c)$ is the probability density function of c (the derivative of $F(c)$ with respect to c).¹⁰ Average ex ante costs are useful for benchmarking against other studies of PTA-related compliance costs (which focus on ex ante costs). Given the assumed logistic form of $F(c)$, average ex ante compliance costs as a share of PTA-eligible import values are given by:

$$\frac{\hat{\mu} + \hat{s} \ln\left(1 + e^{-\frac{\hat{\mu}}{\hat{s}}}\right)}{1 - \frac{1}{1 + e^{\frac{\hat{\mu}}{\hat{s}}}}}$$

In the context of this study, the relevant statistic is average ex post costs as a share of PTA-utilising imports, that is, the compliance costs that businesses actually incurred when they chose to use the preference. This is computed as the average over all prevailing tariff preference margins of the mean of the cost distribution between zero per cent and the tariff preference margin, weighted by the share of PTA-utilising imports associated with each tariff preference margin:

$$\sum_p w_p \frac{\int_0^p F(c)c dc}{F(p) - F(0)}$$

Where w_p is the share of PTA-utilising imports associated with tariff preference margin p , such that $\sum_p w_p = 1$. Given the assumed logistic form of $F(c)$, average ex post compliance costs as a share of PTA-utilising imports are given by:

$$\sum_p w_p \left[\frac{\frac{p}{1 + e^{-\frac{p-\hat{\mu}}{\hat{s}}}} - \hat{s} \ln\left(1 + e^{\frac{p-\hat{\mu}}{\hat{s}}}\right) + \hat{s} \ln\left(1 + e^{-\frac{\hat{\mu}}{\hat{s}}}\right)}{\frac{1}{1 + e^{-\frac{p-\hat{\mu}}{\hat{s}}}} - \frac{1}{1 + e^{\frac{\hat{\mu}}{\hat{s}}}}}} \right]$$

C.2 Results

We estimated the average ex ante compliance costs over the period 2017-18 to 2020-21 to be 2.0 per cent of PTA-eligible imports. We also estimated these costs separately for each year as robustness checks, which yielded similar results (which suggests that our results are robust); 1.7 per cent in 2017-18, 2.6 per cent in 2018-19, 1.4 per cent in 2019-20, 2.2 per cent in 2020-21. Moreover, there is no upward or downward trend in these results over time, which suggests that using the entire period 2017-18 to 2020-21 smooths out any possible year-on-year fluctuations without generating results less relevant to the present.

We estimated average ex post (actually incurred) compliance costs over the period 2017-18 to 2020-21 to be 1.9 per cent of PTA-utilising imports. As robustness checks, we also estimated these costs separately for each combination of the year(s) from which the underlying ex ante compliance cost distribution was estimated (which determines $\hat{\mu}$ and \hat{s}), and the year(s) from which the share of PTA-utilising imports

¹⁰ Compliance costs estimated as negative — because the support of the logistic distribution is $(-\infty, \infty)$ — are disregarded, as compliance costs cannot be negative.

associated with each tariff preference margin was taken (which determines p and w_p) (table C.1). These checks each produced similar results, which again suggests that our results are robust.

Table C.1 – Ex post compliance costs as a share of PTA-utilising imports — robustness checks

		Year(s) from which share of PTA-utilising imports associated with each tariff preference margin was taken				
		All years	2017-18	2018-19	2019-20	2020-21
Year(s) from which ex ante compliance cost distribution was estimated	All years	2.1	2.1	2.1	2.1	2.1
	2017-18	1.8	1.8	1.8	1.8	1.8
	2018-19	2.0	2.0	2.0	2.0	2.0
	2019-20	2.4	2.4	2.4	2.4	2.4
	2020-21	2.2	2.2	2.2	2.2	2.2

Source: Productivity Commission estimates based on ABS (*International Trade in Goods and Services, Australia*, Cat. no. 5368.0).

In 2019-20, this amounted to total PTA-related compliance costs of about \$1.5 billion (coincidentally, similar to the amount of tariff revenue collected in that year).

That said, this estimate is contingent on assumptions 1–6. To avoid false precision, this report instead uses a range estimate of \$0.7–2.2 billion, a 50–150 per cent range around \$1.5 billion.

