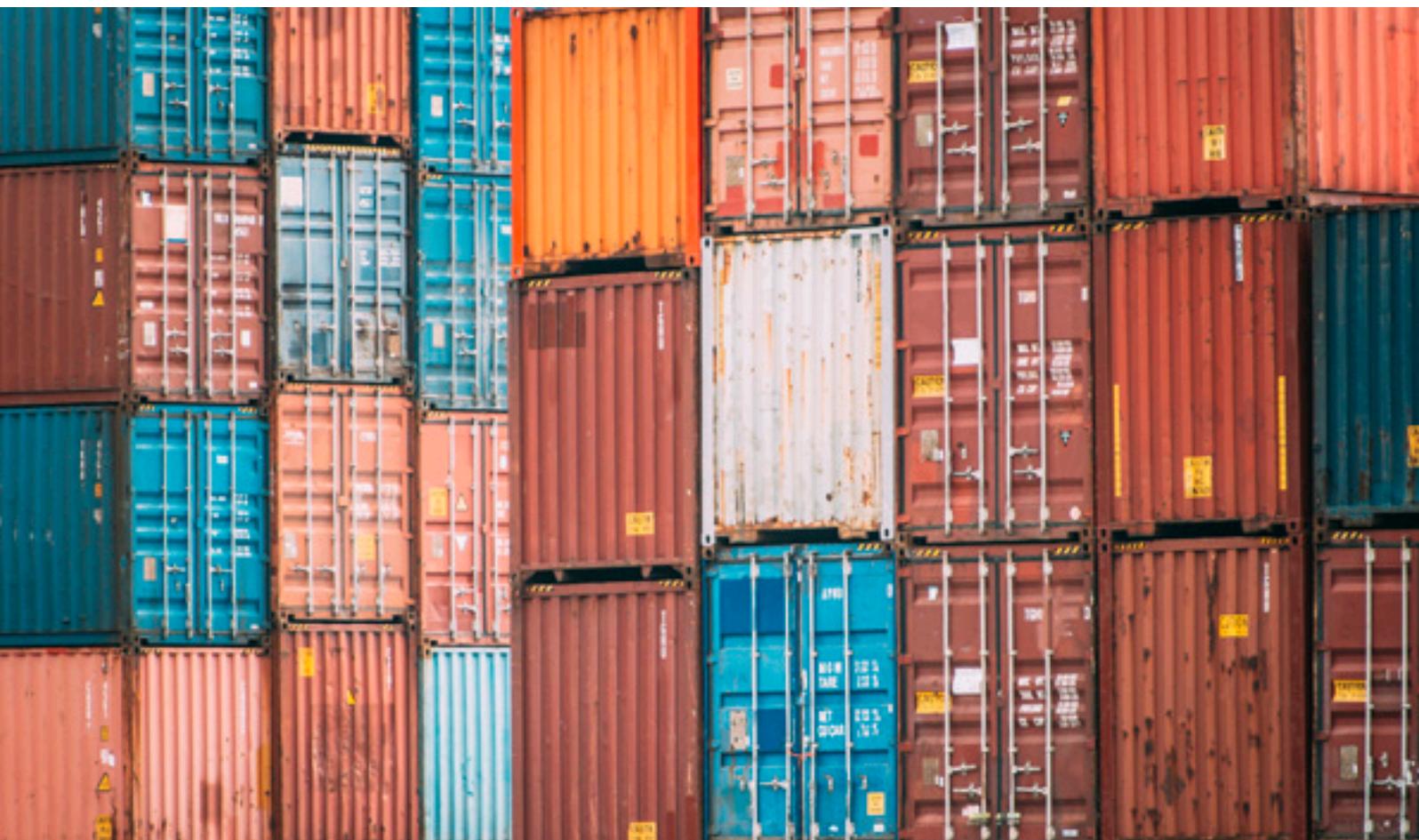




WORLD CUSTOMS ORGANIZATION



GUIDE TO MEASURE THE TIME REQUIRED FOR THE RELEASE OF GOODS

VERSION 3
2018



GUIDE
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FOR THE RELEASE OF GOODS

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2018



WORLD CUSTOMS ORGANIZATION

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**FOREWORD BY THE SECRETARY
GENERAL OF THE WORLD
CUSTOMS ORGANIZATION**



The World Customs Organization (WCO) believes that seamless international trade plays a pivotal role in countries' economic prosperity. One of its continued top priorities in the 21st Century is therefore to improve trade flows between countries in a bilateral, regional and multilateral context through enhanced border clearance processes. To this end, the WCO not only sets out global standards on Customs simplification and harmonization, but also provides operational tools to ensure secure and more rapid trade flows across borders.

In today's highly globalized trade world, traders are increasingly exploring avenues to move their goods expeditiously across borders at reduced cost. There is a renewed impetus for trade facilitation at the global, regional and national level, which is in part due to the growing emphasis on speedy and harmonized implementation of the World Trade Organization (WTO) Trade Facilitation Agreement (TFA). It is in this context that the WCO, as part of its strategic commitment to improve global trade, has updated one of the most internationally recognized tools to measure the efficiency and effectiveness of international trade flows: the Time Release Study (TRS).

The WCO first developed a TRS Guide over 20 years ago. The new version, the "Guide to Measure the Time Required for the Release of Goods (Version 3)", provides a globally accepted methodology to measure the actual time required for the release and/or clearance of goods, from the time of arrival until the physical release of cargo. The aim is to find bottlenecks in the trade flow process and take the corresponding policy and operational measures needed to improve the effectiveness and efficiency of border procedures, without compromising efficient trade control.

The updated Guide reflects the new dynamics in the international trade arena to better respond to emerging realities, and encourages an inclusive approach whereby Customs and other trade stakeholders carry out a TRS in partnership, and jointly identify and address gaps. The new version takes on board the evolution of technology in processing, managing and ensuring not only trade facilitation, but also global trade security, and advocates the use of clearance and release data from relevant IT systems for more efficient and accurate analysis.

It widely recognizes the importance of using periodic Time Release Studies for National Committees on Trade Facilitation (NCTFs) and other bodies to ensure sustainable monitoring and evaluation of the implementation of trade facilitation measures, so that this takes place in an effective and harmonious manner.

I encourage all WCO Members, as well as other stakeholders involved in trade facilitation, to make full use of the new TRS Guide in an innovative and collaborative way, and to continue sharing their experiences with the WCO for future development of the Guide and related tools.

Kunio Mikuriya,
Secretary General
World Customs
Organization
October 2018

EXECUTIVE SUMMARY

1. The Time Release Study (TRS) is increasingly being conducted by Customs administrations, in close cooperation with other stakeholders. Over the years, such Studies have targeted different border points, trade corridors and modes of transport (land, air and maritime), both to measure performance, and to improve it by developing appropriate policy/operational measures which follow the World Customs Organization (WCO) TRS methodology.
2. The rapid evolution of the international trade environment, the emergence of new procedures and technologies, and the ever-increasing pressure to reduce costs and times in the cross-border flow of goods, have made it imperative to keep the WCO TRS Guide up-to-date. It needs to reflect new developments and opportunities, with a view to constantly improving cross-border procedures. With this in mind, the WCO has updated the TRS Guide, based on the experience gained during TRS technical assistance missions, and the feedback received from Members and stakeholders.
3. The key elements of the updated TRS Guide (Version 3) include the following:
 - a. Detailed information on the use of TRS in the implementation, monitoring and evaluation of the TFA. The Guide sets out a concrete approach, including in the context of strategic planning to foster the implementation of TFA measures by National Committees on Trade Facilitation (NCTFs).
 - b. An explanation of the possibility of conducting, as a first step, a simplified TRS. The latter maps out only that part of the clearance process that directly relates to Customs, and suggests appropriate measures to quickly address shortcomings.
 - c. Illustrations of different approaches to conducting TRS (for example, a consecutive or simultaneous TRS at all identified border points).
 - d. Detailed information on the use of modern technologies in data collection, collation and analysis for improving the TRS process (e.g. electronic processing systems, Single Window, smartphones, RFID seals, and GPS-enabled track and trace). This approach endeavours to exploit the growing use of ICT by Customs, other government agencies and private sector stakeholders.
 - e. Guidance on business process planning, and on performance measurement of entry/exit points and related trade lanes, including the development of model business processes with associated flows.
 - f. A future-oriented approach to conducting a Joint TRS in a bilateral and multilateral context, and practical guidance on carrying out a TRS for performance management of regional trade corridors.

- g. An additional phase in the TRS methodology which encompasses “monitoring and evaluation” (Phase IV): countries conclude and evaluate one TRS cycle before preparing for the next, when adopting TRS as a strategic and periodic tool to enhance trade facilitation at national, regional and multilateral level.
 - h. Key principles and processes on conducting TRS in the context of international transit (especially its use in specific trade corridors for the movement/transit of consignments). There are also suggestions and examples for carrying out a Joint TRS at common border points involving neighbouring countries.
 - i. Members’ experience and best practice, which have been added to the Guide in order to provide practical perspectives, lessons learned and innovative solutions employed in carrying out TRS.
4. The Guide maintains the core methodology and recognizes Customs administrations as the lead agencies at borders to coordinate TRS projects. In close collaboration with other relevant government agencies and private sector stakeholders, Customs administrations can plan and design the Study, with a focus on identifying and addressing bottlenecks in the flow process of cargo. Such collaboration can be achieved through the establishment of working groups and regular coordination meetings.
 5. Once the scope of the Study has been agreed by all the stakeholders, and following a trial exercise, it is possible to begin collecting data on the start and completion times of the different clearance procedures. Data may be collected through the use of pre-designed questionnaires, or retrieved from information systems or smart devices. The Guide notes that IT systems involving time-stamped activities provide better data quality. The analysis of results to establish average physical release times is conducted when all the required data has been collected, verified and validated.
 6. The Study findings will form the basis of recommendations to address all the issues identified. All the results, findings and recommendations will ultimately be presented in a TRS Report for publishing. Given the national (and even international) impact of the Study, care must be taken to ensure its proper dissemination through the appropriate media channels and circulation to all stakeholders concerned. In addition to setting out average physical release times, the Report will identify areas where actions/procedures need to be improved, or policies adjusted, to address the bottlenecks identified. Finally, there should be a dedicated team responsible for the monitoring and follow-up of implementation of the Report’s recommendations.

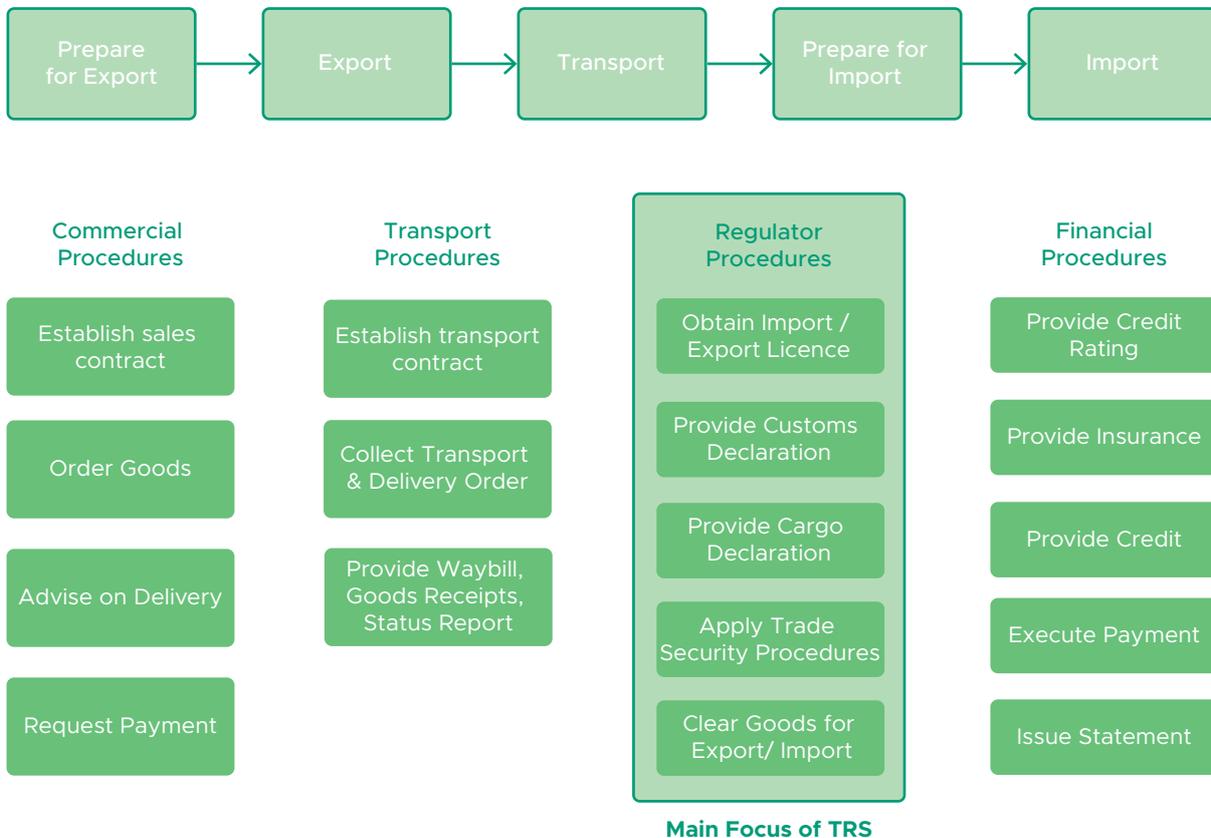
INTRODUCTION

7. Trade facilitation has become a central theme of economic growth and prosperity in the 21st century, supporting, among other things, the UN Sustainable Development Goals (SDGs). Several initiatives, measures and innovative solutions are increasingly being implemented by Customs administrations, partner government agencies and private sector stakeholders to ensure the rapid movement of cargo across borders.
8. Customs administrations, as lead border agencies, play a vital role in expediting the international movement of goods. The World Customs Organization (WCO) believes that it is important for the Customs administrations, in collaboration with relevant government agencies and stakeholders, to assess the efficiency and effectiveness of border clearance processes, in order to optimize trade facilitation and thus ultimately improve overall performance.
9. With this in mind, the WCO has developed a unique strategic tool, known as the Time Release Study (TRS), with which Customs and other government agencies, along with private sector stakeholders, can measure in a periodic manner the efficiency and effectiveness of the entire cross-border flow process related to imports, exports and transit movements of goods.
10. The tool seeks to accurately measure border process performance relating to trade flows, in particular the clearance and release of goods, and helps identify associated bottlenecks so that appropriate policy decisions to improve performance can be well designed and effectively implemented. It allows the formulation of tailor-made solutions to address inefficiencies stemming from any actor in the overall clearance and release process in the international movement of cargo, thereby leading to a steady reduction in clearance times and trade transaction costs.
11. Additionally, the tool has been attracting significant attention globally, given its increasing regular use by WCO Members, particularly in recent years. In parallel, it has also been supporting Members as an effective means of efficiently meeting obligations under the World Trade Organization (WTO) Trade Facilitation Agreement (TFA). Article 7.6.1 of the TFA encourages WTO Members to measure and publish their average release time of goods periodically and in a consistent manner, using tools such as the WCO Time Release Study.
12. Growing digitalization of international supply chains, and increasing uptake of information and communication technology (ICT) solutions in the business processes of Customs and other government agencies, have provided new opportunities for collecting more reliable and time-stamped data for TRS, thus improving the effectiveness of the tool.

1.1. What is the Time Release Study (TRS)?

13. The Time Release Study is a strategic, internationally recognized tool to measure the actual time required for the release and/or clearance of goods, from the time of arrival until the physical release of cargo, with a view to finding bottlenecks in the trade flow process and taking the corresponding necessary measures to improve the effectiveness and efficiency of border procedures.
14. Generally speaking, the TRS is a unique tool that countries are recommended to utilize in order to: measure the actual time required from the arrival of goods to their physical release; assess the efficiency and effectiveness of each actor in the flow process of cargo; identify bottlenecks affecting the release of goods; obtain empirical evidence for re-engineering existing procedures; identify opportunities for border management improvement; establish a baseline for border management performance measurement; and to improve border process efficiency in a periodic manner.

15. The TRS measures the total time needed to complete all formalities. In other words, it can determine with precision the time for each separate procedure, such as the average time needed to prepare documents and to complete the formalities for each stakeholder responsible, and other average times in the movement of cargo between two or more countries along the international supply chain.
16. For example, in the context of the TRS, the time taken to finalize a Customs procedure can be divided into separate segments, such as the average time for documentary control and for physical examination of the goods. It is even possible to establish the average time needed by the competent authorities to issue licences, by measuring the average time from submission of an application for an import/transit/export/tariff quota licence, until effective issue of the requested licence by the competent authorities (the term “licence” is used generically for each administrative act and includes the licence, permit, authorization, approval or decision).
17. It is important to note that, in some situations (e.g. low value, non-dutiable goods, and expedited shipments), release will be concurrent with clearance. The TRS methodology can be applied to measure the time needed for Customs to grant clearance after the completion of related formalities, including payment of duties and taxes. In the case of deferred payments, this may occur after the release of the goods.
18. As defined in the Revised Kyoto Convention (RKC), the term “release” means the action by Customs to permit goods undergoing clearance to be placed at the disposal of the person concerned, and “clearance” means the accomplishment of all formalities necessary to allow goods to enter home use, to be exported or to be placed under another Customs procedure. However, for the purpose of the TRS, release should normally be understood as the physical release of the goods. The figure below shows the main focus of the TRS.



19. In terms of Customs procedures, this Guide focuses primarily on “Clearance for Home Use” and “Transit”, because these are the procedures most often used. However, the principles of this Guide can also apply to any other Customs procedure, including “Exportation”, “Warehousing”, “Temporary Admission”, “Inward Processing” and “Outward Processing”.

1.2. Objectives and important features of the TRS

20. Although countries conducting a TRS may have several objectives, the overriding or principal objective is to identify and address bottlenecks in procedures related to the international movement of cargo. This objective remains crucial, both for the current international trade environment, and for how that environment might change in future.

21. However, Customs administrations are also motivated by additional objectives to conduct a TRS, based on national policy considerations and priorities. The Customs administrations of WCO Members have been carrying out Time Release Studies with primarily the following objective(s) in mind:

- Measuring the overall performance of Customs and other stakeholders' business processes;
- Identifying bottlenecks in the international supply chain and/or constraints affecting the release of goods, including with regard to the flow of information, documents and finance;
- Assessing newly introduced and modified policies, procedures, techniques, technologies and infrastructure, or administrative changes;
- Establishing a baseline for trade facilitation performance measurement;
- Identifying opportunities for trade facilitation improvements;
- Measuring the arithmetic mean and/or median time between the arrival of the goods and their release into the economy;
- Estimating with precision, based on a standardized system, the time required for each intervening event between arrival and release of the goods, i.e. unloading, storage, submission of the declaration, inspection, interventions by other government agencies and release of goods;
- Comparing the results obtained from previous Studies, especially following the introduction of policies or changes relating to Customs or border procedures (such as modernization, reform or trade facilitation programmes), to observe their progressive impact;
- Collaborating on the TRS with neighbouring countries sharing borders, as well as others within a Customs/Economic Union or otherwise, in order to identify bottlenecks at common border crossings or in a supply chain from export to import (including transit), and to take necessary coordinated corrective measures and implement solutions;
- Promoting the image of Customs administrations and other trade stakeholders with regard to commitment to trade facilitation;
- Exploring opportunities to introduce WCO modern standards and instruments related to Customs and other border regulatory processes;
- Monitoring and evaluating the implementation of the WTO TFA;
- Promoting coordinated border management;

- Implementing the Single Window environment; and
- Introducing realistic policies related to service standard levels or client charters in Customs and other government agencies.

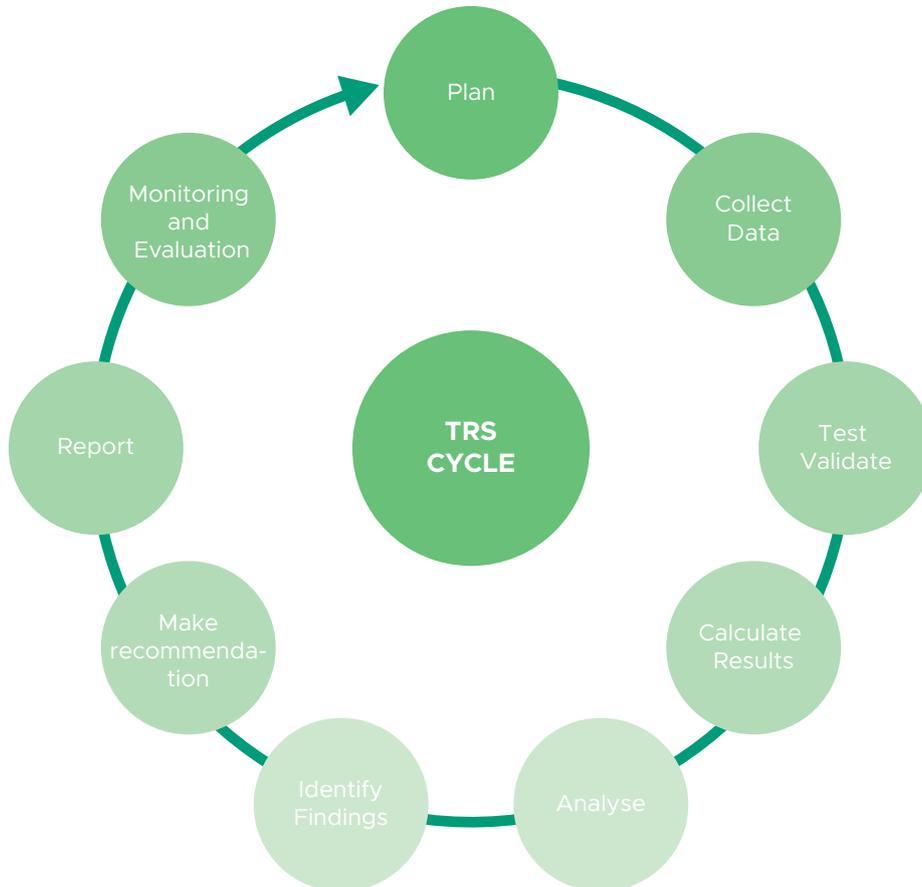
A. Different choices or approaches when conducting a TRS

22. In previous years, when the TRS methodology was being developed, it was recommended that the tool be used at one border crossing point only. Today, whilst countries may conduct a TRS at an individual border crossing point if they wish, it is becoming more common (given the huge increase in trade volumes) to conduct a TRS at a number of border crossing points, or at all border crossing points, where clearance takes place.
23. Nevertheless, when Customs administrations do not have sufficient experience in carrying out a TRS, or when they are conducting a TRS for the first time and/or resources are limited, it is recommended that the first Study cover one crucial border crossing point only. This would be a simple TRS approach often used to measure the single busiest port/border crossing point, and it would constitute a simplified approach to conducting a Study, and pave the way for a more comprehensive TRS to be done in future.
24. In more difficult situations, when a Customs administration is not able to conduct its first TRS at the identified strategic office(s) in a comprehensive manner which involves all stakeholders, it is also possible for the Study to cover only that part of the national clearance process which is directly related to Customs. When such an approach is adopted initially, the Customs administration should endeavour to carry out a more comprehensive TRS, involving other government agencies and stakeholders, at the earliest possible opportunity, and preferably within one year. This allows sufficient time for the Customs administration to enhance its understanding and to address internal issues, such as organizational and human resource capacity or integrity issues, whilst working to achieve buy-in both within the organization, and from other stakeholders, before conducting a fully-fledged TRS.
25. However, as stated earlier, it has become more common to carry out Time Release Studies at some or all border crossing points where clearance takes place (as well as for different modes of transport). Studies conducted in respect of more than one border crossing point are either “simultaneous” or “consecutive”. The TRS methodology described in this Guide clearly supports these types of Studies.
26. As it is often challenging to conduct a TRS at all national locations, it would also be justifiable to target a few strategic Customs offices or border crossing points because national laws, regulations, procedures and policies related to cargo flow processes at borders are generally applicable to the whole Customs territory. In other words, operational procedures are usually standardized and harmonized throughout a country, unless there are operational issues which are very specific to a Customs office/border point.
27. Bearing in mind all the options for conducting a TRS, it should be noted that when only one or a few border points are measured, the results of the Study can be used to modify/adjust legislation or procedures, or to introduce measures that can be replicated across other border crossing points, thereby ensuring harmonization throughout the country.

B. The TRS as a continuous improvement cycle

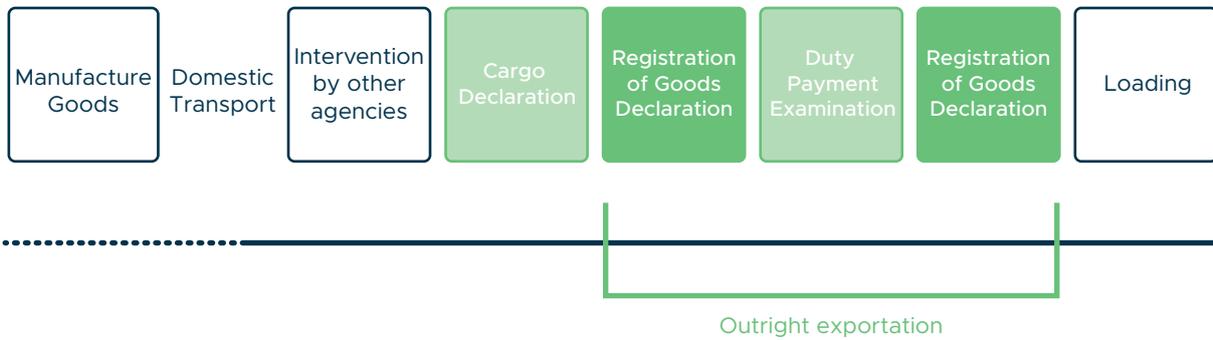
28. The rationale behind conducting TRS is based on the premise that it should be adopted as a continuous improvement cycle. It is essential to undertake Time Release Studies periodically to find opportunities for further improvement. Thus, undertaking a TRS will provide Customs administrations with a baseline of current performance regarding border procedures by identifying bottlenecks, making it possible to subsequently explore solutions to address the problem.

- 29. Administrations that periodically undertake Time Release Studies have reported that the time taken for release or clearance of cargo has decreased steadily due to the implementation of improvements and corrective measures designed as a result of the bottlenecks/problems identified. The implementation of corrective measures takes time for most countries, and so each TRS cycle should allow the country sufficient time for this before it embarks on the next TRS cycle. Anecdotal experience of Customs administrations indicates that a TRS should not be carried out before allowing “reasonably sufficient” time to implement identified corrective measures, and allowing these measures to stabilize in order to observe their impact.
- 30. The figure below outlines the full cycle of a standard TRS, covering the steps or activities involved in a cycle, as well as how one TRS cycle, upon conclusion, leads to the next TRS cycle.
- 31. Many administrations have established pre-set work or clearance standards, such as client charters and performance pledges, which indicate the average time that should be taken to complete any particular process. In such cases, the results of the Study could be used to evaluate the extent to which these standards or estimated times are being met. The Study will also give useful insights into bottlenecks within the clearance system, including the reasons for not being able to meet pre-set work standards. It will help identify improvement measures that could be undertaken to achieve the stated goals, providing greater transparency and predictability.
- 32. If no Study has been undertaken previously, then the first Study can be used as a reference basis for future comparisons when improvements are made in the flow process of cargo.

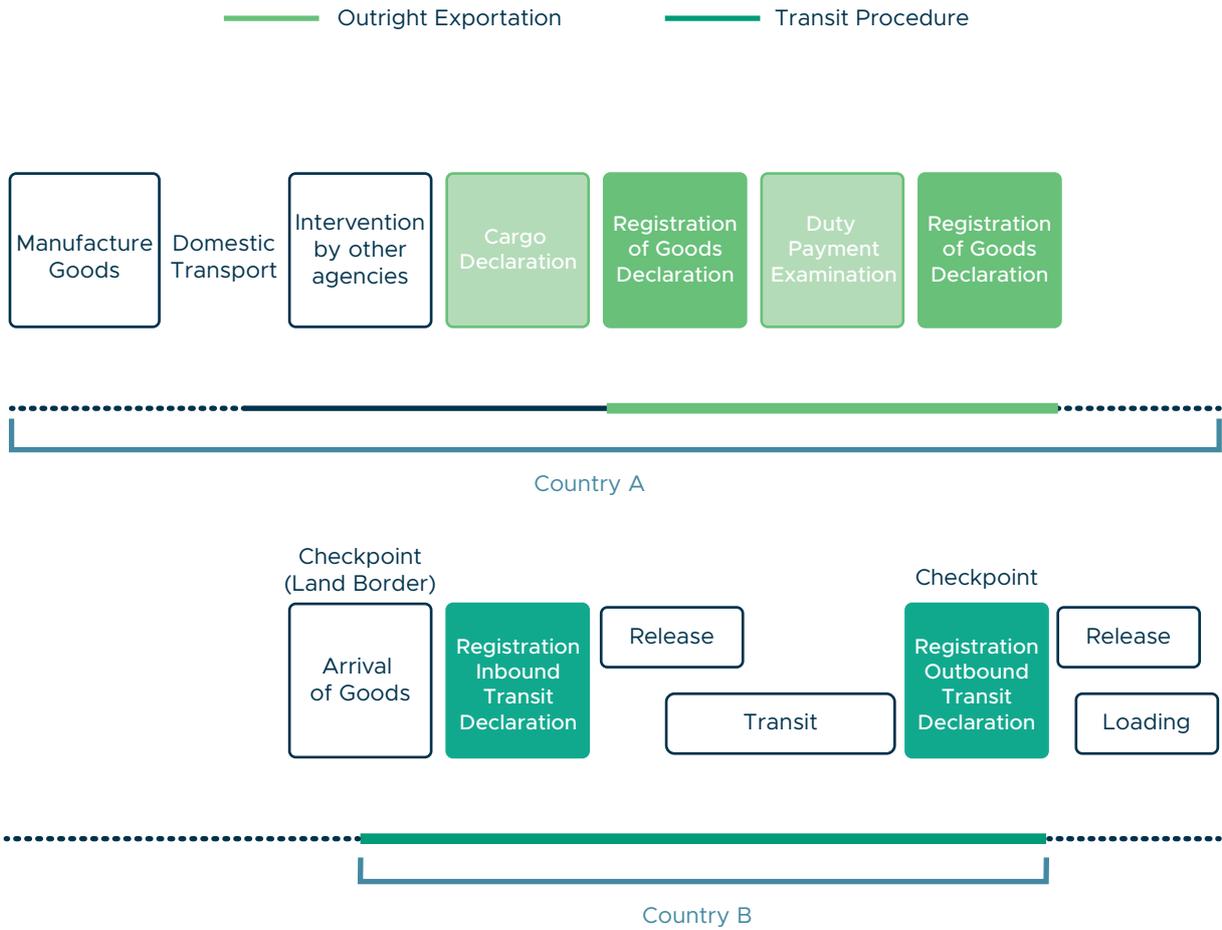


C. Applicability of the TRS for export procedures and beyond national borders

- 33. This Guide mainly focuses on the time taken from the arrival of the goods at the port/airport/land border, until their release to the importer or to a third party acting on the importer’s behalf. However, the methodology in this Guide can equally be applied to a cargo flow process involving export, or to a situation involving more than one country.
- 34. Time Release Studies for export procedures may be useful for those countries that have not yet introduced modern Customs export procedures, although many Customs administrations provide a release status within a few minutes of registration of the goods declaration for export through an automated Customs clearance system. The “Export TRS”, from registration of the goods declaration to release, may be meaningful for some countries that impose export Customs duties, since the assessment of duties and risk management could take time.

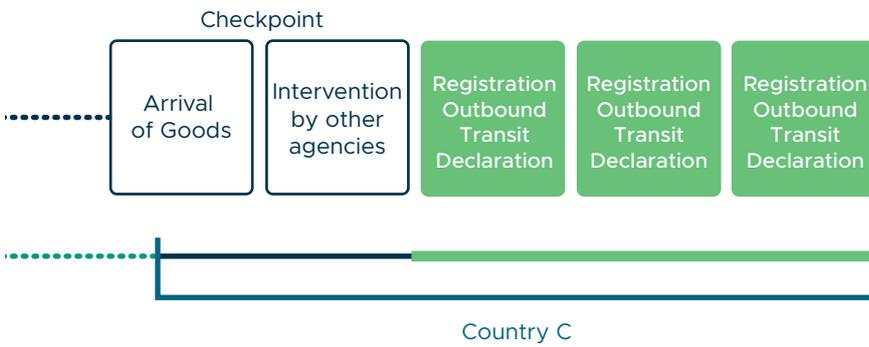
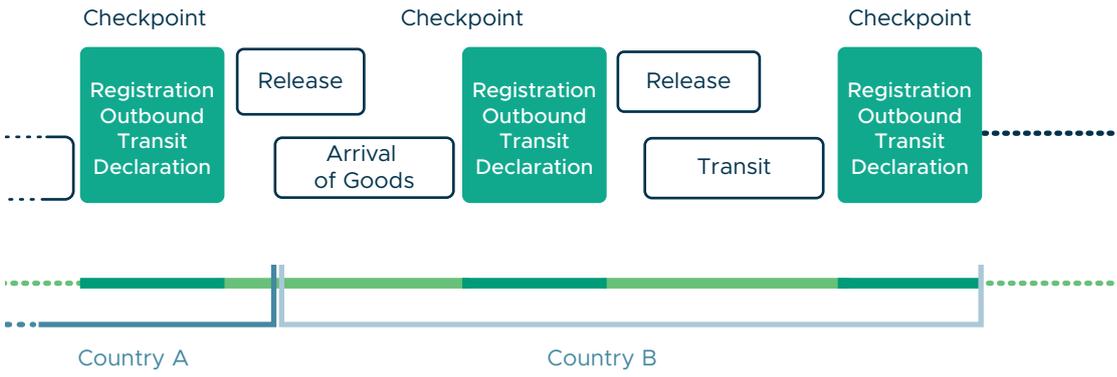
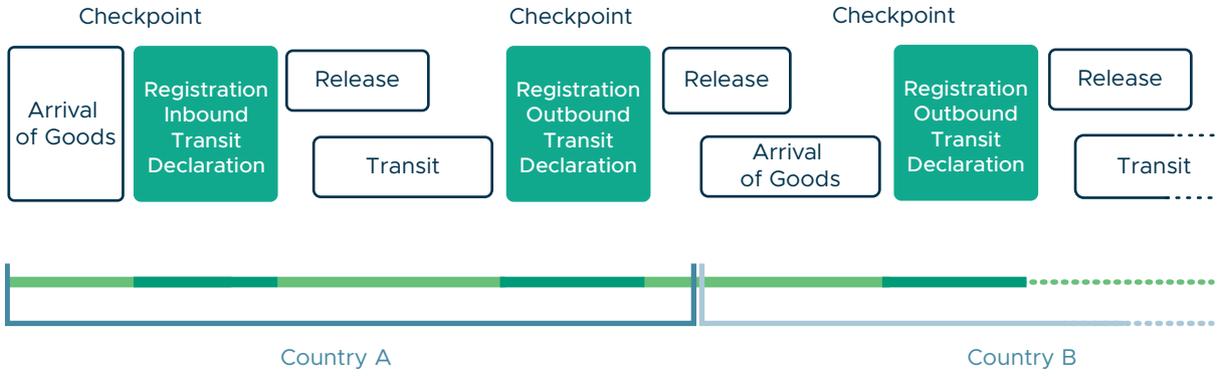


- 35. There are some challenging issues for a TRS involving export. In many cases, manufacturers determine the schedule for domestic transportation of export goods to the port, based on a ship’s schedule, the cut-off date/time for delivery of goods to the container yard, or even the timing of an order from foreign customers. In addition, the starting point for export could be ex-factory, the consignment’s arrival at the container vanning site, or the registration of the goods declaration. Nevertheless, undertaking a TRS involving export merits consideration in order to respond to the interests of business stakeholders. It is also worth noting that export performance in a certain region (with a neighbouring country) could also be measured by a TRS involving export, in combination with a TRS for transit procedures.



36. The TRS methodology is also applicable to measuring the efficiency and effectiveness of trade relations between two or more countries. Guidance on how to conduct a “Joint TRS” at a bilateral or multilateral level is in Appendix 3.
37. Bilaterally, two countries may agree to carry out a Joint TRS at common or different border points by replicating the methodology with a few adjustments to achieve the desired goal. A high degree of commitment from both countries, as well as from trade stakeholders, will be needed.
38. In the same way, the methodology can be used to carry out a TRS at multilateral level, covering even international transit. This particularly applies to specific trade corridors in respect of the movement/transit of consignments from seaports to hinterlands in landlocked countries, including transit through other countries. As with the TRS at bilateral level, a high degree of commitment from all countries will be needed, as well as from trade stakeholders.

— Clearance for home use — Transit Procedure



D. The TRS as a national benchmarking tool

39. The TRS was not initially designed as a benchmarking tool. The traditional ideology, which remains valid, is that it is not meaningful to compare TRS results among different countries since trade conditions such as infrastructure, border procedures, IT development, resource availability, and border agency capacity are rarely, if ever, identical in reality.
40. Statistical standards concerning both the sampling and the calculation methods must be adhered to if useful and reliable results are to be obtained. Additionally, laws, procedures and resources vary from one Customs administration to another. For this reason, comparisons of results from different Customs administrations are neither useful nor reliable, since Studies can seldom be undertaken in identical conditions and operating environments. In essence, a TRS should not be considered to be a competition between Members or attempt to place a value judgement or ranking on the operations of an administration.
41. Nevertheless, TRS could be used in a country as a national benchmarking tool for certain purposes, particularly from the macro perspective. In this case, inherited conditions or situations in each country have to be properly taken into account, since the effectiveness/ineffectiveness of border agencies might not necessarily be the main cause of any delay.
42. Given similar situations, involving, for example, the same mode of transport or the same legislation, the TRS can be used as a benchmarking tool to support realistic service standard levels for Customs administrations and other trade stakeholders, as the results of Studies undertaken at different Customs offices could be compared to raise the performance of trade stakeholders.

E. Stakeholder engagement

43. The effective involvement of relevant stakeholders serves to ensure that TRS outcomes are based on the best and most comprehensive information available to identify bottlenecks and trade facilitation opportunities in the border process.

I. Border and other agencies

44. The policy document “Customs in the 21st Century” (“C21”) identifies Coordinated Border Management (CBM) as one of the ten building blocks for the role and mission of Customs in the 21st century. CBM represents an approach to managing borders which involves public service agencies working across portfolio boundaries in a coordinated manner to achieve a shared goal, thus providing a cohesive government response to the challenges of border management.
45. The spirit of CBM has also been reflected in Article 8 (“Border Agency Cooperation”) of the WTO TFA, which requires each Member to coordinate their activities with respect to the agencies and authorities responsible for border controls and procedures involving the import, export and transit of goods.
46. What constitutes appropriate involvement and communication among border agencies will differ from country to country. The fact is that each Member has its own governmental and administrative structure, and adopts international obligations through domestic legislation in its own way for trade procedures.
47. The following list provides examples of agencies and organizations that are typically involved in a TRS: Customs, Quarantine, Standards Board, Immigration, Border Police Authority, Port Authority, Airport Authority, Land Border Authority, Ministry of Finance/Economy, Ministry of Transportation, Ministry of Trade/Commerce, Ministry of Agriculture and Animals, Ministry of Health, Food and Pharmaceuticals, and Ministry of Environment.

48. With a view to the Study's relevance and efficiency, only those agencies which actually impact on the cargo clearance process should be included. These can act as the national voice of others which intervene to a lesser extent in the flow process of cargo. The involvement of border agencies is indispensable to the TRS, as they may be able to provide Customs with the necessary data which it does not have, and to formulate solutions to address non-Customs bottlenecks. For example, if bottlenecks relating to border agencies have been identified, such agencies are likely to know which measures could be recommended, and the measures would then be included in the National TRS Report.
49. It is important to bear in mind that the TRS can be very technical. The officials involved should not only be in a position to take decisions, but also have good overall technical knowledge. Therefore, it is crucial that officials from other border agencies involved in the TRS have relevant knowledge of trade issues, particularly issues which are the competence of their respective institutions.

II. Private sector

50. Customs-to-Business Partnership is identified as one of the ten building blocks for the role and mission of Customs in the WCO Customs in the 21st Century policy document. This policy document argues that Customs needs to understand the concerns of business, while business needs to know the requirements of Customs. It also highlights that there is a need to translate this relationship into a partnership that results in mutually beneficial outcomes.
51. To achieve a successful outcome to the TRS, it is imperative to actively engage the private sector and to take its views into consideration. Consequently, it is important to have a good understanding of the interests of the private sector and to communicate regularly with the private sector organizations and members that may be affected by particular aspects of TRS implementation.
52. The following list provides examples of business participants that could be involved in the TRS: chambers of commerce, freight forwarders, Customs brokers (agents), seaport authorities, airport authorities, warehouses, railway industry, transport industry, shipping companies, airlines, international couriers, and express couriers.
53. For instance, in cases where the port authority and airport authority are wholly operated by the private sector, the TRS may need to be undertaken in cooperation with them to measure the time of arrival of goods. The involvement of Customs brokers (associations) is indispensable to the TRS, as they may be able to provide Customs with the necessary data that it does not have. They are also likely to suggest possible measures which could be introduced in the country once bottlenecks are identified. These measures would then be included in the National TRS Report.
54. A TRS typically provides an opportunity for Customs, other border agencies and business to work together for mutual benefit and can create the conditions to evaluate progress in implementing the WTO Trade Facilitation Agreement. The TRS could identify bottlenecks in Customs and border procedures, and even in non-government sector transactions, providing opportunities to further improve current conditions.
55. It is also critical that the individual circumstances of each Member be taken into consideration in creating the TRS Working Group with business.