C.3 Benchmarking

The estimates required for this study are those for costs actually incurred from accessing preferences (that is, ex post costs), whereas previous studies of other PTAs have focussed on ex-ante costs. To give an indication of the credibility of our ex-post cost estimates, we have benchmarked our ex-ante cost estimates against those of other studies.

Other studies have mostly estimated ex ante compliance costs to be larger than that found by this study (which has found ex ante compliance costs to be 2.0 per cent of PTA-eligible imports).

Among those other studies, estimates of average ex ante compliance costs ranged from two per cent of PTA-eligible import values for the ASEAN FTA, to three per cent for all PTAs in force over 2000–2006, to around four to eight per cent for the NAFTA and the PANEURO agreements (table C.2).¹¹

These estimates align with the restrictiveness of the rules of origin of each PTA. In general, more restrictive rules of origin are associated with higher compliance costs (Carrère and de Melo 2015). Of the PTAs shown in table C.2, NAFTA was the most restrictive (ranked 9th among the 75 PTAs reviewed Estevadeordal, Harris and Suominen (2009, p. 26)), followed by the PANEURO agreements (35th), and then the ASEAN PTA (50th).

This same study suggests that the Australian PTAs implemented pre-2009 are relatively restrictive. Of the 75 PTAs included in their study, Estevadeordal, Harris and Suominen (2009, p. 26) ranked TAFTA the 12th most restrictive, AUSFTA the 13th most restrictive, SAFTA the 20th and ANZCERTA the 23rd. On this basis, it might

¹¹ Some studies attempted to divide these costs into administration-related and production-related components (as described in chapter 4), although the methods by which they did so are much less robust than the methods by which they derived total average ex ante compliance costs. That said, table C.2 shows that in several studies, the costs related to adjusting production to qualify for a preference were larger than other costs that businesses incurred (for ‘paperwork’).

be expected that the ex-ante compliance costs associated with those PTAs would be similar to those of PANEURO and NAFTA; around four to eight per cent of PTA-eligible imports.

That said, the ex-ante compliance costs associated with more recent PTAs may be somewhat lower. While the restrictiveness of more recent PTAs has not, to our knowledge, been assessed in a comparable way. The Department of Foreign Affairs and Trade informed the Commission that more recent PTAs were less restrictive than older PTAs (DFAT, pers. comm. 21 February 2022).

Moreover, ex ante compliance costs may have fallen since the studies detailed in table C.2 were conducted, as administrative processes have been streamlined (DFAT, pers. comm., 21 February 2022).

In summary, although the estimated ex ante costs in this study are lower than most of the estimates in previous studies, there are good reasons to believe that the lower estimates obtained from more recent data are consistent with the higher estimates reported in previous studies using older trade patterns, mainly due to lower costs of accessing preferences in more recent data, as suggested by the Department of Foreign Affairs and Trade.

Table C.2 – Studies of average ex ante PTA-related compliance costs^{a,b,c,d}

Study	Free trade agreement and/or countries	Production-related average compliance cost estimate	Administration-related average compliance cost estimate	Total average compliance cost estimate
		% of value of imports ^c	% of value of imports ^c	% of value of imports ^c
Francois, Hoekman and Manchin (2006, p. 13)	PANEURO agreements ^a ; African, Caribbean and Pacific exports to the European Union	-	-	4–4.5
Cadot et al. (2006, p. 217)	PANEURO agreements ^a ; African, Caribbean and Pacific exports to the European Union; 2002	1.2	6.8	8.0
Cadot et al. (2006, p. 217)	NAFTA ^b ; Mexican exports to the United States; 2000	4.9	1.9	6.8
Anson et al. (2005, p. 511)	NAFTA ^b ; Mexican exports to the United States; 2000	4.30	1.83	6.13
Carrère and de Melo (2015, p. 197)	NAFTA ^b ; Mexican exports to the United States; 2000	4.30	1.81	6.11
Carrère and de Melo (2015, p. 197)	NAFTA ^b ; Mexican exports to the United States; 2001	4.44	1.72	6.16
Carrère and de Melo (2015, p. 289) ^d	NAFTA ^b ; Mexican exports to the United States; 2001; alternative methodology	3	-	-
Hayakawa (2011, p. 1)	All free trade agreements; 2001–2006	-	-	3.2
Cadot and Ing (2016, p. 30)	ASEAN PTA			2.1