The background features a large, abstract graphic on the left side, consisting of a white circle partially overlapping a green circle, and a white rectangular shape below it. The rest of the background is a solid green color.

**STRATEGIC
CONSIDERATIONS
OR BENEFITS
TO A COUNTRY IN
CONDUCTING A TRS**

56. The WCO has been encouraging its Members to conduct Time Release Studies periodically in order to leverage the opportunities that a TRS brings to Customs administrations, other partner government agencies and the business community in the clearance of goods.
57. Recently, the use of TRS has also been recommended under Articles 7.6.1 and 7.6.2 of the World Trade Organization Trade Facilitation Agreement (WTO TFA). The TRS tool should be used as a key performance measurement tool to assess, evaluate and enhance the implementation of the WTO TFA measures.
58. Under the Agreement, WTO Members are encouraged to measure and publish their average release time of goods in a periodic and consistent manner. The TRS methodology is explicitly mentioned in the TFA (Article 7.6) as an aid to Members in carrying out such exercises.
59. International development partners within the trade arena have also been advocating that the TRS be used as a strategic enabler to support the implementation of trade facilitation measures, particularly those included in the WTO TFA.
60. The National Committee on Trade Facilitation (NCTF) within a country can use the TRS in the strategic planning and proper sequencing of the TFA by accurately and comprehensively assessing trade facilitation needs and priorities, as well as by periodically monitoring and measuring the outcomes of the implementation of specific facilitation measures and associated policies and programmes.
61. A coordinated approach which engages all relevant stakeholders in conducting the TRS can help enhance coordinated border management at national, regional and international levels, thus strengthening inter-agency cooperation. The latter is a key building block in trade facilitation, and is laid down in various WCO instruments, such as the WCO Revised Kyoto Convention and the WCO SAFE Framework of Standards, as well as in the WTO TFA. Such an approach can also help enhance regional integration, including by helping Members join and integrate into regional economic communities, based on their strategic and policy considerations.
62. Increasingly, the regional trade community is finding that the TRS is a strategic tool for improving intra-regional trade, and Joint Time Release Studies involving neighbouring countries are being carried out at common border points. These Studies can equally be used in measuring the performance of a transit corridor involving a few countries, from one end to another, especially in respect of the movement of consignments from seaports to hinterlands in landlocked countries, including transit through other countries.
63. With the above in mind, and considering the significance of the TRS, the latter has become a well-established tool that helps enhance trade facilitation in any country, regardless of the size, complexity or level of the economy. Its benefits go far beyond trade facilitation and beyond those actors which are directly involved in the flow process of cargo: the benefits extend to other areas directly and indirectly related to Customs, other government agencies and the business community, thus improving a country's overall economic competitiveness.
64. The TRS can also assist Members with "perception management" through a comprehensive and evidence-based performance measurement and improvement strategy.

2.1. Benefits to national governments

65. The TRS provides the following benefits to national governments:

- Improves the efficiency of Customs administrations and other government agencies involved in the flow process of cargo related to importation, exportation or transit of goods, or any other Customs regime related to release or clearance of cargo;
- Allows Customs and other stakeholders to explore synergies, and to work together in addressing national concerns or obstacles which represent a source of delay or problems in the movement of cargo;
- Creates better conditions for accelerating the international movement of cargo subject to import, export, transit or any other Customs regime related to the release or clearance of cargo, thereby reducing transaction costs for traders and encouraging domestic and international investment;
- Enhances opportunities for expansion of national productivity, leading to the improvement of the country's international competitiveness in the global market; and
- Supports the government's macroeconomic initiatives through growth and development by strengthening efficiency and effectiveness of cross-border agencies.

2.2. Benefits to the business community and consumers

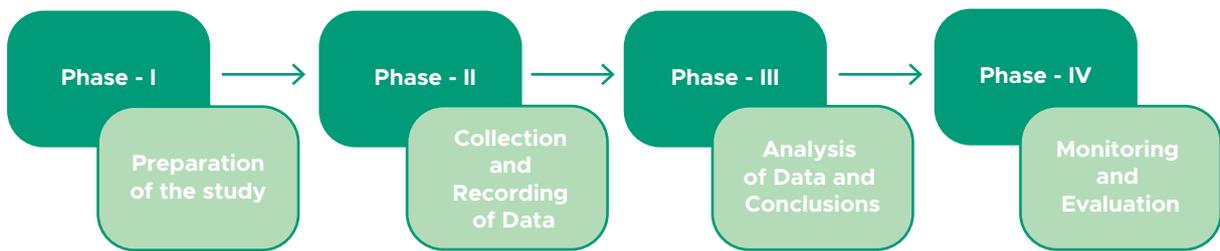
66. The TRS provides the following benefits to the business community and consumers:

- Enables the business community to partner with Customs and other government agencies to improve the trade flow process of cargo in relation to a country's import, export or transit release/clearance process, providing them with a better trading environment;
- Reduces the financial burden that the business community is likely to face as a result of any possible inefficiency from one or more government agencies in the trade flow;
- Improves transparency and predictability for the business community with regard to the release or clearance process, thus leading to better inventory management and just-in-time deliveries;
- Creates favourable conditions for legitimate business to benefit from the implementation of trade facilitation measures or initiatives, such as pre-arrival processing, Single Window and Authorized Economic Operator;
- Enables private terminals and warehouse operators, freight forwarders and others to operate and improve their businesses in a dynamically efficient environment;
- Provides competitive and fair prices to consumers, who will not have to pay additional costs as a result of inefficient procedures or unjustified practices which may add cost to goods during release or clearance before the goods reach consumers; and
- Improves consumer choice and accessibility to foreign or domestic products.



OVERVIEW OF TRS METHODOLOGY

67. The Time Release Study should be divided into four core phases, to be followed in a sequential manner until the Study is concluded (leading to a new Study cycle in due course). The phases are an integral part of the Study and set out the methodology in full. They are described below.



3.1. Phase I – Preparation of the Study

68. This is the most important phase since it determines the design and scope of the Study. Detailed preparation is therefore essential to ensure the success of the Study and the credibility of its results.

A. Establishment of a Working Group

69. The first step is to establish a Working Group responsible for the overall project. This is necessary in order to bring together all the relevant officials, including those from other government agencies, who will be involved in the project from the outset. In cases where Customs administrations are conducting the Study with little prior experience, it is also important to provide the Working Group with Terms of Reference which clearly define what is expected of it. Guidance on this process, including a list of the functions and responsibilities of the Working Group, is in Appendix 2 to this document. However, since TRS in a country is supposed to be carried out periodically, the Terms of Reference may require less input in the context of subsequent Studies.

70. The participation of as many players as possible in the supply chain (e.g. Customs brokers and other trade operators) is highly recommended in order to ascertain the time taken for the entire clearance chain, i.e. from the time of arrival of the goods at the port/airport/land border, to the time they are physically removed from the Customs area or physically released. These players should also form part of the Working Group from its inception.

71. The Working Group should be responsible not only for the preparation, planning and implementation of the project, but also for ensuring good coordination between all the parties and agencies involved. In order to achieve this, and to address any misunderstandings, it will be necessary to explain the objectives, the approach envisaged, and the advantages to be gained by Customs, other government agencies, Customs brokers and other trade operators.
72. In addition, all parties involved in implementing the Study should be made aware that its results will contribute to improving cargo clearance processes, and bring other benefits to the nation as a whole, in terms of improved economic competitiveness and supply chain efficiency. It will also complement the interests of all staff and trade stakeholders.

B. Determination of the scope and design of the Study

73. It is recommended that the Study be relevant and targeted to a specific situation or to the national trading environment. Since situations may differ from country to country, it is suggested that, as far as resources permit, the Study should include a comprehensive description of all the events in the clearance chain. This approach will require the participation of Customs brokers, trade operators, banks, and other border agencies involved in border clearance (e.g. Health and Agriculture). Every player will thus be able to consider each of its own processes across the entire clearance chain, with a view to improving and enhancing the existing system.
74. In determining the scope and design of the Study, the Working Group must first decide the following:
- Will the Study consider Customs performance only, or will it take into account the performance of relevant agencies involved in border clearance (CBM perspective)?
 - Will the Study measure the time from arrival of the goods at the port, airport or land border station until they are released and physically removed from the Customs control area or physically released? If so, it should also involve other parties, such as trade operators, Customs brokers, other relevant agencies (e.g. Health and Agriculture), banks and other economic operators.
 - Will the Study be internal to the Customs administration, and measure the time from when the Customs declarations are presented to Customs until the time when goods are released by Customs – and/or will it include a scenario covering the completion of all border clearance formalities?
 - Will the Study be based on automated or manual Customs procedures, or both?
 - Will the Study consider export clearance and transit procedures, or be a Joint Study with neighbouring countries sharing a land border, or with other countries within a Customs/Economic Union?
 - Will the Study be conducted to evaluate the impact of implementation of a particular WCO instrument/tool, or of one or more related WTO TFA measures?

75. If an administration wishes to undertake the Study using both automated and manual systems, it must take this into account when choosing the method of data capture and the Customs offices to be included.

C. Planning

76. Planning constitutes another important aspect of the Study. The plan can easily be modified before the Study has significantly progressed. However, once the Study is well under way, the plan should not be changed.
77. The TRS Working Group should be aware that it is possible to conduct a TRS in one or more locations. Accordingly, Customs administrations may decide to conduct the Study at more than one location simultaneously, or at various locations consecutively, subject to resource availability and other considerations.
78. Aside from deciding whether the Study will take place at one or more locations and whether it will be

“simultaneous” or “consecutive”, the Working Group should decide a number of other issues or steps during the planning stage. These are outlined below.

79. When planning a TRS, it is important for the Working Group to realize that the Study may be conducted over a longer period than that recommended in this Guide, particularly if the Study is to take place at several locations consecutively. It should be noted that, for a “simultaneous” or “consecutive” Study, each Customs office/border point selected for the Study will normally be involved in its preparation and execution.
80. As mentioned earlier, a “simultaneous” TRS means that a Customs administration will carry it out at more than one location at the same time. In contrast, a “consecutive” TRS involves carrying out the TRS at one location at a time followed by additional Studies conducted at other border posts.
81. Fundamentally, Customs administrations may decide whether to conduct the TRS at one station, or at a number of stations, depending on whether they consider it justifiable and relevant.
82. Irrespective of whether the Study is conducted in a simultaneous or consecutive manner, it is recommended that its work and outcomes be consolidated into a single National TRS Report. This should outline the reality on the ground at each location and provide other crucial information upon the conclusion of the whole process.
83. Usually, the TRS Action Plan, which is drafted at the very early inception stage of the TRS, gives some indication of when the crucial steps are going to be fully concluded. The seven core steps which the Group has to carefully consider in planning a TRS are indicated below and should be followed in chronological order. However, once the TRS process becomes embedded in a country, some of these steps may potentially be omitted or require less time, particularly in terms of preparation. The steps are the following:
 - Determination of the duration, period and timing of the TRS;
 - Determination of the scope;
 - Types of goods and traffic;
 - Sampling;
 - Business process;
 - Determination on whether it is necessary to use a questionnaire;
 - Test run.

I. Determination of the duration, period and timing of the TRS

84. “Duration of the Study” refers to the time taken to complete various TRS activities, including the TRS Report. The duration has to be sufficient to allow the Working Group time to draft and finalize the TRS Report. In view of all the activities to be carried out by the Working Group (including regular meetings, visiting places where flow process operations are handled, collecting the data from arrival to release of the goods), it is recommended that the duration of the Study as project be a minimum of six months. However, it will sometimes be possible to carry out subsequent Time Release Studies in less time, once the Customs administration has gained sufficient knowledge and experience.
85. The “TRS period” is normally shorter; it often serves as a reference or base point for collecting live clearance data of sample declarations. Ideally, the period should last at least five or seven consecutive working days (five days when Customs declarations are not processed at weekends, and seven days when the declarations are processed at weekends). This should not unduly disrupt normal Customs operations, and will ensure that a sufficiently large number of declarations are captured to have a good representative sample. If the Study is conducted in a fully automated clearance environment, the period could be significantly longer than five or seven days.

86. The period chosen for the Study should be one of normal traffic. Seasonally fluctuating periods, such as before or after holidays (where the volume of traffic tends to be particularly low or high) should be avoided, because these often do not reflect the normal traffic flow. The TRS period should be distinguished from the overall duration of the Study, which also involves other activities, including collecting all the data for the TRS (explained further in Phase II of the TRS methodology).

II. Determination of the geographic scope

87. The Customs administration, in consultation with relevant stakeholders, should determine whether the Study is to be conducted nationwide (i.e. at all the Customs offices), or only in certain regions or certain individual offices. The Working Group can usually make a proposal after examining the relevant factors, and put this to the administration for decision. For the initial Study, it is suggested that the busiest Customs office in terms of traffic be chosen. For example, in many countries, a significant percentage of traffic goes through only one or two locations. These ports, airports or land border crossings could be used as a starting point for the Study.

88. The following criteria could influence the choice of Customs offices:

- Volumes of traffic – it is suggested that the Study be conducted at points of entry with a large volume of traffic; and
- Types of consignments – it is recommended that the Study be conducted at points of entry which process a large variety of consignments and are not limited to only certain commodities, such as bulk goods or chemicals. Normally, such Customs offices/border points should deal with the flow of goods which are crucial for the domestic economy (for example, the most import, transit and export goods). However, under certain circumstances, they may deal with inputs for manufacturing, or with finished goods required to establish, run and maintain critical infrastructural projects, etc.

III. Types of goods and traffic

89. The choice of goods to be covered by the Study will depend on the type of goods entering or exiting the country. It is recommended that, at least for the initial Study, the administration include all goods entering through the selected points of entry, in order to develop a holistic assessment of efficiency. However, the administration may decide to select only a particular category or categories of goods entering or exiting the country. Some of the options are:

- Goods falling within certain regimes, such as dutiable goods, non-dutiable goods, exempted goods, or goods imported under preferential and free trade arrangements;
- Goods which fall under different procedures, such as goods intended for home use, goods intended for free zones, goods intended for inward processing, goods intended for warehousing, transit, export, etc.;
- Containerized goods, pallets, break bulk, etc.;
- Other criteria, such as type of goods (for example, perishable goods), tariff headings, value, goods from Authorized Economic Operators (AEOs), etc.

90. These categories of goods are given by way of example, and further criteria could be developed. In determining the choice of traffic involved in the Study, the Working Group should take into account the geography of the Customs territory and the level of traffic relative to the volume of all traffic nationally.

91. It may be possible to eliminate from the Study certain traffic of minor importance, or traffic that constitutes less than a certain percentage of total traffic.

92. Given the large volume and special nature of postal and express courier traffic, this should normally be analysed separately. However, with growing e-commerce, the number of postal and express courier parcels is rapidly increasing and should accordingly be considered as part of the Study in order to speed up legitimate e-commerce flows.
93. Depending upon the resources available, the Study may be carried out for all types of traffic (e.g. air, sea, rail or road) during the same period, or carried out consecutively for different means of transport and for different locations.
94. Special attention may be paid to a particular type of consignment, such as consignments for which immediate release is required. In that case, the Study should either be devoted solely to this type of consignment, or be a more comprehensive Study, covering all consignments, with a separate sample of the particular type of consignment selected from the population for detailed study (see important information in the below box, including pertaining “Sampling”).

ELEMENTS TO BE CONSIDERED ON DETAILED DRAWING PLAN (EXAMPLE)

Who? (Establishment of the Working Group)

Points	Example
Who (which division) in the Customs administration should be in charge of the TRS?	Director of Facilitation Director of Customs Clearance
Which government agencies should be involved in the TRS?	Department of Trade, Department of Quarantine
Which private entities should be involved in the TRS?	Customs brokers, forwarders, carriers

When? (Overall duration for data collection and period of the Study)

Points	Example
When is the target timing of the TRS?	The 1 week of April
How many days are necessary for the overall collection of TRS data?	Overall duration for data collection of the Study is maybe 4 consecutive weeks
How possible can you organize the overall schedule?	<ul style="list-style-type: none"> • 1 week for data collection on procedures in the trade-related agencies • 2 weeks for data collection on procedures in the trade-related agencies and Customs • 3rd & 4th week for data collection on Customs and release of goods

Where? (Choice of Customs offices)

Points	Example
How many Customs offices should be involved in the TRS?	All Customs offices, the biggest Customs office
Which Customs office should be involved in the TRS?	Airport Customs, seaport Customs, Customs for transit
Should the TRS cover the period from arrival of the goods to physical removal of the goods from the Customs control area, or Customs procedures only?	From arrival to removal from the Customs control area

What? (Type of goods)

Points	Example
Should it include automated (ICT) Customs procedures or manual (paper-based) procedures only?	Both manual and automated (ICT) Customs procedures
Which means of transport should be included?	Air, sea, rail, road, river
Which type of goods should be included?	All, FCL, LCL, conventional
What value criteria of goods should be set?	High, medium, low, non-dutiable
For which core events will times be captured?	Arrival, lodgement/registration of required documents, examination and drawing of sample, discharge, border release given, border clearance given, removal from border control, received at owners' premises

How? (Sampling, collecting and recording data)

Points	Example
How many samples should be taken into account?	20% of all Customs declarations
How should samples be selected?	Use last two digits of Customs declaration ID Number
How can you obtain the necessary data on "Arrival of goods"?	Carriers, Customs IT system
How can you obtain the necessary data on "Unloading of goods"?	Port operator, Customs IT system
How can you obtain the necessary data on "Intervention by trade-related agencies and other stakeholders"?	Border Agency
How can you obtain the necessary data on "Physical release of goods"?	Warehouse operator

IV. Sampling

95. When the volumes of consignments or time constraints make it impossible to capture all transactions in the period selected, sampling should be used. If a sampling method is used, a sampling strategy must be developed. The latter should consider the nature of the consignments to be measured, the primary purpose of the analysis, the types of statistical techniques that might be used, and the relative ease or difficulty in the mechanics of listing the transactions and drawing the sample.
96. When the population cannot cover one hundred per cent (100%) of all transactions to be captured for the Study, the Working Group should ensure that the sample selected is statistically valid. The administration conducting the Study should justify the sample size in the TRS Report.
97. Care should be taken to ensure that the samples are representative of the transactions covered by the Study (sample reliability), as this will reflect the degree of variability that exists in the population.
98. The sample size required for meaningful estimates of the population or sub-population parameters will also depend on the degree of precision in making the estimates (sampling error). Generally, the larger the sample used, the more representative it will be of the population for the Study.

99. Reliable results can be obtained if a sound sampling method is used. The principles below should be observed.

- All samples must be selected randomly or with a known selection probability. This can be done by using random number generators for automated procedures. For manual procedures, systematic means to ensure randomness in selecting transactions should be developed. Established sampling methodologies can be used to make this truly representative.
- If sub-populations, for example goods that undergo physical examination, are to be studied separately, a stratified random sampling method should be used, where separate samples are established for each sub-population. It should be noted that comparing samples from these sub-populations with those from the main population could lead to errors.

100. It is suggested that books on statistical research methodology be consulted if additional or more in-depth information is needed on sampling issues. If necessary, external experts could be used to advise on the sampling method and process.

V. Business process

101. The Working Group should design national business processes for all cargo clearance processes, per mode of transport or border crossing point to be covered by the TRS. Each business process should include Customs, the other main government agencies, and the private sector involved in the flow process for the potential cargo or location(s) which will be the focus of the Study.

102. The national business process can be understood as the sequence of activities and tasks which an international consignment undergoes in the form of the physical movement of cargo, document processing, examination, inspection, intervention by other stakeholders, payment of duties/taxes/fees, release of goods, etc. The national business process model should be a clear reflection of how the cargo clearance process is carried out in reality. In addition, it should distinguish between the intervals of the process that fall within the competence of the Customs authority, and those that depend on the other cross-border regulatory agencies. As far as possible, this should be reflected in the questionnaire or in the way data is analysed. A business process model for different modes of transport is in Appendix 2 to this document.

VI. Determination on whether it is necessary to use a questionnaire

103. A questionnaire can be used to capture key elements of the clearance process. The questionnaire form will ensure that the information is captured in a structured format, particularly when the clearance process is not fully automated.