a. 'PANEURO agreements' refers to the European Union's free trade agreements that have common rules of origin requirements. The countries in question accessed preferences under the Cotonou agreement. **b.** 'NAFTA' is the North American Free Trade Agreement. **c.** Value free on board. **d.** Carrère and de Melo (2015, p. 289) report production-related compliance costs separately for tariff lines with different utilisation rates. The statistic reported here is the average over all utilisation rates, weighted by the number of tariff lines to which that utilisation rate applies.

Abbreviations

AANZFTA	ASEAN-Australia-New Zealand Free Trade Area
AAT	Administrative Appeals Tribunal
ABF	Australian Border Force
ABS	Australian Bureau of Statistics
ANAO	Australian National Audit Office
ANZCERTA	Australia–New Zealand Closer Economic Relations Trade Agreement
ASEAN	Association of Southeast Asian Nations
AUSFTA	Australia-United States Free Trade Agreement
BEC	Broad Economic Categories
BRTA	Bilateral and Regional Trade Agreements
DFAT	Department of Foreign Affairs and Trade
DISER	Department of Industry, Science, Energy and Resources
EU	European Union
FTA	Free Trade Agreement
FTE	Full-time equivalent
GDP	Gross Domestic Product
GNA	Gross National Absorption
GNP	Gross National Product
GST	Goods and services tax
HR	Human resources
HTISC	Harmonized Tariff Item Statistical Code
ICT	Information and communications technology
IT	Information technology
KPMG	Klynveld Peat Marwick Goerdeler
NAFTA	North American Free Trade Agreement
NRI	National Refunds Intervention
OECD	Organisation for Economic Co-operation and Development
PANEURO	Pan-European
PC	Productivity Commission
PSR	Product Specific Rule
PTA	Preferential trade agreement

RoO	Rules of Origin
SAFTA	Singapore-Australia Free Trade Agreement
SNA	System of National Accounts
TCO	Tariff Concession Order
TCS	Tariff Concession System
UK	United Kingdom
WTO	World Trade Organization

Glossary

Term	Description
Administrative cost / administration cost	Costs incurred by the Australian Government collecting tariff revenue and managing the tariff system .
Average excess burden	The welfare cost per dollar of tax collected.
By-laws	Rules that allow concessional rates of duty of 'Free' for certain goods.
Capital goods	Physical assets that a company uses in the production process to manufacture products and services.
Certain Inputs to Manufacture	Program providing duty-free entry for certain inputs to production that are substantially and demonstrably superior in certain respects to comparable goods produced in Australia.
Certificate of Origin	International trade document that certifies that goods in a particular export shipment are wholly obtained, produced, manufactured or processed in a particular country.
Cheese and curd quota	Scheme that allows a quota of cheese and curd imports to access a concessional rate of duty.
CIF (Cost, Insurance, and Freight)	The CIF price is the price of a good delivered at the frontier of the importing country, including any insurance and freight charges incurred to that point, or the price of a service delivered to a resident, before the payment of any import duties or other taxes on imports or trade and transport margins within the country.
Compliance cost / compliance burden	Costs incurred by businesses interacting with the tariff system . For example, paperwork and delay costs.
Concession	A concessional rate of duty, usually 'Free', available for goods covered by certain concessional instruments .
Concessional instrument	See concession .
Consumption good	A final product ready for sale that is used by the consumer to satisfy current wants or needs.
Customs brokers	Third parties that deal with Customs for and on behalf of importers and exporters.
Customs duty	Duty payable when an import enters Australia. Customs duty includes tariffs and any applicable excise charges.
Distortion	Alterations to the allocation of resources caused by tariffs .
Duty Drawback	See Duty Drawback Scheme .
Duty Drawback Scheme	Scheme that provides exporters with a refund of customs duty paid on unused imported goods, or goods that will be treated, processed or incorporated into other goods for export.
Ex ante compliance costs	Compliance costs that would be incurred if all eligible importers utilised the PTA they were eligible for.

Term	Description
Ex post compliance costs	Actually incurred compliance costs .
Excess burden	The ratio between the change in welfare and the change in tax revenue that are associated with a change in tax.
Excise duty	Excise duty is a commodity-based tax. In Australia, excise duty is levied on alcohol, tobacco, fuel and petroleum products.
Exemptions	See concessions and preferences .
FOB (Free on Board)	The FOB price of exports and imports of goods is the market value of the goods at the point of uniform valuation (the customs frontier of the economy from which they are exported).
Full-time equivalents	A unit that indicates the workload of an employed person.
Tax incidence	The effect of a particular tax on the distribution of economic welfare.
Intermediate good	A product used to produce a final (or consumer) good.
Lumpsum tax	A tax of a fixed amount.
Management costs	Administration costs arising from licensing, oversight and ongoing improvement functions of government.
Marginal excess burden	The welfare costs associated with collecting an additional dollar of tax.
National Trade Advice Centre	A section within ABF responsible for providing assistance on issues relating to The Tariff , including the provision of Tariff Advices / Advance Rulings.
Nuisance tariff	Tariffs that raise little revenue for the Australian Government, have negligible benefits for Australian producers, but impose compliance burdens on businesses.
Preference	A preferential rate of customs duty available under a PTA .
Preference margin	The difference between the statutory rate and the preferential rate. This is the benefit (tariff reduction) associated with the PTA in question expressed as a share of import value.
PTA (Preferential Trade Agreements)	This is the term used in the WTO for trade preferences, such as lower or zero tariffs, which a member may offer to a trade partner unilaterally. These include the Generalized System of Preferences schemes, under which developed countries grant preferential tariffs to imports from developing countries. They also include non-reciprocal preferential schemes granted through a waiver by the General Council, meaning the member has been exempted from applying the most favoured nation principle.
Processing costs	Administration costs arising from the day to day running of the system.
Protection	Policies that protect domestic industries against foreign competition.
Quota	Import quotas are restrictions on the quantity and or value of imports of specific commodities for some given time period, which are administered globally, selectively or bilaterally.
Regulatory burden	Costs incurred by business in the course of complying with regulations, including their administrative, substantive, and delay costs, but excluding direct financial charges such as taxes, permits, and levies.

Term	Description
Rules of Origin	Rules establishing the minimum extent to which an import must have been produced in the partner country.
Schedule 3	List of tariff classifications and applicable rates of duty for all imported goods.
Schedule 4	List of concessional instruments covering various goods and user categories in respect of which concessional rates of import duty are payable.
Social cost	The total of administration and compliance costs , and the cost of distortions .
Space concession	Concession scheme allowing rates of duty of 'Free' for goods imported for use in a space project.
Substitutable goods	Australian-made goods that have a use corresponding to the use of the imported goods.
Statutory rate	Rate of duty listed in Schedule 3 .
Tariff	A tax imposed on imports.
Tariff classification	Also known as the Harmonised Commodity Description and Coding System, or the Harmonised System of Tariff Nomenclature is an internationally standardised system of names and numbers used to classify traded products.
Tariff concession orders	Concessional instrument that exists where there are no known Australian manufacturers of goods that are substitutable for imported goods.
Tariff concession system	Duty concession scheme intended to assist Australian industry and to reduce costs to the general community where the imposition of a tariff serves no industry assistant purpose. That is, where no local manufacturer produces substitutable goods .
Tariff quota	A tariff quota is a quantitative threshold (quota) on imports above which a higher tariff is applied. The lower tariff rate applies to imports within the quota.
Tariff revenue	Revenue raised by the Australian Government through the collection of tariffs .
Tariff system	Import processes that relate strictly to the existence of a positive statutory rate .
The Tariff	Customs Tariff Act 1995.
Temporary imports	Concession scheme allowing rates of duty of 'Free' for imports that remain in Australia for less than 12 months.
Tradex	See Tradex Scheme .
Tradex Scheme	Entitlement scheme administered by the DISER that provides upfront concession from paying customs duty and GST on imported goods if they are to be subsequently exported, either in the same condition, or processed or treated, or incorporated in another good.
Utilisation rate	The share of imports (by value) for which the PTA was utilised, where doing so would lead to a tariff reduction.

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