104. In a non-fully automated environment, when Customs administrations have very little experience of conducting a TRS, it is recommended that a simple questionnaire be used that records the “time-stamps” of the main procedures or processes. A complex questionnaire that requires the recording of numerous time-stamps and other complex features leads to inaccurate data collection when Customs administrations have little experience.

105. However, as the Customs administration gains experience in conducting a TRS, the Working Group may, in time, consider designing a complex questionnaire for the start of a new TRS cycle. The questionnaire form should be designed to capture significant relevant data required for the Study (which the Working Group will be able to do if they are well acquainted with the business process). The form should contain a series of questions to be answered by all the parties involved in the Study. It could be a single form, containing information to be entered by all the relevant agencies participating in the Study, or it could be a number of forms, containing information on the processes relevant to the respective participants. Multiple questionnaires or forms are not normally recommended for capturing time-stamps.

106. If a number of forms are used, it is desirable to evaluate the items of data together (once all the data has been captured) in order to ascertain the time taken for the overall clearance chain. However, it is preferable to use a single form that is agreed by all the agencies involved in the clearance process. This will be more convenient, since all the data will be captured in a chronological sequence.

107. Although the questionnaire depends on the country, mode of transport or even the location, there are important elements that should be included, and some of these elements are also shown template questionnaires set in Appendix 2.
108. Given that over 60% of WCO Members are Contracting Parties to the Revised Kyoto Convention, and in view of the ongoing efforts to improve and harmonize the flow process of cargo in these Members, a simpler, standard national form may capture all the required information. However, the form should be adjusted to reflect possible small differences regarding different locations or modes of transport.
109. In those countries where most or all clearance processes are fully automated, it is possible that a questionnaire will not be needed to collect the necessary data. This is because the time-stamps which are normally collected using the questionnaire form can be inserted directly into a smartphone, tablet or other electronic device.
110. Nevertheless, the Working Group should always be aware of the structure which a questionnaire form could take. This is helpful in terms of knowing how the information will be obtained, and what the logical sequence will be for the entire clearance process. It will also become important when the WCO TRS software is used to analyse the data obtained.
111. It is also possible that, in a fully automated environment, the form will be designed to include a barcode and that the time-stamps will be able to be captured much more quickly and accurately by using a barcode reader.

VII. Test run

112. It is advisable that a test run be conducted once the questionnaire has been designed and the personnel collecting and recording the data have been briefed. However, a test run should also be conducted when questionnaire forms are not used (i.e. when the clearance process is fully automated). This is important in order to ascertain that data collection takes place exactly as prescribed. It will also provide the opportunity to remedy any problems that might be encountered due to a lack of understanding by the personnel collecting and recording the data.
113. The test run can be carried out over two days so that all the parties involved in the Study know how to resolve any problems that might be encountered during the test. It is recommended that the questionnaire be circulated in advance to all the parties. In addition, those who will be using electronic devices to collect the data need to have them in advance.
114. All the observations from the test run should be recorded and, if possible, any issues identified should be resolved before conducting the Study. After the test run, but before the actual Study, it is possible that quick adjustments might be needed. However, it is worth to note that in situation where questionnaire form is not used test-run might not carried out.

3.2. Phase II – Collection and recording of data

115. Data collection is influenced to a great extent by whether the clearance process is mostly manual or automated. The collection of data involves certain essential elements.
116. When collecting data for the purpose of conducting a TRS, there are two options which can be used:

A. Collection of data manually

117. Data is collected manually by using one or more questionnaire forms where the data cannot be collected electronically. The collection and recording of data should take place using the pre-designed form(s). As many WCO Members have a partially automated clearance process, the form will not be used to collect all the data from arrival of the cargo until release. The entire set of data collected from arrival to release, including the data collected manually, will subsequently need to be inserted into the WCO TRS software for further analysis.

B. Collection of data automatically

118. Data can be collected from computer systems and additional electronic devices, such as smartphones, RFID seals, GPS-enabled track and trace, other used during the flow process. This option allows Customs administrations, other government agencies and relevant stakeholders to extract their respective time-stamped activity records of the cargo clearance process. The time records related to the accomplishment of various events identified are measured, extracted from IT systems and uploaded into the WCO TRS software platform. A hybrid approach combining both of these options can be used for the collection of data when the interval from arrival to physical release of cargo contains elements where actions are carried out manually and with the aid of electronic devices.
119. When data is collected for the purpose of TRS analysis using only option two above, the TRS Working Group is advised to capture the data and immediately structure it in a manner compatible with the TRS software. This is important because, while the manual option involves circulation of one or more questionnaires at various points in a sequential manner, the data obtained electronically by using option two comes from different points within Customs' and other stakeholders' domains (unless the whole process is fully electronic), and may not necessarily follow a sequential flow process for the clearance of goods.
120. For the data collection process, the Working Group needs to consider the key areas below.
- Ascertain which processes are accomplished with the aid of computers and electronic devices, and which processes are manual. This will help the Working Group to better define the method(s) for collecting the necessary data.
 - Ascertain the processes and the parties responsible for collecting and recording the data.
 - Some data is known in advance. For example, Customs brokers, freight forwarders and shipping agents will usually have most of the general information relating to the goods and their arrival prior to submission of the declaration to Customs (particularly when goods are not subject to a pre-arrival declaration). In a manual setting, this information could be entered into the questionnaire form as soon as it is received. It is therefore preferable for the questionnaire forms to be given to Customs brokers, freight forwarders and shipping agents in advance to fill in the relevant available information prior to submission of the goods declaration.
 - When data is entered into the form at the Customs office during the clearance process, it is desirable that the officers tasked with entering the data be other than those processing the transactions. This will avoid delays in the routine processing operations.
 - Certain administrations allow the lodgement of goods declarations and initiate a number of processes (such as risk management) prior to the arrival of the goods, or even prior to their loading/departure. Customs may either assess the information or request it in relation to cargo interventions before the actual arrival. Where the decision is made not to examine the goods, the latter may be released by Customs even before their arrival, or at the moment of arrival, depending upon national legislation.
 - Administrations may also choose to measure the steps in the pre-arrival process itself, i.e. the difference between the time of the lodgement of the goods declaration and the time that Customs grants the actual release of the goods. These time-stamps would have to be included in the automated system or the questionnaire form in such a manner as not to distort the results of the processing and release of goods after arrival.
 - As indicated earlier, a recommended way to collect the data is to use both of the two available options, i.e. a hybrid approach, but only when there is not a fully automated environment. It is important to bear in mind that Customs and the other stakeholders involved in the clearance process might all have different automated processes involving computer systems or other electronic means, and that a more precise approach to collecting data will be to extract it from the different computer systems or electronic devices, and to integrate it with the data collected manually.

- In countries where the clearance process takes place using the Single Window system, significant data is concentrated in that system. In the Single Window environment, it is important that the data is collected in a structured manner for the purpose of TRS analysis. In essence, less manual data will be required to be collected in a Single Window environment, depending on the level and number of other government agencies and stakeholders involved or interfaced with the Single Window. Data relating to peripheral processes (i.e. outside the Single Window environment) should therefore be collected using the TRS-designed form. Alternatively, additional electronic devices may be accessed or used to obtain relevant data.
- In capturing and recording the time, a 24-hour clock should be used in order to facilitate subsequent calculations. For example, if the time is given in a day/week/month format as part of a certain process, it should be converted into a 24-hour format by using the relevant statistical approach. Similarly, it is essential to ensure that a standard date format is used, especially when data is collected from various systems.

121. In instances when arrival, release or other times in a manual or automated system are already recorded as part of normal document processing, the sample data could be collected retrospectively. This would eliminate the need to collect data on a pre-designed form during the release process itself, and also avoid any identification of the samples to those involved in releasing them. This historical measurement has certain advantages over live transactions, in that monitoring actual movements may delay or accelerate release times because staff are aware that their activities are being recorded.
122. However, it is also important to recognize that long historical measurement might have disadvantage when comparing with more recent or actual data. The reason for this is that the time taken can be much easier explained in the context of latter.
123. Administrations with automated clearance systems should use those existing systems to capture the time-stamps at each step in the clearance process. Where an administration does not have an automated clearance system but intends to develop one, it should incorporate the time-stamps for each step of the clearance process in the automated system once the latter has been developed.

3.3. Phase III – Analysis of data and conclusions

A. Verification of data

124. It is important to note that any analysis using raw data can only be accurate if all the required data is captured and is of a high quality. Accurate data not only means that it is factual, but also that it is sufficient to cover relevant processes, intervention points, actions and interventions related to the flow process, so that it can be analysed within the context of the TRS. It might be necessary and useful to look at recorded data captured from previous TRS cycles to understand and follow a common approach for a comparative analysis.
125. Data that has been entered with errors, or using a different method than in the agreed parameters, will distort the results of the analysis. It is therefore essential to verify the quality of the data by ensuring that it is captured accurately. This can be done by verifying the sequence and structure of the data (if possible, for all the transactions, or randomly) before analysing it. It is also important to take into consideration the business process model related to the flow process of cargo.
126. Data collected using the questionnaire may be less accurate than that collected using computer systems or other electronic devices. In this regard, the Working Group may like to ascertain the level of accuracy of manually captured data by carrying out the manual collection of data using questionnaire forms for a few intervention points, and then automating these and comparing the results. This should normally be done during the test run step.

B. Analysis of data

127. When the situation requires, and it is possible to collect both manual and automated data, it is advisable to do a preliminary check of the data by separating automated procedures from manual ones. However, the time taken for each process, action and intervention – either manual or automated – should be merged in a structured manner and analysed using a holistic method.
128. Past experience indicates that it is possible to explore alternatives for data analysis, such as the use of Excel or other analytical software. The use of WCO TRS software is recommended for data analysis and for producing statistical reports. “A Basic Guide to the Use of the WCO TRS Online Software” can be found in Appendix -4.
129. The TRS software facilitates the compilation and analysis of the data captured, which is crucial for a TRS. It gives concrete results based on the data which is insert.
130. The initial results from data analysis should, where necessary, be followed up with stakeholders and participants in the supply chain to validate findings and identify underlying reasons for certain behaviours. For example, factors influencing the timing of lodgement of Customs declarations by importers or their service providers should be explored.
131. Depending on the Study objectives, the average time taken for all goods may be calculated, and subsequently for a combination or multiple combinations of independent variables. For example, the aim may be to find the difference in the time taken to release goods declared manually and those declared electronically. Further calculations could be made to find the difference between the times for these two types of declaration in the context of specific processes. These calculations could be repeated for a multiple number of combinations, for example, comparing release times of AEO and non-AEO consignments.
132. The results obtained can then be studied to ascertain if they meet the requirements of the Customs administration and/or the expectations of stakeholders/clients, and to suggest possible improvement measures.

C. Final Report

133. The TRS Working Group should finalize the Report of the Study within the established time frame (which is often included in the TRS Action Plan as part of the preparation for the Study). It is crucial that the TRS Report be factual, relevant and to the point, particularly in terms of addressing the problems considered to be the source of delays in the cargo flow process.
134. Although the Working Group is free to draft a Report which it considers reflects the country’s actual situation and context, a typical TRS Report should include the objectives of the Study, the methodology used, the number and names of stakeholders involved, the analysis of data, the findings, and the recommendations for improving the flow process of cargo, taking into account the scope of the Study. A model format of a TRS Report is in [Appendix 5](#).
135. Furthermore, it should allow for a subsequent TRS cycle to take place once the main recommendations from the previous TRS have been implemented. This will ensure coherence and sustainability when conducting future Time Release Studies.
136. As indicated earlier, a simply TRS approach is often used to measure the single busiest port/border crossing point; a “simultaneous” TRS is a Study conducted at the same time for different locations and modes of transport within a Customs territory; and a “consecutive” TRS is a Study conducted in different locations at different points in time.
137. A single TRS Report will enable policy and decision-makers to read just one Report instead of multiple Reports. It will also enable them to take a holistic view when discussing and finalizing corrective policies and operational measures included in the Report by the Working Group. It is recommended that – whether the TRS is conducted simultaneously or consecutively – one TRS Report be prepared that captures the complete Study.

138. Although the TRS Working Group will have to write its own Report, based on its specific requirements and specificities, the structure of a possible TRS Report is set out in Appendix 5 as a reference. This can be adapted to the circumstances in which the performance of a particular Study or Studies takes place.
139. When drafting the Final Report, the Working Group should include an Action Plan on the measures to be implemented. The Plan should be based on issues identified during the TRS and the categorization of various trade facilitation measures under the WTO TFA. Additional measures can be added, where needed. All suggested measures can then be prioritized, based on the national strategic planning and sequencing of trade facilitation measures, and/or on their consolidation/enhancement. Appendix 5 outlines a possible TRS Report structure, whilst Appendix 6 contains a model National Action Plan.

D. Press release and/or presenting the Report in forums

140. In the spirit of transparency and cooperation, the results of the Study should be made available to all participating and relevant parties, thereby encouraging direct/indirect intervention to address identified bottlenecks/problems.
141. As part of the larger outreach effort and the dissemination of information concerning ongoing efforts to improve the cargo clearance process, the TRS Report should be made available to the public and – given that all actors in the cargo clearance process normally need to improve on an ongoing basis – it should not rank trade stakeholders or countries on their performance.
142. It is recommended that the Working Group draft a press release on the key outcomes of the Study Report and make it available to all the Study stakeholders for information. If possible, it should also be made available to the general public, as a way of increasing transparency with regard to Customs and related procedures, as well as highlighting the challenges in the cargo clearance process. Additionally, sharing the Report in the form of a press release demonstrates, among other things, Customs' commitment and ongoing efforts regarding trade facilitation.
143. In some instances, the press release could be issued in the context of an exit conference, where trade stakeholders and others are invited to discuss issues related to the Study, including challenges and opportunities which have arisen in conducting a TRS. However, the press release could be a simple paper, informing of the outline and key outcomes of the Study. A model of a simple press release is in [Appendix 7](#).
144. It is important to note that, for those countries which enjoy the benefit of special and differential treatment under the WTO TFA, their sharing of TRS Reports with relevant international bodies, such as the WCO, can provide opportunities for further technical assistance and support in implementing the Study recommendations. This may be required to avoid duplication of effort and resources, as well as to better define priorities for optimal utilization of resources.
145. Customs administrations are encouraged to communicate to the WCO the results of the TRS, as reflected in the Final TRS Report, within a reasonable time period in order to enable the WCO to analyse and better understand the work done, and to better advise the administration on key issues emanating from the Study.
146. If the Customs administration desires, the WCO can provide opportunities for the Report to be shared with the international Customs community in meetings and forums, such as the WCO Permanent Technical Committee, the WCO Working Group on the Trade Facilitation Agreement, and at WCO-organized global events.

3.4. Phase IV – Monitoring and evaluation

A. Level one: National and regional monitoring and evaluation

147. It is recommended that Customs administrations create a mechanism that will ensure continuous monitoring and evaluation of the implementation of recommendations listed in the TRS Final Report. It is advisable that the entity responsible for monitoring and evaluation be recommended by the TRS Working Group, in consultation with higher-level decision-makers in the respective Customs administration.
148. As a number of Customs administrations have conducted a TRS before, and are performing Studies in cooperation with other stakeholders, there is anecdotal experience that can facilitate the process of monitoring and evaluation. In a national context, the Working Group can consider, among other things, the following suggestions:
- Recommending that the TRS monitoring and evaluation exercise be done via a National Committee on Trade Facilitation (NCTF), which could ensure that the recommendations are implemented by Customs and all other trade stakeholders in a coordinated and efficient manner; and
 - Proposing that Customs monitor and evaluate the implementation of all the recommendations on an ongoing basis at a more operational level.
149. Although two approaches are suggested above, it is equally possible for the TRS Working Group to explore other options for monitoring and evaluation. However, considering the national priority given to implementation of the WTO TFA as part of a “whole-of-government” approach, and the multi-stakeholder nature of the National Committee on Trade Facilitation, the first of the two suggestions seems to be the best option for monitoring and evaluating the TRS results and ensuring the implementation of its recommendations. In countries where a NCTF already exists or where progress is being made towards establishing this type of Committee, Customs should play an important role on the Committee, including in the monitoring and evaluation of a TRS. Legally, the Committees are often constituted with a firm mandate to work, and coordinate national efforts, towards further trade facilitation.
150. The Committee could conduct monitoring and evaluation through regular feedback from all the relevant government agencies and private sector stakeholders. For example, the Committee could ask each stakeholder to describe its progress in implementing its respective recommendations resulting from the TRS.
151. In countries where the establishment of a NCTF is not on the government’s immediate agenda, the Working Group should recommend that Customs monitor and evaluate the recommendations listed in the TRS Report, in close coordination with all the relevant stakeholders. Customs, within its sphere of competence and power, should create the most convenient mechanism to engage in discussion with those stakeholders.
152. In situations where the Study goes beyond national borders, the Working Group may consider recommending that a regional economic community or a joint grouping of countries involved, which fits within the context of the Study, monitor and evaluate the implementation of recommendations. If it is proving challenging to find a suitable regional framework, the Working Group may recommend that Customs administrations carry out monitoring and evaluation at the respective national level.
153. If the task of monitoring and evaluation is assigned to a regional economic community, trade stakeholders related to the specific region have to provide regular updates and feedback, using the appropriate national channels. The updates can be given at the national level and presented at regional meetings on Customs or trade issues.
154. When monitoring and evaluation are carried out by the respective Customs administrations of the territories where the Study was conducted, each Customs administration must consult trade stakeholders. It must then provide the other Customs administrations with feedback on the implementation of the recommendations pertaining to it as a result of the TRS. The updates can be given at ad hoc and/or regular meetings between all the Customs administrations involved.

B. Level two: WCO assessment of the TRS Report and recommendations

155. This level is optional. Customs administrations may like to share their TRS Report, reflecting the national or regional context, with the WCO for its assessment. This will not only assist them in identifying any gaps in the Study conducted, but will also help in allocating resources for future Time Release Studies or trade facilitation activities, as needed. At the request of the Customs administration involved, the WCO will provide a thorough assessment of the TRS carried out within the national or regional context.
156. In performing the assessment, the expert(s) will, if the Customs administration involved agrees, use previous TRS Reports and evaluate the degree of improvement of Customs and other actors.
157. If asked to assess the methodology and accuracy of any TRS conducted, the WCO may, at the request of the Customs administrations involved, and taking previous TRS Reports into consideration, provide the administrations with a letter indicating the extent of conformity of the TRS with the TRS Guide, and confirming their accurate use of WCO TRS methodology.

Next cycle of the Time Release Study

158. TRS is a continuous improvement cycle that should be conducted periodically. However, once a TRS is conducted, the subsequent TRS should take place only after a reasonable period of time, when key recommendations from the previous Study have been implemented. It is recommended that the knowledge and expertise gained from the previous TRS be captured and applied to enhance future Studies.



APPENDICES¹

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¹ Please note these are guidelines only and do not always need to be followed precisely. You may choose to use some and not others, and if you feel it is appropriate, the guidelines can be adapted to suit your particular border environment. If you need further assistance or clarification about how to apply the appendices, please contact the WCO Secretariat (see contact details on the last page).

APPENDIX 1 – CHALLENGES AND WAY FORWARD

1. When conducting a TRS, either with or without the involvement of other international trade stakeholders, Customs are likely to be exposed to a number of challenges, problems and/or complications. These often arise because the TRS generally entails some level of complexity, regardless of whether the Study is carried out nationally, regionally or multilaterally.
2. Although the number of challenges or difficulties encountered while conducting a TRS can vary widely, when challenges do arise they are likely to come from different sources, some of which are more common than others. Due to possible complications while conducting a TRS, it is recommended that Customs administrations familiarize themselves in advance with some of the potential challenges, problems and/or complications, and also with the various possible ways of addressing them.
3. A list of such potential challenges, problems and/or complications is below, with possible ways of either mitigating or resolving them. It draws on the past experience of some WCO Member Customs administrations in carrying out a TRS, and on possible problems that have been foreseen. The list is not at all exhaustive, but provides a basic options for Customs administrations to consider in advance when preparing for a TRS.

A. Customs officials who are Members of the TRS Working Group are unable to devote time to the TRS project

4. In the experience of many countries, when the TRS project is fully implemented by a Customs administration, without support from consultants and private companies (which is the ideal scenario), it is imperative that Customs officials who are Members of the Working Group be given adequate time to focus on the project, even if they have other responsibilities or activities. However, there are cases where adequate time is not given for Customs officials to implement TRS projects. Inadequate time to prepare and implement the TRS frequently occurs due to issues such as employees being allocated several tasks at the same time, and to a lack of motivation and cooperation within Customs.
5. To resolve the above problems, strong Customs leadership is very important, and should preferably go beyond simply addressing the issue of inadequate time resources. It is recommended that, at the very outset of the project, Customs administrations designate officers with the right skills and competences to be part of the TRS Working Group. The Head of the Customs administration should monitor the project on a regular basis, and he or she should nominate someone with the right profile to manage the team.
6. In situations where the designated officers are unable to dedicate enough time to the project, they should either be released from some of their existing duties, or be released entirely from their other work to focus on the TRS project. The leader or the coordinator of the project should be able to contact the Head of Customs easily and directly, and if possible, he or she should be the person reporting to the Head of Customs.
7. During a TRS cycle, it would be preferable for reorganization of Customs staff not to affect staff members who are assigned to the TRS Working Group. If one or two Members of the Customs Working Group are reallocated elsewhere, there should be a mechanism to replace them as quickly as possible.

B. Inadequate cooperation with the relevant stakeholders

8. Establishing a Working Group with the mandate to carry out a TRS is a determining factor in the success of any TRS cycle. As outlined in the TRS methodology, it is one of the first steps in preparing for any TRS when the Working Group from one cycle cannot be maintained for the next.
9. A complete TRS cycle is a comprehensive process which entails several activities, and the need to create a Working Group led by the Customs administration should be considered to be one of the top priorities in conducting a Study. However, creation of a Working Group is only effective if it comprises the relevant players with a key role in the cargo, information or finance flow process. For example, it might not be sensible to conduct a national TRS focusing on maritime transport without involving the national port authority if it holds relevant data.

10. Bearing this in mind, it is recommended that Customs administrations liaise with the most relevant players with a key role in the cargo flow process. Discussions with key trade stakeholders, including the private sector, should be held at a very early stage to ensure that they feel involved, and have a role to play in the process. Involving stakeholders at the earliest possible stage will also give them “ownership” of the TRS project.
11. On the other hand, in some cases, Customs might face problems due to a lack of cooperation from stakeholders. In some of the TRS Reports received by the WCO, the Organization noted that Customs faced difficulties in securing cooperation from other trade stakeholders, including other government agencies (OGA). One of the things reported in such cases is that lack of cooperation slows down the process of conducting a TRS. Inadequate cooperation may arise from different quarters, but on many occasions involves either the private sector or other government agencies – sometimes even both. Nevertheless, if it involves the private sector, this is much easier to address.
12. If the issues arise from the private sector side, it is important to emphasize the benefits that the sector is likely to gain when Time Release Studies are conducted periodically. Such benefits range, for example, from reducing trade bottlenecks (thus leading ultimately to trade facilitation), to reducing trade transaction costs. In the worst-case scenario, Customs administrations may wish to consider ways of enforcing private sector cooperation under their respective national legislation.
13. If the lack of cooperation emanates from another government agency, it is recommended that Customs strengthen their relationship with the non-cooperating institution, or obtain support from a government body with the power to instruct all other trade stakeholders to cooperate. Political will is the crucial way of ensuring positive cooperation on the part of OGA. Indeed, political will is sometimes needed at the highest government level, i.e. from the President's or Prime Minister's Office, given the insufficient authority of Customs as a border agency.

C. Lack of data to carry out TRS at the national and regional level

14. Data is a significant asset for government and business alike, and it can be defined and used for multiple purposes, including when countries conduct a TRS. Data is vital to the TRS – indeed, one cannot be carried out nationally, regionally, or multilaterally without it. As indicated previously, TRS data can be collected manually or electronically: in the former case, with the aid of paper survey forms which circulate along the clearance points or circuits, in the latter, through different electronic systems.
15. TRS implementation involves, amongst other things, the capture of data or time records in respect of the intervention of one or more trade stakeholders. Such data therefore needs to be collected manually or electronically from different sources to calculate the average time between the arrival of cargo and its physical release. However, there have been situations in which the application of TRS methodology has gone beyond simply capturing data on the Customs administration's intervention, and trade stakeholders have been unwilling to share their own data with the TRS Working Group.
16. One reason for the reluctance of trade stakeholders to share information, especially with local government institutions or on an intergovernmental basis, is data protection (although other reasons are also likely). One of the quickest ways to address this issue is to provide a clear explanation of the purpose of the Study, the type of data, and how the Study can potentially provide value-added to all trade stakeholders, including those who are unwilling to share their data. When this solution is not enough to resolve the problem, other options can be explored, particularly the possibility of looking at existing national legislation or proposing national or intergovernmental Memoranda of Understanding between the parties involved, with clear guidelines on the implications of using the data for a purpose other than that agreed.
17. As the issue of data protection may take time to resolve, the Working Group should openly discuss it at the earliest stage of preparing for the TRS, and explore quick ways of dealing with the problem so that possible solutions can subsequently be found much more promptly.

18. It is also possible that TRS data is available, but is not collected appropriately or is not reliable. In this case, the Working Group should first analyse the data, then assess it. If the data has been collected manually, one of the first options could be to assess whether it would be prudent to repeat the data collection process. When electronic data is still available, it might perhaps be more realistic to obtain the data in electronic format. The digital revolution is generating exponential opportunities for electronic data access, capture, aggregation and analysis, and so the expectation of more effective Time Release Studies can now be met.

D. Agreeing on the TRS Report

19. After carrying out the different activities, including collecting, gathering and analysing TRS-related data and drafting the TRS Report, it can sometimes be a challenge to actually agree on the content of the Report. A TRS Report should clearly reflect the work which was carried out, and contain relevant information on, inter alia, the reason for conducting the TRS, the activities performed by the Working Group in order to conclude the TRS cycle, statistical analyses and results, findings and recommendations.

20. The Report should be factual and identify all of the potential bottlenecks hindering trade. As the Report should contain factual information, and will often reveal unacceptable practices, the parties involved will not always agree on its content and structure. This is particularly the case when the problems which have been exposed during the Study clearly indicate that a particular non-private sector party bears some degree of blame for a specific or overall delay.

21. In the event that the final TRS Report cannot be agreed among all trade stakeholders, the worst-case scenario is that, ultimately, a decision is made not to agree on the Report, thereby invalidating all the work done. This situation cannot normally be resolved, and all the stakeholders will then agree not to release the Report.

However, a less problematic situation might be that trade stakeholders disagree on the Report, but do not demonstrate an intention to abandon it. In such cases, or when there is misunderstanding, it is important that stakeholders with concerns present a valid, evidence-based argument to justify their view. Similarly, the TRS Working Group members who hold different positions should also be able to justify the facts in the Report or to present some other kind of evidence. In both situations, refusal to accept release of the TRS Report, or disagreement on the Report, should be handled with a great degree of sensitivity, and it is important to avoid conflicts

APPENDIX 2 – THE TRS WITHIN A COUNTRY ENVIRONMENT

A. General functions and responsibilities of the Working Group

1. The Working Group should be given the authority by the Customs administration or NCTF to take all the decisions deemed necessary for implementation of the Study.
2. A Customs official at senior management level should head and chair the Working Group, and should have an understanding of the national trade environment. The chair should provide regular updates to the Customs authority and/or NCTF regarding work on the TRS, to ensure that management are aware of how work is progressing and of possible challenges.
3. The Working Group should consist of an optimal number of members to ensure the efficiency of the Study. The experience of Members to have conducted a TRS indicates that past Working Groups have consisted of around 12 members. An information session may be necessary to brief all the interested parties about the Study.
4. Certain members of the Customs administration may be considered key to the Working Group. The latter should include one or two specialists in each of the following fields:

- Customs procedures;
 - Organizational matters and administrative structures;
 - Statistics; and
 - Computers (a computer specialist may be useful even if manual procedures form the basis of the Study, since analysis of the results could be carried out by computer).
5. In order to maintain the Working Group's efficiency, its members may have more than one role. For example, a statistician/computer specialist may be the same person, as may the chair/Customs procedure specialist.
6. If the Study is concentrated solely in one or in a very small number of Customs offices, the heads of these offices should participate in the Working Group. The heads of other Customs offices which are not participating in the Study could also be invited to participate in the analysis of the results. However, if the Study is conducted in the area of jurisdiction of a particular Customs office, then it is imperative that the head of that office attend the analysis of the results, or appoint someone else to do so. This will aid impartiality, as well as help in the Study's actual execution.
7. The Working Group should familiarize itself with its Terms of Reference, in particular the objectives and outcome of the Study, so as to ensure that there is no deviation from the specific output expected of the Group.
8. The Working Group should also prepare detailed instructions and guidelines which cover the creation, review and validation of the TRS Work Plan, and which comprise the following:
- Aim of the Study;
 - Scope and methodology;
 - Duration and timing of the Study, including a timetable for the preparation and execution of the Study and the presentation of the Final Report to the Customs administration;
 - Sampling size and sampling selection methods (where a sampling method is used);
 - TRS questionnaire form for the data to be collected manually;
 - Instructions and guidelines for the collection of data manually or electronically;
 - Method for calculation of the results;
 - Allocation of responsibilities for collection of data by individual parties and within each unit;
 - List of definitions to ensure uniformity and consistency in implementation;
 - Procedures to be followed for manual and automated procedures or for a combination of both;
 - Person(s) to be contacted where clarification is needed; and
 - Software to be used for data analysis.
9. The instructions and guidelines should be provided to the following persons or groups:
- Customs officials and other stakeholders in the office where the Study is to be conducted;
 - Customs staff and other stakeholders who will be directly involved in recording and collecting the data for the Study;
 - Customs staff and other stakeholders who are not involved in the Study but who are involved in the operations where the Study is to take place, to ensure the smooth implementation of the Study; and
 - Any others necessary.
10. To enable the Study to proceed smoothly, the Working Group should identify the following:
- Only relevant processes and events in the clearance chain;
 - All the documents required for the clearance process;
 - The data to be collected and its source, as well as by whom and how;
 - How the evaluation of the data is to be done;
 - The release times to be captured and evaluated in terms of the type of traffic and goods;
 - Whether the data to be captured identifies the reasons for any delays; and
 - Whether the evaluation will be based on capturing the total time and/or capturing each intervening process.

11. The Working Group should be particularly sensitive to the anxieties and fears that employees might have concerning this Study. It is suggested that the Group prepare an information paper detailing the importance and advantages of the Study to the organization, with a special focus on those elements that will help to dispel any misgivings which staff might have as to the Study's outcome or as to their interests. This paper may include information on the expected improvements in processes and procedures, and the benefits that staff would gain, as a result of the Study.

12. The Working Group should meet as often as necessary to discuss the following tasks:

- Ensure that all the decisions pertaining to the Study are taken in a timely manner;
- Review progress and determine the steps to be followed;
- Use the WCO TRS online software for the input and calculation of data;
- Analyse the results;
- Compare the results with data from previous Studies or pre-set standards, if any;
- Prepare the draft TRS Report, including proposals for improvements; and
- Present the results of the Study to the Customs administration and other agencies involved in the clearance process, and consider releasing the final TRS Report to the general public.

B. Establishing the Working Group

13. When developing a TRS coordination mechanism, it is recommended that the national Customs administration act as the agency with overall responsibility for coordinating the TRS process. Customs should ideally have policy or administrative responsibilities that are relevant to the trade process, as well as the capacity to support and drive TRS implementation.

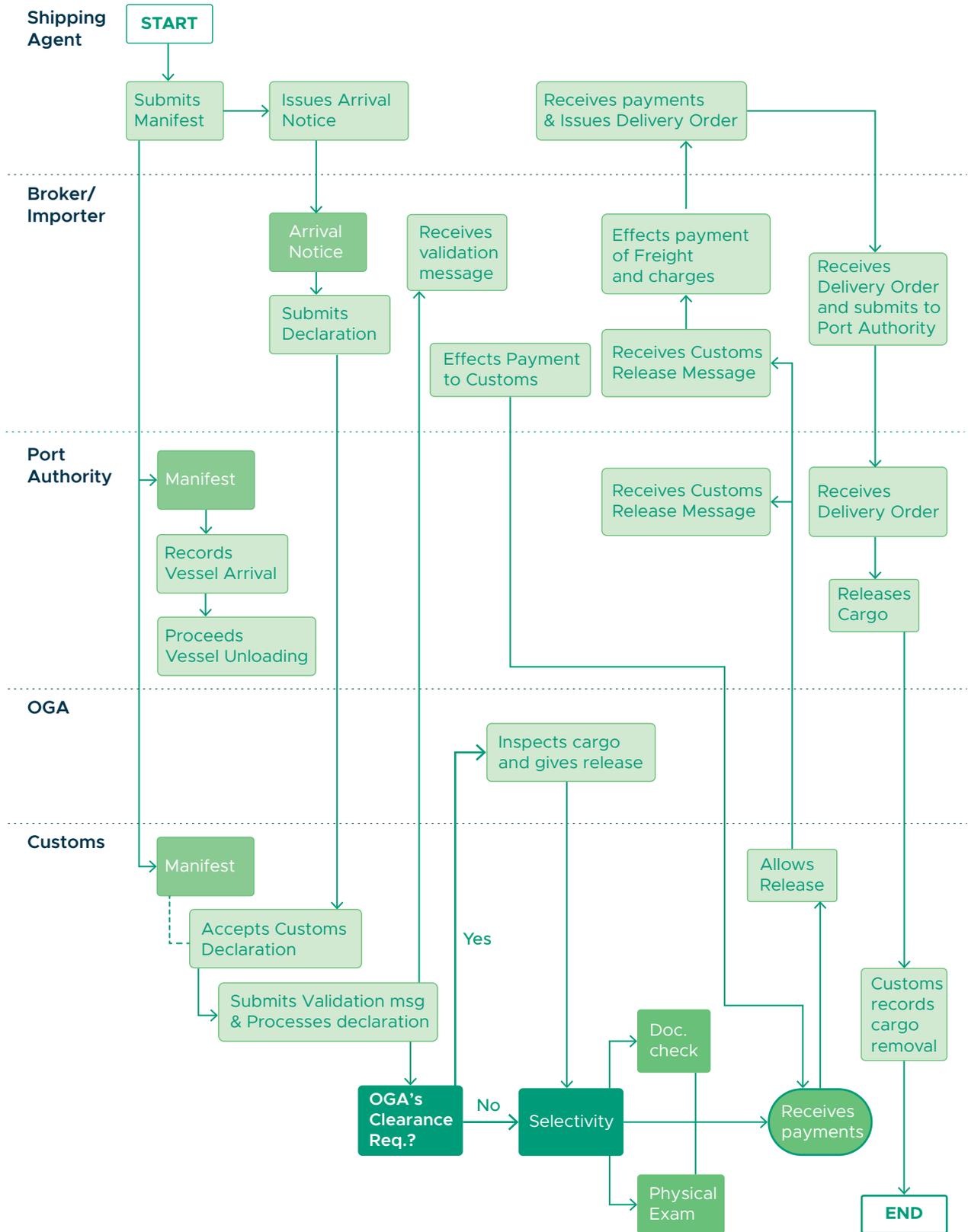
14. Having decided on the appropriate stakeholders to include, the next step is to establish the TRS Working Group for effective implementation of the TRS, obtaining expertise and timely input from all relevant stakeholders. Once the TRS Working Group is created, it may first approach existing frameworks and obtain information on the objectives, methodology, expected outcomes and utilization of the outcomes which the Customs administration will be in a position to give.

15. Next, the Working Group should convene a meeting of the nominated agency representatives. At the meeting, it should outline the roles and responsibilities of the contact points, communication protocols, logistic arrangements, the schedule for subsequent meetings of the Working Group, and any other administrative matters impacting on the implementation of the TRS.

16. The general functions and responsibilities outlined earlier in this Appendix should be adhered to. They can be applied in all circumstances but might progressively become routine as countries conduct Time Release Studies periodically and in a consistent manner. However, it is recommended that staff who have been involved in previous Studies take part in the subsequent TRS as well, to ensure consistency and coherence.

C. Business processes with respective questionnaire forms

Model of Sea Business Process and its Questionnaire



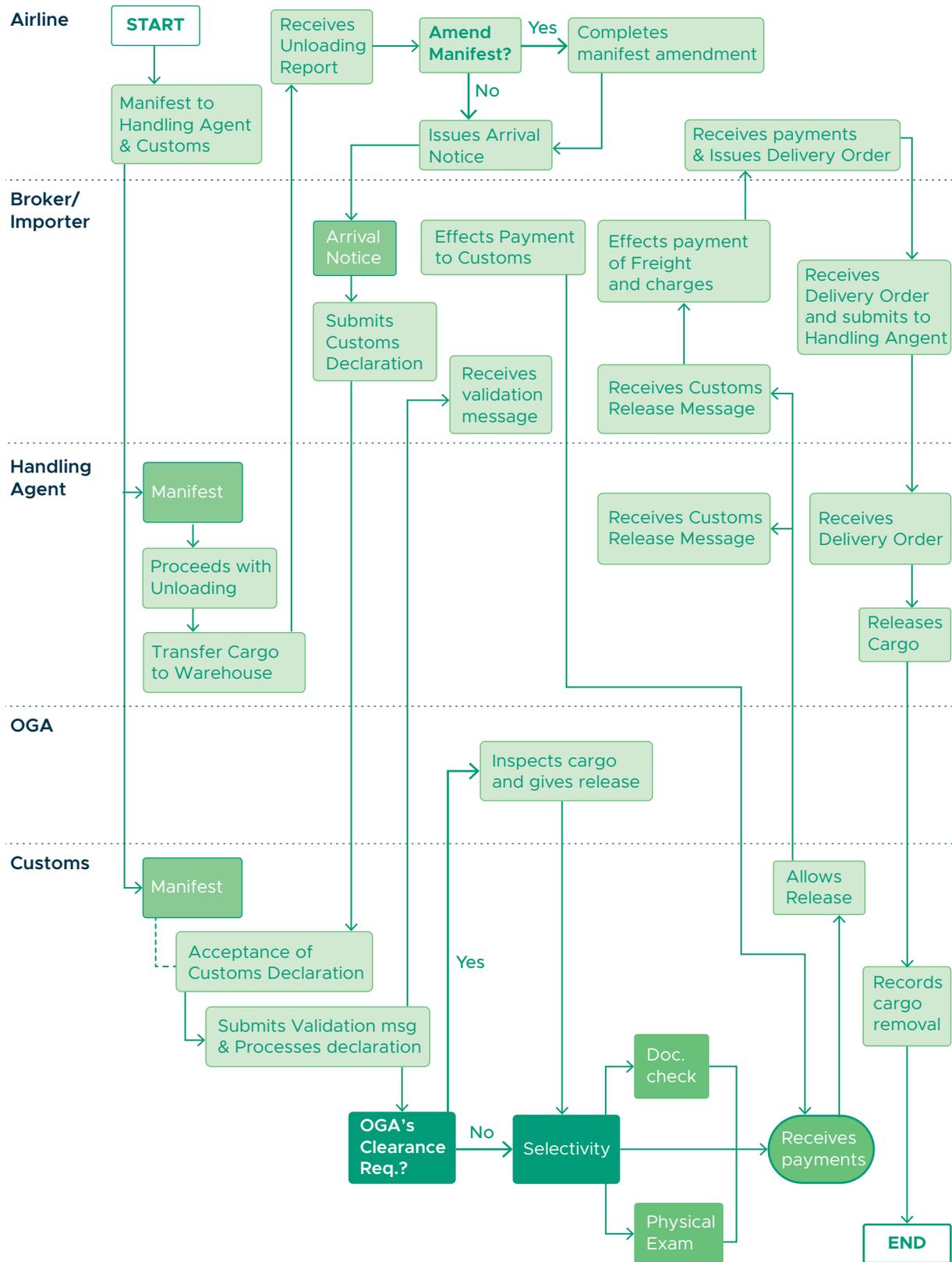
Time Release Study – Sample Questionnaire for Sea Cargo FCL

Identification *	
1. Office *	Office A <input type="checkbox"/> Office B <input type="checkbox"/> Office C <input type="checkbox"/>
2. Shipping Agent *	-
3. B/L Number *	-
4. Broker ID *	-
5. Goods Declaration ID *	-
Goods arrival and declaration submission *	
6. Manifest Submission *	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
7. Vessel Arrival *	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
8. Start of Unloading *	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
9. End of Unloading *	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
10. Declaration Submission *	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
OGA Inspection	
11. Agency	Health <input type="checkbox"/> Agriculture <input type="checkbox"/> Veterinary <input type="checkbox"/> Standard Bureau
12. Start of OGA Inspection	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
13. End of OGA Inspection	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
Processing by Customs *	
14. Declaration Channel *	Green <input type="checkbox"/> Yellow <input type="checkbox"/> Red <input type="checkbox"/>
15. Start of Documentary Check	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
16. End of Documentary Check	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
17. Start of Physical Inspection	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
18. End of Physical Inspection	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min

19. Receive Payment for Duty and Taxes	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
20. Customs Release *	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
Processing after Customs release *	
21. Payment of Freight and Charges *	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
22. Issue of Delivery Order *	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
23. Submission of Delivery Order to Port Authority *	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
24. Cargo Release by Port Authority *	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
25. Physical Release *	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min

* = Mandatory – if indicated for a section, mandatory questions for the section must be completed; if indicated for a question, the question must be completed if the section is used.

Model of Air Business Process and its Questionnaire



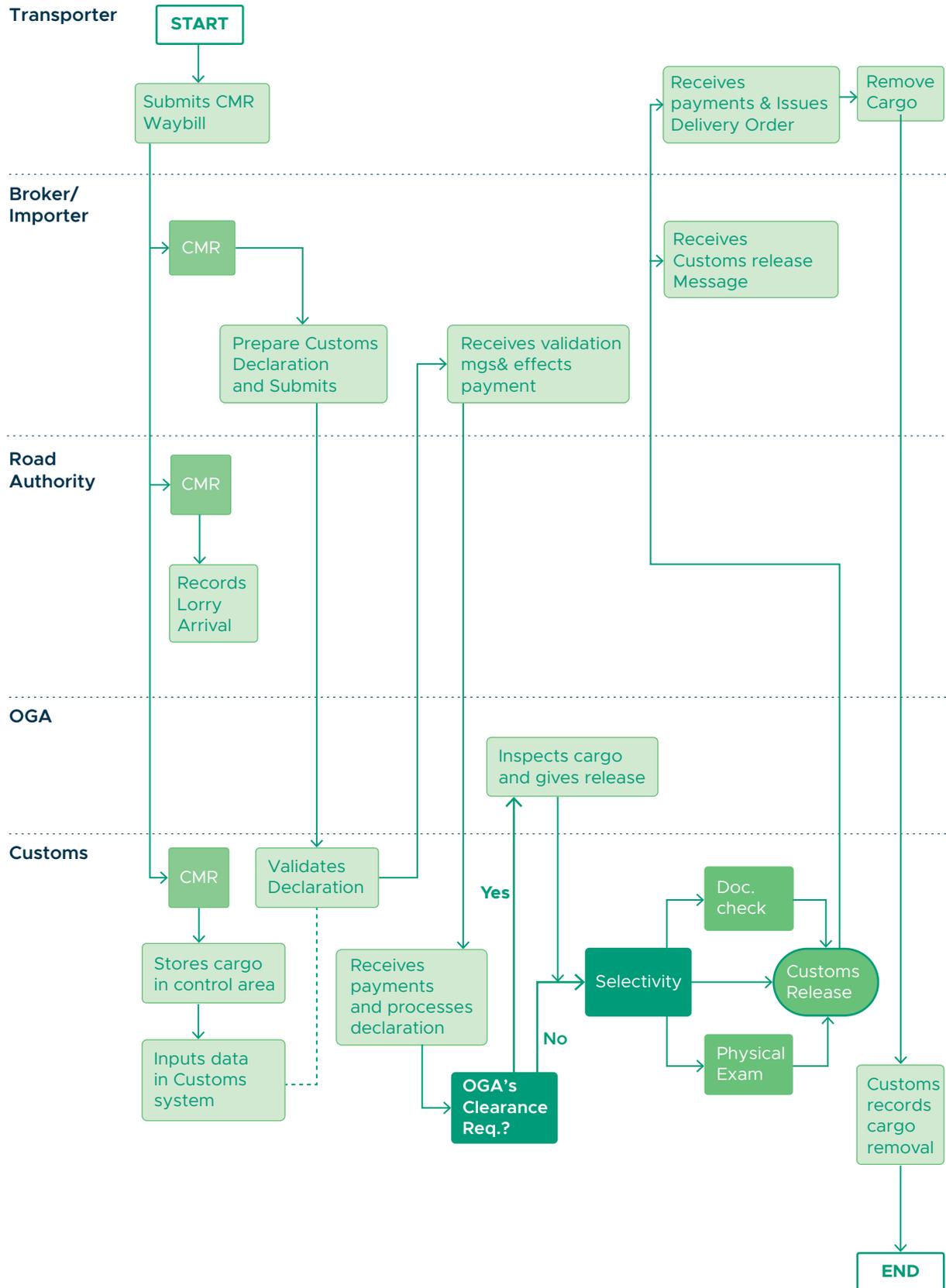
Identification *	
1. Office *	Office A <input type="checkbox"/> Office B <input type="checkbox"/> Office C <input type="checkbox"/>
2. Airline *	-
3. AWB Number *	-
4. Broker ID *	-
5. Goods Declaration ID *	-
Goods arrival and declaration submission *	
6. Manifest Submission *	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
7. Aircraft Arrival *	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
8. Start of Unloading *	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
9. End of Unloading *	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
10. Start of Transfer to Warehouse *	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
11. End of Transfer to Warehouse *	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
12. Manifests Amendment	Yes <input type="checkbox"/> No <input type="checkbox"/>
13. Completion of Manifest Amendment	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
14. Declaration Submission *	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
OGA Inspection	
15. Agency	Health <input type="checkbox"/> Agriculture <input type="checkbox"/> Veterinary <input type="checkbox"/>
16. Start of OGA Inspection	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
17. End of OGA Inspection	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min

* = Mandatory – if indicated for a section, mandatory questions for the section must be completed; if indicated for a question, the question must be completed if the section is used.

Processing by Customs *	
18. Declaration Channel*	Green <input type="checkbox"/> Yellow <input type="checkbox"/> Red <input type="checkbox"/>
19. Start of Documentary Check	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
20. End of Documentary Check	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
21. Start of Physical Inspection	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
22. End of Physical Inspection	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
23. Receive Payment for Duty and taxes	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
24. Customs Release *	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
Processing after Customs release *	
25. Payment of Freight and Charges *	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
26. Issue of Delivery Order by Airline*	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
27. Submission of Delivery Order by Warehouse *	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
28. Cargo Release by Warehouse *	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
29. Physical Release *	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min

* = Mandatory – if indicated for a section, mandatory questions for the section must be completed; if indicated for a question, the question must be completed if the section is used.

Model of Road Business Process and its Questionnaire



Time Release Study – Sample Questionnaire for Road Cargo

Identification *	
1. Border Post*	Border Post A <input type="checkbox"/> Border Post B <input type="checkbox"/> Border Post C <input type="checkbox"/>
2. CMR Waybill Number*	-
3. Broker ID*	-
4. Goods Declaration ID*	-
Goods arrival and declaration submission *	
5. CMR Submission*	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
6. Lorry Arrival*	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
7. Storage in Customs Control Area*	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
8. Declaration Submission*	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
9. Payment of Duty and Taxes*	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
OGA Inspection	
10. Agency	Health <input type="checkbox"/> Agriculture <input type="checkbox"/> Veterinary <input type="checkbox"/>
11. Start of OGA Inspection	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
12. End of OGA Inspection	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
Processing by Customs *	
13. Declaration Channel*	Green <input type="checkbox"/> Yellow <input type="checkbox"/> Red <input type="checkbox"/>
14. Start of Documentary Check	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
15. End of Documentary Check	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
16. Start of Physical Inspection	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
17. End of Physical Inspection	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min
18. Customs Release*	<input type="checkbox"/> day <input type="checkbox"/> mth - <input type="checkbox"/> hr <input type="checkbox"/> min

Processing after Customs release *	
19. Release of Customs Release by Tranporter *	<input type="text"/> day <input type="text"/> mth - <input type="text"/> hr <input type="text"/> min
20. Physical Release *	<input type="text"/> day <input type="text"/> mth - <input type="text"/> hr <input type="text"/> min

* = Mandatory – if indicated for a section, mandatory questions for the section must be completed; if indicated for a question, the question must be completed if the section is used.

APPENDIX 3 – THE TRS WITHIN AN INTERNATIONAL/ REGIONAL ENVIRONMENT

1. The policy document “Customs in the 21st Century” (“C21”) identifies Globally Networked Customs (GNC) as the first of ten building blocks setting out the role and mission of Customs in the 21st century. This critically important concept provides a unifying means of bringing C21 to life, since every other building block depends upon effective communication, coordination and collaboration between Customs administrations globally.
2. GNC highlights the importance of mutual recognition and coordination protocols between exporting, transit and importing administrations to eliminate unnecessary duplication of controls within international supply chains. In this context, the International Convention on Simplification and Harmonization of Customs Procedures (as amended) (Revised Kyoto Convention), which is a WCO instrument, sets out provisions on juxtaposed Customs offices, cooperation at juxtaposed Customs offices, and new Customs offices at common borders.
3. In practice, one-stop and joint control arrangements, including the One Stop Border Post (OSBP), have been attempted or applied in some regions to further facilitate legitimate trade.

A. The Joint TRS at a bilateral level

4. This part of the Appendix has been developed for countries which desire to undertake a Bilateral TRS with a neighbouring country, including cases where the TRS is undertaken by a landlocked country alongside another country having the entry seaport, in order to provide standardized instruments for the Joint TRS.
5. The initial step for the two countries which desire to conduct a Joint TRS is to agree on creating a bilateral instrument in the form of a MoU or letter of intent, through which the countries concerned will express their determination to conduct the Joint TRS.
6. The MoU or letter of intent symbolizes the country’s national commitment to cooperate and conduct the TRS on a bilateral basis (i.e. within the context of two countries). It also serves as an instrument which can be used to encourage the private sector and other government agencies to cooperate and commit to the successful implementation of the Joint TRS. The MoU or letter of intent can be signed by the Ministry of Foreign Affairs or any competent state department, including the Customs administration of each respective country.
7. Each Customs administration, in consultation with other stakeholders, will nominate a representative from each country who will be responsible for coordinating the Study in that country and who will have the authority to engage with all relevant actors to be identified by each national Customs administration. The designated representative will report to the head of Customs at national level, who in turn will act as the government representative in relation to the Joint TRS. The representative should also coordinate his/her activity with the regional bloc in the context of the integration process, thereby possibly acting as a catalyst for the Joint TRS.
8. Each country, through the Custom administration or the NCTF, will create a national Working Group which will execute national actions for TRS implementation. If the countries have already conducted a TRS within a national or bilateral context, the previous TRS Working Group can be reinstated, and tailored, as necessary, to reflect the scope of the Joint TRS.
9. It is important to bear in mind that a Joint TRS can be very technical. The officials involved should not only be in a position to make decisions, but also have good technical knowledge of cross-border transactions.
10. In order to achieve a successful outcome to the Joint TRS, it is critical to engage the key stakeholders that intervene in the flow process of the cargo to be analysed, including the private sector, and to take their views into consideration. For example, in cases where cross-border corridors are operated by a private sector or semi-governmental organization, that organization should be involved in the Joint TRS so that transportation between the two countries can also be taken into account as part of the outcome.

11. Collecting data might be quite challenging in the context of a Joint TRS. However, it can be done by choosing one of the data collection methods indicated in Phase II of this Guide. As conducting a Joint TRS is more complex than conducting a TRS at national level, countries may sometimes temporarily employ Questionnaire Assistants to ensure that questionnaire forms are correctly completed, or to insert the times in the questionnaires themselves.
12. Ideally, once the Joint TRS has been conducted, a single Report, as per the model format of a Final Report (Appendix 5), should be produced.

B. The Joint TRS at a multilateral/regional level

13. This part of the Appendix has been developed for countries which desire to undertake a Joint TRS with multiple/neighbouring countries or with members of a regional economic community. A Joint TRS at a multilateral level can focus on two or more border posts, or even a transit corridor. Further, a regional economic community may give a mandate to its members to undertake a TRS within the bloc.
14. The initial step for the countries which desire to conduct a Joint TRS is to agree on creating a multilateral or regional instrument in the form of a MoU or letter of intent, through which the countries concerned will express their determination to conduct the Joint TRS.
15. The MoU or letter of intent symbolizes the countries' national commitment to cooperate and conduct the TRS. It also serves as an instrument which can be used to encourage the private sector and other government agencies to cooperate and commit to the successful implementation of the Joint TRS. The MoU or letter of intent can usually be signed by the Ministry of Foreign Affairs or any competent state department, including the Customs administration of each respective country.
16. However, in the context of a regional economic community, a regional trade instrument can be used to seek each country's cooperation. Regional economic communities are increasingly adopting Joint Time Release Studies as tools for strengthening the regional integration process and promoting intra-regional trade.
17. Each Customs administration, in consultation with other stakeholders, will nominate a representative from each country who will be responsible for coordinating the Study in that country and who will have the authority to engage with all relevant actors to be identified by each national Customs administration. The designated representative will report to the head of Customs at national level, who in turn will act as the government representative at the regional forum.
18. Each country, through the Customs administration or NCTF, will create a national Working Group which will execute national actions for the Joint TRS. If the countries have already conducted a TRS, the previous TRS Working Group can be reinstated, and tailored, as necessary, to reflect the scope of the Joint TRS.
19. As has already been mentioned above, due to the technical nature of a Joint TRS, the officials involved should have in-depth knowledge of cross-border transactions. Furthermore, in order for the TRS to be successful, it is imperative that all key stakeholders in the cargo flow process be involved.
20. Collecting data might be quite challenging in the context of a Joint TRS at multilateral/regional level. However, it can be done by choosing one of the data collection methods indicated in Phase II of this Guide. As conducting a Joint TRS is more complex than conducting a TRS at national level, countries may sometimes temporarily employ Questionnaire Assistants to ensure that questionnaire forms are correctly completed, or to insert the times in the questionnaires themselves.

Ideally, once the Joint TRS has been conducted within a regional economic community, each country's report will be used to produce a single TRS Report, as per the model format for a Final Report in this Guide. The Report should reflect the actual situation in each country where the Study was conducted, such as the time taken to accomplish the process, findings, bottlenecks and recommendations. Additionally, the single TRS Report should be comprehensive and list the crucial obstacles hindering intra-regional trade, with proposals for improving trade within the countries involved in the Joint TRS.

APPENDIX 4 – A BASIC GUIDE TO THE USE OF THE WCO TRS ONLINE SOFTWARE

1. User ID and Password from the WCO

The WCO TRS online software is available to all WCO Members free of charge. Upon request, the WCO Secretariat provides Members with a User ID and Password for the National Survey Administrator, which is valid for a single survey.

2. Log in to the TRS software

The Survey Administrator goes to <http://members.wcoomd.org/trs/index.asp> and inputs his/her User ID and Password to log in to the software.

3. User ID and Password for users in your administration

A Survey Administrator can allocate a User ID and Password to the other Survey Administrator(s) and End User(s) in his/her administration, so that they can also access the software for the single survey being worked on.

4. Developing a survey form (questionnaire)

The Survey Administrator develops a survey questionnaire in accordance with the detailed TRS conditions set up by his/her TRS Working Group.

5. Distribution of printed blank questionnaires

The Survey Administrator prints the blank questionnaires and distributes them to the officials responsible for TRS implementation, including those in other border agencies, as well as to businesses, where appropriate.

6. Inputting data into the TRS software

Having collected all the necessary data from the responses to the survey questionnaire, the Survey Administrator inputs all the data into the TRS software using the “New Data Input” and “Data Collection” functions. You can also allocate this task to an End User in your administration.

7. Developing a Report

Lastly, the Survey Administrator can use the “Quick Report” function to calculate automatically the Average Time, Standard Deviation and Largest Deviation in any patterns he/she designs. The “Full Data Excel” function allows you to obtain all data in MS-Excel format so that you can use it for various purposes.

For details, please see “User Manual: INTERNET SOFTWARE FOR THE TIME RELEASE STUDY”, which is available on the WCO Members’ Website at: http://www.wcoomd.org/members/files/Members%20PDF%20EN/FacilitationProced_PDF/TRS%20user%20manual-updated.pdf

APPENDIX 5 – MODEL FORMAT OF A FINAL REPORT

1. This model format is a guide to assist the Working Group in preparing a Report of the Time Release Study. The format proposed includes the main areas to be addressed in the Final Report. These areas are not exhaustive and countries may include any other details which reflect their own requirements and concerns.
2. Although raw data should prove very valuable, the Report should provide average times, supplemented by information on the category of goods, inspection channels, mode of transport, interventions by other government agencies (OGA), and use of pre-arrival processing, etc.
3. Depending on the objectives, the TRS Report requires dynamic, as well as static, data: e.g. how backlog cargoes are processed, congestion, peak-time and non-peak time, hourly or daily patterns of traffic and transportation. Statistical data processing models (mean, median, mode, range, how to define extreme data, etc.) may also be useful for inclusion in the Report. In this regard, a Working Group member specializing in statistics should provide comments about the data analysed.
4. In general, the following areas should be covered in the Report:
 - Executive Summary
 - Objectives
 - Scope
 - Methodology
 - Analysis and Findings
 - Recommendations and Conclusions

I. Executive Summary

5. The Executive Summary should provide an outline of the Study and, most importantly, of the major findings, challenges and recommendations.

II. Objectives

6. The Report should explain what the Study was intended to measure. The Study objectives should cover the following:
 - To measure the average time taken from arrival of the goods to their release;
 - To measure the average time taken for each activity in the release process, for example, the time taken for physical inspections;
 - To measure performance following the implementation of new policies/procedures/initiatives relating to cargo clearance;
 - To identify weaknesses in the release process (including for each individual activity in the process);
 - To identify the constraints affecting release; and
 - To suggest corrective/remedial measures to improve the time required for the release of goods.

III. Scope

7. The scope must outline the extent and limits of the Study. Some points to include are:

- Was it a comprehensive Study, capturing all the processes leading to release of the goods, or did the Study capture only the clearance procedures of government agencies?
- Did the Study capture all the elements in the Customs release process, or was it a simplified Study, capturing only the key elements in the Customs release process?
- Did the Study involve measuring the time from the arrival of the goods in the Customs territory to their release (total time), or did it cover only the time from when the goods declaration was lodged to the time of release (Customs time)?
- What modes of traffic were studied (e.g. sea, air, land, rail)?
- Which Customs office(s) was (were) involved in the Study?
- Was the Study based on automated or manual Customs procedures, or a combination of both?
- Which other agencies were involved in the Study and what was their role?
- Was the time taken by pre-shipment inspection companies captured?

IV. Methodology

8. The methodology used in the Study should be explained, as it will impact on the validity and reliability of the results obtained. The following should be covered under this section:

- Were all transactions covered in the Study, or was a sampling methodology used?
- If sampling was used, how were the samples chosen from the whole population or from the sub-population studied?
- What data was captured and how was it collected?
- What was the duration of the Study?

V. Analysis and Findings

9. This section should contain details of the total number of transactions dealt with over the duration of the Study, the number of questionnaire forms issued, the number returned, and the number used in the analysis.

If sub-populations were analysed, it is also important to indicate:

- The number of transactions;
- The number of forms issued;
- The number of forms returned; and
- The number analysed for the sub-population.

It is important to indicate what data has been included in the analysis. The following elements should be covered in this section:

- The average time taken from the arrival of the goods to their release. This could include, for example, the following key elements:
 - o Time from the arrival of the goods to the lodgement of the goods declaration;
 - o Time from the lodgement of the goods declaration to the assessment of duty and taxes;
 - o Time taken for examination of the goods;
 - o Time from the assessment to the payment of duties and taxes;
 - o Time from the duty payment to the release of the goods;
 - o Time taken in interventions by other agencies;
 - o Average time taken for each individual process by other stakeholders.
- If different categories of goods or goods regimes were studied separately (dutyable goods, non-dutyable goods, goods intended for inward processing, free zones, express consignments, etc.), the average time taken for each category or regime;
- Time taken for goods declared manually and electronically; and
- Time taken for release of goods by different Customs offices.

VI. Recommendations and Conclusions

10. The conclusions to be drawn and the recommendations made will depend largely on the results of the analysis of the data. The results could also be compared with established work standards and/or the results of previous Studies in order to arrive at useful conclusions.
11. The conclusions should focus on the processes where delays occur and why they occur. They should also focus on the areas where further improvements could be made.
12. Recommendations, on the other hand, should focus on specific proposals for improvements and should be translated into an Action Plan.

APPENDIX 6 – MODEL NATIONAL ACTION PLAN FOR IMPLEMENTATION OF THE TRS RECOMMENDATIONS

Objective

This model Action Plan is aimed at providing clear direction on implementation of the national TRS recommendations. It is presented in the form of a Table of Activities, with six numbered column headings and various examples. A guide to the Table headings is below.

Guide to the Table headings

I. Activities

This relates to specific actions included in the TRS recommendations.

II. Reference to substantial measures in the WTO TFA

This column is specifically intended for countries which are Members of the WTO. To the extent possible, each activity should be linked to particular WTO TFA measures, thus supporting the activity's implementation in line with the categorization determined by the country. One activity may be linked to one or more WTO TFA measures. When completing this column, it is essential that the TRS Working Group refer to the WTO TFA. Non-WTO Members are exempt from completing this column.

III. Outputs (national and international instruments)

This relates to the quantitative and qualitative outputs arising from implementation of the activities identified. Such outputs should normally be tangible and measurable.

IV. Parties responsible

This relates to the leading stakeholder (i.e. public or private entity) responsible for implementation of the activity in question.

V. Potential time frame for implementation

This relates to the anticipated time frame for implementation of each activity.

VI. Comments

This column should be used to record any relevant information that cannot be included in columns 1 to 5. Specific details on implementation or the approach adopted may be summarized here. For example, specific target dates, or border posts where new procedures are to be implemented, could be mentioned in this column.

Table of activities

No.	(1) Activities	(2) Reference to substancial measure in the WTO TFA	(3) Outputs (national and international instruments)	(4) Parties responsible	(5) Potential time frame for implementation			(6) Comments
					Short-term	Medium-term	Long-term	
1	Establish an elewctronic national Single Window system.	Article 10.4- Single Window	Steamline border procedures, reduce costs and time, and reduce paper documents.	Customs administration, Ministry of trade and other parties.			x	Will be implemented phase-wide. The Ministry of Health and the Quarantine Department will join before the end of 2018.
2	Align working days and hours between Members sharing a border.	Article 8.2 - Border Agency Cooperation	Facilitate cross-border trade.	Public and private international trade stakeholders in the Member States, including the Customs administration and other agencies in the respective countries.		x		
3								
4								

APPENDIX 7 – MODEL PRESS RELEASE

This model is a possible format for Customs administrations to use in preparing a press release about the Time Release Study. It is recommended that a brief factual description of the scope, methodology and results of the Study be included, in order to explain the efforts of Customs and other stakeholders in support of trade facilitation.

[Name and symbol of the Customs administration]

PRESS RELEASE

[date]

[Title]

Outline

[] Customs today released the findings of its [country name/port/seaport/border post name] first [second, third.....] Time Release Study (TRS), which measures and reports the time taken by Customs and [other stakeholders] to release imported cargo.

The TRS is a method endorsed by the World Customs Organization for measuring the time taken by authorities to release import/export cargo, and is recognized as a means of identifying bottlenecks and improving performance in import/export processes. Since entry into force of the WTO Trade Facilitation Agreement (TFA) in February 2017, Members have been required to measure and publish average release times of import/export goods (Article 7.6 of the TFA).

The DG of Customs, [], said it was pleasing to [see the results of the first/second/third Study as an objective indicator for trade facilitation] and to [see improvements in [year], which he attributed largely to the efforts of Customs, trade-related agencies and trade working together to achieve a seamless flow of cross-border trade].

The TRS [year] found that the average time from arrival to release for sea cargo is approximately [] hours, [an improvement of [] hours from [year]]. For air cargo, the interval was around [] hours [an improvement of more than [] hours] and for land cargo, it was around [] hours [an improvement of [] hours].

The time taken by each agency in the cross-border processing and release of import/export goods is set out below. (This paragraph is optional)

In particular, the average Customs procedure time, from Customs declaration to release, is as follows. [Each element has greatly improved as a consequence of efforts aimed at trade facilitation and the resulting enhancement of Customs operations.]

For sea cargo: [] hours [an improvement of [] hours]
 For air cargo: [] hours [an improvement of [] hours]
 For land cargo: [] hours [an improvement of [] hours]

Similarly, the average release time taken by [Agency Name] is as follows. [Each element has greatly improved as a consequence of efforts aimed at trade facilitation and the resulting enhancement of [Agency Name] operations.]

For sea cargo: [] hours [an improvement of [] hours]
 For air cargo: [] hours [an improvement of [] hours]
 For land cargo: [] hours [an improvement of [] hours]

The DG of Customs, [], acknowledged trade's contribution to the Time Release Study, in particular [], [], [], who provided advice and assistance.

Key findings and actions to be taken for further trade facilitation are []. It is also intended that regular Time Release Studies continue to be conducted.

[The Time Release Study Report can be downloaded from the [Name of Customs administration] website: [web address]

Media enquiries:

For further details contact [] Customs [tel. and e-mail]

APPENDIX 8 – MEMBERS’ EXPERIENCE



AUSTRALIA

o Australia’s 2016 TRS

1. The Australian Border Force (ABF) was integrated into the Department of Home Affairs (Home Affairs) on 20 December 2017. It operates within Australia’s international trading environment and must balance its border protection responsibilities with the need to facilitate legitimate trade. Cargo reports, which include a description of the cargo, must be input electronically into the ABF’s Integrated Cargo System not less than 48 hours before arrival for sea cargo, and not less than two hours for air cargo. This allows the ABF to start risk assessing the cargo before it actually arrives.
2. The ABF describes its approach to managing the flow of sea and air cargo as “intelligence-led and risk-based”. Its regulatory philosophy recognizes that the majority of individuals and entities involved in the importation of cargo intend to comply with the regulatory requirements and should be permitted to operate in a self-assessed environment with minimal or no intervention.

Australia’s international interests and expectations in the field of TRS

Globalization has brought a dramatic increase in cross-border trading. Accordingly, there continues to be heightened dialogue between the WCO and other organizations to discuss and promote the TRS. There is a growing number of joint Studies conducted by WCO Member States actively seeking to work together in order to deliver common solutions to critically important trade facilitation objectives.

In 2010, Australia and New Zealand worked in collaboration to conduct a trans-Tasman TRS. The same TRS methodology used for the Australian experience was applied to the 2010 trans-Tasman experience. The trans-Tasman TRS was conducted to gauge the performance of the import and export clearance processes in Australia and New Zealand. An evidence-based approach was employed, using data gathered during the usual course of border-management business. Overall, it was found that clearance performance for imports and exports was high on both sides of the Tasman. The TRS also indicated that arrangements made under the Australia-New Zealand Closer Economic Relations Trade Agreement (ANZCERTA) contributed to faster processing times at the border.

Critically, the 2010 trans-Tasman TRS embodied the collaborative effort of both Australia and New Zealand in overcoming differences in their approach to border clearance events, definitions, policy and processes to produce a joint consolidated analysis and Study. Key findings from this Study identified factors which affected performance on both sides. An analysis of these findings suggested that there was potential to further augment the clearance performance in trans-Tasman trade.

Opportunities for streamlining included:

- Advance reporting;
- Information for SME traders;
- Regulatory harmonization;
- Data harmonization;
- Risk management; and
- Performance management.

3. Since 2007, the ABF has conducted various Time Release Studies to:

- Provide a holistic view of the cargo-operating environment;
- Enable the measurement of improvements in clearance times;
- Enable the identification of other improvement opportunities to further streamline border clearance processes and facilitate trade; and
- Provide industry with a measure of border agency performance in delivering timely cargo clearance.

4. The table below outlines Australia’s performance and shows that this has remained stable in the sea cargo environment, but has improved in the air cargo environment. This is a remarkable achievement that supports the significant changes to border security over the past four years.

Results* of key measurements - 2016 TRS

	Sea Cargo 2015	Sea Cargo 2016		Air Cargo 2015	Air Cargo 2016
Arrival to release (days)	-0.5	-0.6	Arrival to release (hours)	6.2	2.8
Arrival to clearance (days)	0.5	0.1	Arrival to clearance (hours)	6.4	3.0
Arrival to availability (days)	1.2	1.2	Arrival to availability (hours)	47.4	35.5

*** The negative figures indicate that goods were Customs-cleared half a day before they arrived in Australia.**

5. Key findings from the 2016 TRS are listed below.

- The ABF remains efficient in clearing cargo at the border and is not an impediment to trade.
- Sea cargo and air cargo volumes continue to increase. However, this does not create a corresponding percentage deterioration in the speed at which cargo is processed at the border.
- In sea cargo, the country of origin plays a significant role in determining the timeliness of document reporting for ABF clearance.

6. The 2015 and 2016 Time Release Studies measure clearance performance for import processes only, as this approach is more mature for data collection purposes.

7. The objective of the 2016 TRS was to:

- Replicate the 2015 TRS and produce comparable measurements;
- Compare the year-on-year results to show any performance changes; and
- Identify opportunities to improve performance.

8. The 2016 TRS validated the findings of the 2015 TRS and continued the focus on multi-year and year-on-year trends for the air cargo pathway, sea cargo pathway and top ten loading countries (sea and air).

o Australia's next TRS: Ongoing preparation in 2018

9. In 2017, decisions were made to conduct the next TRS, with the work on the 2017 TRS scheduled to commence in mid-2018. The Study will cover all transactions from the calendar year, as opposed to a one-week sample. In addition, it will also include a comparison of average clearance times (from arrival to release) between Authorized Economic Operator (AEO) cargoes and non-AEO cargoes. Importantly, the Study will reflect feedback received from the WCO, as well as continued engagement with other border agencies and industry members.

10. The methodology applied to Australia's next TRS and to future Studies will be based on the WCO TRS Guide, and modified in line with local conditions and objectives. It is important to point out that the Australian international trade supply chain involves, and relies on, a highly advanced level of technology, with all of Home Affairs rapidly moving towards a "digital-by-default" approach, and embracing instant development related to automation and digital technologies. It is therefore likely that TRS data or time-stamps will be collected electronically.

o Future developments to add value to the Australian experience

11. TRS has consistently demonstrated the integral link between early reporting of goods by industry, and earlier clearance times. Indeed, the relationship between early reporting and early clearance has been a significant theme through the TRS series. Opportunities to further improve early reporting are currently being explored through greater dialogue with the WCO, and the development of trade assistance programmes, such as the Australian Trusted Trader and the Single Window.


CAMEROON

Our story: “We have conducted a TRS and will do another one”

1. Cameroon conducted a Time Release Study (TRS) from 1 to 15 August 2017. The Study was carried out in accordance with World Customs Organization (WCO) rules, under the supervision of a technical committee (group) made up of leading supply chain stakeholders. This team had previously undergone WCO training on TRS tools (methodology, use of software, etc.).
2. The Memorandum from the Director General of Customs establishing the technical committee also defined its remit, which was to identify bottlenecks in the Customs clearance procedure in the port of Douala and to find solutions to overcome them by means of a collaborative approach.
3. The group took advantage of the experience of WCO and Ivorian Customs experts. Several activities were performed to ensure smooth implementation of the TRS in Cameroon, and some of the activities were executed with the WCO’s technical assistance.

I. Preparation for the Study, including determination of the scope

4. The first activity was to bring the members of the team together to define the Terms of Reference of the Study, on the basis of its mandate. Procedures in the port of Douala were then explained to all those involved so that each participant had the same level of information on the sequencing of Customs clearance and goods release operations. The committee established a seven-point action plan on the basis of which a budget was drawn up and submitted to the authorities, to ensure the proposed Study would be funded. The plan was based on the following activities:
 - Mapping of procedures, based on specific information collected during the field visit;
 - Identification of sequences of the procedure in relation to the TRS;
 - Collection of physical and digital data, based on specially designed forms;
 - Determination of intermediate time periods and the overall time period;
 - Identification of bottlenecks likely to hinder the smooth movement of goods; and
 - Formulation of recommendations for reducing Customs clearance times.
5. This approach made it possible to identify not only relevant chronological sequences, but also the various factors or stakeholders that were likely to have an impact on the respective time periods.
6. One of the working group’s first decisions was to define the target population and units of observation as a whole. Given that this was Cameroon’s first experience of a TRS, it was decided to carry out the Study on containers imported for direct consumption, offloaded in the port of Douala from 1 to 15 August 2017, and released by 30 September 2017 at the latest. The team did not wish to take the risk of focusing on all traffic going through the port of Douala (transit, suspensive procedures, etc.). The second issue to be resolved was the choice of month for the Study, bearing in mind the time limits imposed upon the committee. The month of August was selected, and the analysis of available data showed that this period did not normally experience significant increases or decreases in traffic.

II. Collection and recording of data by Cameroon

7. Two data sources were identified: the various IT systems of port chain stakeholders, and manual data collected from the form previously designed by the technical team responsible for the TRS. This data collection form was designed on the basis that certain information should come from the IT systems of the other parties involved.

8. Physical data collection was preceded by a pilot survey period that was initially scheduled to last two weeks, but which in fact took over one and a half months. This enabled the data collection mechanism to be run in, and difficulties to be identified and corrected before going on to the live stage. This lasted as long as planned, the main problems being lack of involvement of certain supply chain stakeholders and a low level of returns of the form. The group responsible for carrying out the Study therefore decided to increase awareness-raising by means of several field visits.
9. During the collection period (1 August to 30 September 2017), a memorandum was issued to make the data collection form a mandatory document to be attached to the detailed declaration. Authorized Customs Brokers (“CDA”) were accordingly required to fill in the physical forms that had been duly prepared for data collection purposes and submit them when the container was taken to a point indicated for that purpose. The data was then captured in the WCO software and a previously identified key was used to combine the manual information with the digitized data to produce a single database.
10. During the survey period, 7,046 containers were offloaded, 4,143 of which involved goods imported for direct consumption. Containers offloaded during this period which left before 30 September 2017 (end date of physical data collection) totalled 3,747 (i.e. 90% of containers offloaded which met the Study criteria). The return of questionnaires, however, was not complete: only 2,471 were actually returned (i.e. a rate of return of forms of 66%). This rate was regarded as satisfactory for the requirements of the analysis.
11. Prior to the analysis, the chronological coherence of data was monitored and the lines of analysis that could best guide decisions favouring a reduction in dwell times in the port of Douala were defined. The second step was to eliminate variables for which there was no, or insufficient, information, and variables for which the information was available but could not be ascribed to a container.
12. The key variables were then identified, i.e. variables which, irrespective of the procedure (or type of operation), were consistent with some form of chronological sequencing of the procedure. A total of 11 variables were selected, with a rather linear Customs clearance process. These variables were used to define the key sequences. The advantage of the variables was that they enabled the overall dwell time between container offloading and release to be measured by recording the sum of the time periods of the corresponding key sequences.
13. Once all the questionnaire forms were collected, they were input into the WCO software and the information from each questionnaire was then compared with the corresponding data available in other electronic systems, including Cameroon’s ASYCUDA System.

III. Data analysis and conclusions: “overall results”

14. The data analysis showed that the average time taken to release containers for direct consumption in the port of Douala was 22 days. This was consistent with figures produced by the Comité National de la Facilitation des Echanges (CONAFE) [National Trade Facilitation Committee]. This important information showed that a container had to be observed for some 30 days to obtain as much relevant data as possible. In addition, the container was preferred to the Customs declaration as the principal unit of observation because each container had a single date for exiting the port area. By contrast, since a declaration might cover several containers, the date to be taken as indicating the end of the operation could be problematic (the date of removal of the first container or the date of collection of the last).
15. Additionally, and according to the fact-based evidence, the average results led to a number of findings, including the following, which have corresponding recommendations to address the problem identified:

<p>The overall goods release time was rather long: 14 days, 14 hours and 19 minutes. This was largely due to:</p>	<p>Recommendations</p>
<ul style="list-style-type: none"> • Lack of foresight by shippers, who take an average of over 8 days, 21 hours and 51 minutes to record the declaration after validating the manifest in ASYCUDA. There is a lack of proper communication between shipping agents and importers, meaning that the latter do not have a clear indication of the date and time of arrival of their goods. Moreover, some operators are using the port as a storage area, given that the storage conditions therein are more advantageous. • Late payment of Customs duties (2 days and 6 hours after their calculation). Many importers are facing difficulties in raising the necessary funds to pay their duties and taxes. This is due to the fact that these have to be paid in cash, and credit procedures are yet to be implemented. • Late payment of handling charges (4 days after payment of Customs duties). These charges have to be settled through various manual procedures and this has an impact on delays. 	<ul style="list-style-type: none"> • Promote online services and increase awareness-raising, training and capacity building for shippers and CDAs with respect to foreign trade procedures. • Reactivate the deferred payment procedure and establish the respective conditions for access to this service. • Increase the provision of storage spaces and areas for external goods. • Enhance the dematerialization of foreign trade procedures by introducing a single form (E-Force) in all Customs clearance circuits (pre-Customs clearance/preloading, handling, Customs clearance and collection/embarcation).
<p>The overall time for the departure of a containerized vehicle is greater than that for a container without a vehicle (5 days, 8 hours and 35 minutes more). This time period is largely due to:</p>	<p>Recommendations</p>
<ul style="list-style-type: none"> • The time taken for the physical inspection (5 days, 5 hours and 32 minutes), which takes place prior to recording of the declaration. • Late payment of inspection fees: 3 days and 12 hours after approval is granted by the Administration. Inspections of containerized vehicles are carried out prior to submission of the detailed declaration, in order to allow the inspection service provider (SGS) to record all the vehicles' particulars. This procedure is required by SGS so that it can issue its inspection certificate, and can only be carried out with the prior authorization of Customs. Once this authorization has been granted, the importer needs to settle the handling fees and this is precisely where delays have been observed. 	<ul style="list-style-type: none"> • Reduce the number of stakeholders in the procedure for issuing the Customs inspection report on containers transporting vehicles. • Ensure the on-site presence of an inspector scheduled to conduct an inspection in the case of a container transporting vehicles. • Provide DIT (Douala International Terminal) with advance information on containerized vehicles (from shipping lines).
<p>The procedure for electronic payment of port charges takes 2 days, 16 hours and 34 minutes. This time period is largely due to:</p>	<p>Recommendations</p>
<ul style="list-style-type: none"> • The length of the sequence for submitting the physical file after receiving the pro forma invoice (30% of the time period). • Lengthy port authority procedures, combined with a lack of foresight by Authorized Customs Brokers regarding withdrawal of the pro forma invoice after filing the relevant application. 	<ul style="list-style-type: none"> • Complete the process of digitizing the invoicing and payment of Port Autonome de Douala (PAD) [Autonomous Port of Douala] charges.



1. In 2016, the Chilean Customs Service decided to conduct a Time Release Study (TRS). One of its first activities was to organize a national TRS Workshop in June of the same year, where two World Customs Organization (WCO) experts were invited to share information with Chilean international trade stakeholders on how to carry out a TRS in Chile, taking into account the country's local specificities. The event was attended by officials from the different Customs services throughout Chile, and by representatives from other government agencies, as well as the private sector.
2. It is important to note that this is the first time that a TRS based on the WCO methodology was carried out in Chile, and the focus was on the export procedure in a particular port in Chile. The Chilean National TRS Action Plan included seven (7) main stages which incorporated the three phases described in the WCO TRS Guide methodology. The seven stages are described below.

Stage 1: Creation of a Working Group

3. Overall coordination of the Study was carried out by the Statistical Analysis and Research Unit of the Studies Department, which followed the WCO TRS methodology with some adjustments to ensure that it fitted more closely with the reality of the Chilean international trade environment. The Working Group comprised both permanent members, and members whose participation was on an ad hoc basis.

Stage 2: Determination of the scope of the Study

4. To determine the scope of the Study, data associated with foreign trade and recorded in National Customs Service databases was previewed and taken into consideration. The criteria used to define the scope also included a statistical approach, taking into account the importance of consignments to the national economy, and other relevant factors, such as the level of systematization of processes and automatic data recording.
5. The scope of the Study was based on normal export operations for the aquaculture/fisheries and forestry sectors, at a particular port in Chile where these goods are regularly exported by sea.

Stage 3: Designing the business process and creating the survey structure

6. After determining the scope of the Study and conducting some activities, the Working Group designed the business process for the export commodities to be measured. In order to validate the process, in December 2016 the Group made a field visit to confirm the actual procedure followed in the port. The business process described the key points measured relating to the export process.

Stage 4: Determination of the intervals to be measured

7. The intervals measured considered the time elapsed between the following stages of the export procedure:
 - Authorization for entry into port: In this stage, the physical entry of the goods into the port is authorized, and the National Customs Service confirms if the goods will be inspected or not.
 - Authorization for entry into port – Stacking for loading: This stage covers the period after the National Customs Service confirms inspection of the goods, until the goods are placed in the stacking zone, waiting to be loaded aboard the ship.
 - Stacking for loading – Loading of goods: This stage covers the time period from the placement of goods in the stacking zone until they are loaded aboard the ship.
 - Loading of goods – Departure of ship: Period covering the time between loading the goods aboard the ship, until the ship departs from the port of exportation.

Stage 5: Data collection

8. Once the process had been defined by measuring intervals, and after an in-depth analysis of Customs systems to ascertain what data these systems record, it was felt that the most efficient approach for Chile was to carry out the Study using only the data contained in Customs information systems. Since such data is recorded automatically, a decision was made to collect the data solely via electronic means which keep a record of times, namely the Customs information system.
9. It was further decided that the period for collecting the data would be the second and third quarters of 2016, i.e. between 1 April and 30 September.

Stage 6: Analysis and interpretation of the data

10. The final total amount of data for which this desktop measurement was carried out corresponded to 7,495 export documents.
11. These 7,495 export documents represented 27.7% of normal exports carried out by the Talcahuano Customs Service and 22.6% of normal exports carried out at a national level. In both cases, an assessment was made of the aquaculture/fisheries sector and forestry sector, by maritime transport, from 1 April to 30 September 2016.

Stage 7: Findings and recommendations arising from the TRS

12. The release time was found to be 6.24 days, a measurement that considers the time from the goods' entry into port, until the ship departs from the port of exportation.
13. The methodology applied by Chile was based on the WCO guidelines. However, some adjustments were made to reflect local conditions and objectives.
14. Whilst it is recommended that data be considered from all the actors in the export process, one of the difficulties which arose was the definition of a single piece of data that would allow the connection of information from the different actors taking part in the export operation.
15. Although there is an exchange of information between Customs and the port, it is necessary to strengthen that exchange in order to have traceability and thus allow the goods to be controlled in an integrated manner. Some activities at the port are not currently communicated to all the actors in the process. These activities include:
 - a. Automated transfer of the information contained in the consignment note for stored goods; and
 - b. Transfer of the goods from one ship to another once Customs has authorized the goods' entry into port. These changes can be caused by business and operational issues affecting the shipping company. In turn, this affects Customs, in that goods already declared in a specific export document have to be loaded via a new export document, which is then processed at a later time.
16. The experience gained from this Study will allow Chilean Customs to apply this methodology to other ports or means of transport, as well as to improve procedures, generate indicators and have greater predictability in the context of the release of goods. In addition, knowing the different times involved in the procedure will bring greater transparency to the service delivered by Customs.
17. The automated Customs procedures match the expected outcomes, while the stages that do not have available information show that there are areas for improvement.
18. A percentage of the information exchanged between Customs and the port was not consistent. A data quality analysis was therefore performed, and it was necessary to exclude 26.7% of the export documents that were initially considered. This occurred because there are operational situations that are not considered in the normal control process. The exceptional procedures used to address them do not reflect reality, resulting in a loss of traceability. This needs to be resolved by modelling and automating all unusual cases that generate other control and information cycles.

19. The Study showed the need for greater standardization of the information exchanged between the actors in the export process, in order to correctly reflect the traceability of the process measured.

GEORGIA

1. The Georgia Revenue Service (GRS) has been conducting the Time Release Study (TRS) on a periodic basis since 2013, while institutionalizing the TRS as an important tool for trade facilitation in Georgia. GRS carried out its last Time Release Study on Customs Procedures from 16 to 21 February 2016. The TRS was conducted by the GRS Working Group alongside others, and was monitored by representatives of the private sector, acting as observers. It should be noted that a similar Study was conducted from 4 to 11 November 2013. In preparing for the Study, GRS was supported by USAID, the EPI project and business representatives.
2. The WCO TRS Guide was adapted to the specificities of Georgia's Customs system, within the scope of the flexibility allowed, taking into account technological arrangements related to the flow process of cargo. The Time Release Study was conducted in three phases: (1) preparation and planning, (2) data collection, and (3) data analysis and conclusions. It is important to point out that all government functions related to the entire clearance process are delegated to GRS.

Highlights of the 2016 TRS

3. The creation of the national TRS Working Group, decisions made, and various other details, are given below.
 - The Working Group consisted of representatives from GRS, the Business Ombudsman of Georgia, the Business Association of Georgia, the Association of Maritime Agents and Brokers, Panalpina Georgia Ltd (the contractor of BP Exploration (Caspian Sea) Ltd), IDS Borjomi Georgia, the International Freight Forwarders Association and the USAID programme "Governing for Growth (G4G)".
 - One of the first decisions of the Working Group was to determine the geographical scope of the Study. As this was the second TRS, it was decided to conduct it at the busiest and most important Customs offices only (Customs crossing points and inland Customs offices), a practice accepted and advocated by the TRS Guide.
 - The Working Group agreed that the TRS had to be implemented in parallel stages in all of the selected Customs offices. The data collection process took place on six consecutive days, from 16 to 21 February 2016. Georgia's Customs offices operate 24/7.
 - The selected Customs offices are the largest in the country and serve almost all categories of goods. High-intensity traffic and diversity of goods were some of the main determinants in selecting these Customs offices.
 - In line with the Working Group's decision, the TRS was performed for all categories (types) of goods, regardless of country of origin, HS code, means of transport, volume of commodity shipment, or other factors.
 - As to data collection, it is important to underscore the use of specially designed questionnaires (for Customs crossing points, as well as for inland Customs offices) to collect the necessary information during the TRS process. The questionnaires were agreed with all the parties in the Working Group, and covered all the procedures falling within the scope of the Study, the aim being to gain information that was as precise as possible on specific procedures. The questionnaires also made it possible to determine the overall time spent on Customs formalities for various types of commodity shipments.
 - Relevant instructions were provided to Customs officers on how to enter data into the questionnaires. The researchers entered information on printed forms, and then transferred the data collected into electronic format, following completion of the questionnaires. Each questionnaire was numbered, and authenticated by the officer's signature, the date and time.

- The questionnaires on automated Customs procedures implemented at inland Customs offices were filled out on the basis of the information recorded in the databases, immediately following the completion of the procedures. The sources of information used were e-CUSTOMS (the upgraded version of ASYCUDA World), Oracle, automatic Customs data processing systems, and QMATIC.
- It should be noted that the volume of cargo turnover at the Customs offices selected for the Time Release Study is so high that it was impossible to collect information about all commodity shipments. Sampling of shipments was therefore necessary, and the following sampling strategy was followed: at Customs crossing points (CCPs), the information was collected for every 10th commodity shipment in three different shifts over a 24-hour period; in the inland Customs offices, all data on the import of goods was collected.

4. An impact analysis of results, focusing on the 2013 and 2016 Time Release Studies, is below.

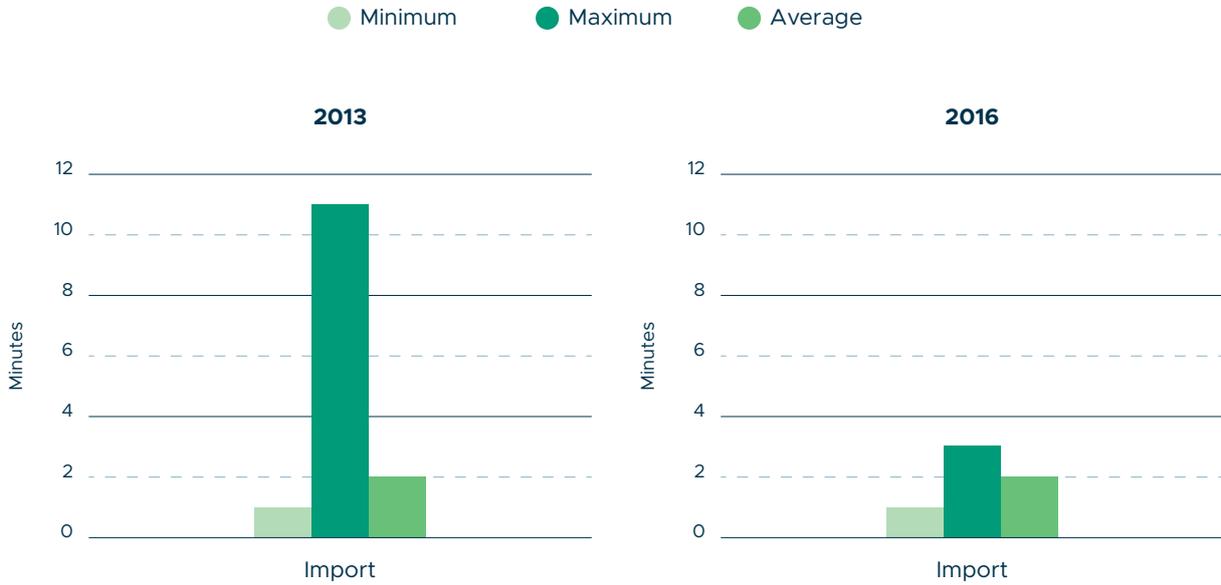
- Prior to starting data analysis, the precision and accuracy of the data was verified. Documentary information collected was summarized in electronic format. The results were summarized using statistical processing programs. Final results were then analysed to draw conclusions.
- The institutionalization of this particular project streamlined the critical items specified in the questionnaires, as the Customs administration was able to compare the latest TRS results against the previous ones, and to objectively evaluate positive achievements and remaining shortcomings. The 2016 TRS covered the following main Customs offices: Customs Crossing Point Sarpi (on the border with Turkey), Customs Clearance Zones Tbilisi, Batumi and Poti, and also the Customs Crossing Point “Poti and Kulevi sea ports and Poti Free Industrial Zone”.
- A comparative analysis of the 2013 and 2016 Studies generally illustrates improvements in terms of the average time taken to accomplish a number of activities. For example, Graph 1.1 shows that, between 2013 and 2016, the average times taken for transit and import procedures decreased in respect of cargo which was not subject to sanitary and phytosanitary (SPS) intervention and which involved the least possible intervention in terms of other controls.

Graph 1.1: Import and transit times at CCP Sarpi



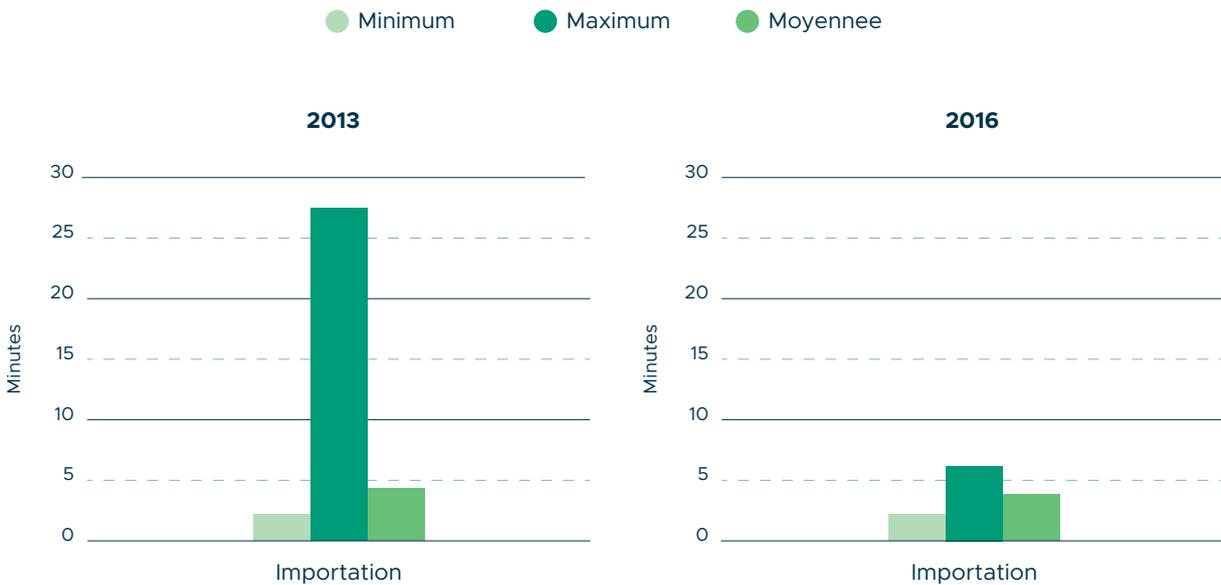
- A further example, in relation to importation, can be seen in Graph 1.2 below. This shows that the average time required in 2016 for cargo to undergo weighing procedures in Georgia was less than in 2013, indicating a clear improvement from one TRS cycle to the next.

Graph 1.2: Import clearance times at CCP Sarpi for weight goods



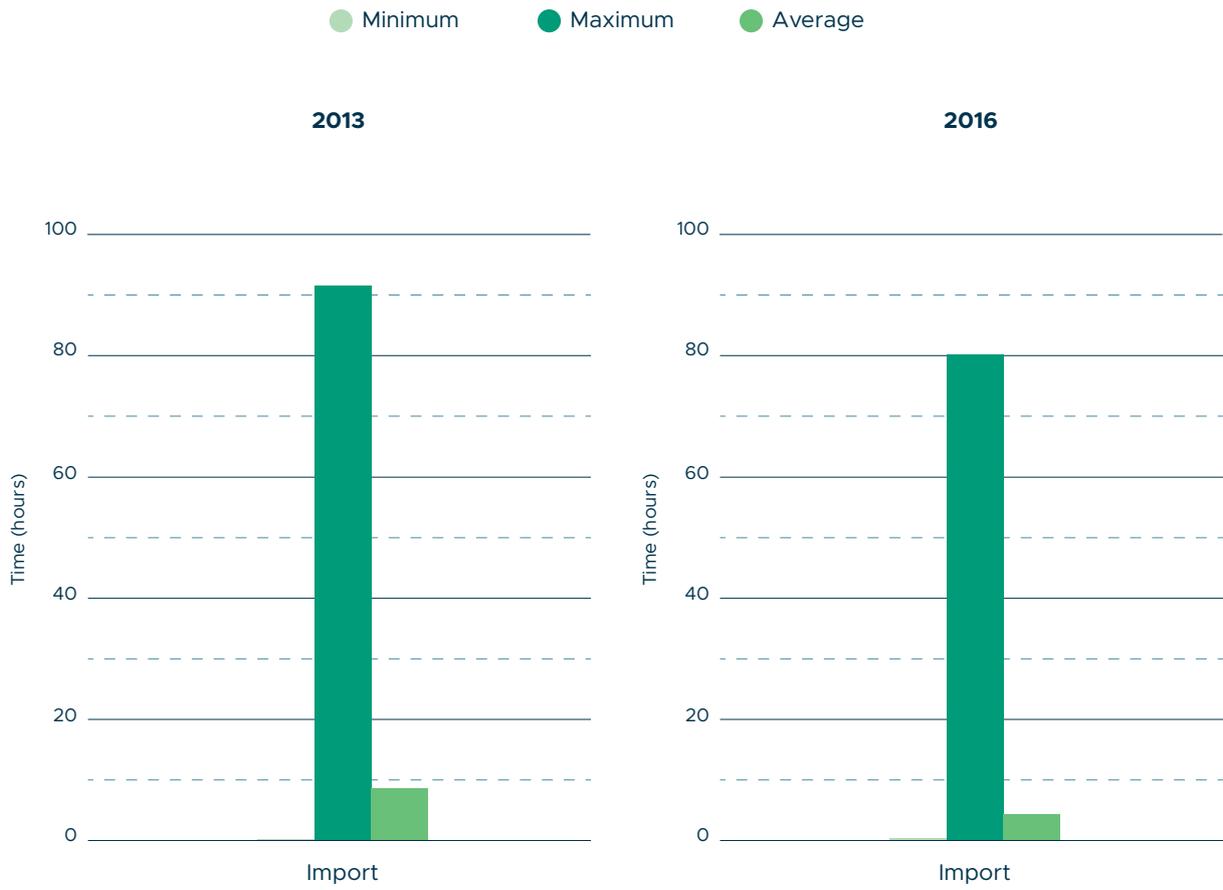
- Graph 1.3 below indicates, again with regard to importation, that the process of scanning goods also improved between 2013 and 2016, involving an average reduction of one minute. (This process relates only to the x-raying of cargo).

Graph 1.3: Import clearance times at CCP Sarpi for scanned goods



- In terms of the import procedure for cargo subject to SPS intervention for 2013 and 2016, Graph 1.4 below clearly shows a reduction in average times for sanitary and phytosanitary control. It is important to recognize that SPS intervention in the clearance process was still one of the largest challenges facing the Georgia Revenue Service in 2016.

Graph 1.4: Import clearance times at CCP Sarpi for goods subject to SPS intervention



5. General findings and recommendations from the 2016 TRS are in the table below.

Findings	Recommendations
<p>Georgia's geographic complexity in terms of the natural landscape, and the architectural restrictions on Customs offices, add days in terms of time.</p>	<p>Ensure that alternative means of logistics provision are in place permanently.</p>
<p>Delays to SPS cargo controls due to lack of laboratories.</p>	<p>More laboratories need to be created. Mitigating or addressing this problem will necessitate a greater allocation of financial resources by government.</p>
<p>From 2013 to 2016, the percentage increase in advance cargo declarations was about 30%. However, that increase is not yet sufficient, and it needs to improve further in the short or medium term.</p>	<p>Greater promotion is needed of advance cargo declarations. The GRS therefore needs to introduce a plan to address constraints.</p>
<p>Georgia already has sufficient expertise to increase the scope of TRS so that it extends to other modes of transport or covers other aspects related to the flow of cargo.</p>	<p>Increase or enlarge the scope of TRS so that it includes, for example, other modes of transport relevant to Georgia.</p>
<p>TRS data and results are more reliable for assessing and making judgments on the performance of Georgia's cargo clearance process compared to other international performance indicators or indexes (e.g. the World Bank's Doing Business indicators and Logistics Performance Index, and the OECD's Trade Facilitation Indicators).</p>	<p>International benchmarks evaluating the business climate, including Customs procedures, should consider TRS results in their assessments. Such results are more reliable, since they are based on accurate data and do not allow for perceived performance.</p>



I. Background

1. The Indian Customs Administration, led by the Central Board of Excise and Customs (CBEC), has been at the forefront of continuously enhancing the facilitation of cross-border trade in line with the Government of India's policy objective of improving the ease of doing business.
 2. Facilitation of legitimate trade is a core objective of Indian Customs' modernization programme. The National Trade Facilitation Action Plan, developed in response to the WTO TFA, has set a goal of reducing the average release time for import goods to within three days for sea cargo, within two days for air cargo and Inland Container Depots, and to the same day for Land Customs Stations. Similarly, the goal for release of export goods is under two days for sea cargo, and on the same day for air cargo, Inland Container Depots and Land Customs Stations.
 3. CBEC and Jawaharlal Nehru Custom House (JNCH) have implemented several recommendations from previous TRS Reports and introduced measures such as electronic Single Window, Direct Port Delivery for imports, and Direct Port Entry for exports to reduce release times. JNCH TRS 2018 was conceived and conducted in the above context. A further aim was to measure the impact of statutory, policy, administrative and ICT improvements undertaken by Indian Customs and JNCH.
 4. The Jawaharlal Nehru Port Trust (JNPT) is India's largest containerized port, handling about 55% of the containerized cargo across all major ports in India, and is expected to double its capacity to about ten million TEUs by 2022.
 5. CBEC conducted TRS 2018 at JNCH by engaging various stakeholders as partners, with the scope of the Study covering both imports and exports. It highlighted the role of the partner government agencies, and commodities and processes that may merit greater attention in the national effort to improve the ease of doing business. The rigorous methodology was supported by collecting data from various sources available with different stakeholders. The entire Study was conducted using Customs in-house resources and those of PGAs to obtain the highest level of sensitization and involvement, besides ownership of the results.
6. Objectives
- Spreading awareness about release times among all stakeholders, and their role in reduction of those times.
 - Measuring the distance towards achieving the National Trade Facilitation Action Plan target of a release time of three days for import of sea cargo, and two days for export of sea cargo.
 - Identifying categories of bills of entry, commodities and sub-processes that are relatively more time-consuming, with a view to suggesting measures to improve the corresponding release times.
 - Improving coordinated border management by seeking to approximate the release times associated with different prominent agencies.
 - Assessing the impact of statutory and administrative changes on trade behaviour over time, and identifying reasons for non-compliance through sample surveys among outliers.
7. In terms of sample size related to import, the Study covered all the 14,973 bills of entry filed during the sample period of seven days in 2018 (i.e. 1-7 January 2018), and tracked them till 7 February, when the data was frozen for analysis.
 8. It is important to highlight that "release time" in this Study is defined as the time taken from the grant of "entry inwards", to grant of "out of charge" by Customs in respect of both normal bills of entry (where the bill of entry is filed after grant of entry inwards), and advance bills of entry (where the bill of entry is filed before grant of entry inwards).

II. Results

9. Imports

- The all-in-one average release time for imports has improved significantly, from 181.34 hours in 2017, to 144.18 hours in 2018. This release time is at variance with the findings of the World Bank’s Ease of Doing Business Report. The World Bank perception of the release time for auto components imported from South Korea, at 267 hours, is significantly higher than the comparable release time of 126.54 hours found under TRS 2018.
- The graph below shows the distance towards achieving the National Trade Facilitation Action Plan target of 72 hrs.



- The normal distribution in the graph shows that: (a) 29% of bills of entry (as against 21% in 2017) were cleared within 72 hours; (b) about two thirds of the bills of entry were cleared in less than the average release time of 144 hours, with the remaining one third of consignments adversely impacting the release time; and (c) a significantly lower number of bills of entry entailed inordinate delays.
- The Study has identified four elements that must be at the core of the drive towards reaching the TFA target of 72 hours, namely: (a) a higher share of advance bills of entry; (b) greater full facilitation, with no assessment or examination; (c) more AEO enrolment; and (d) higher DPD clearances.
- The release time for advance bills of entry was 113.54 hours, compared to 187.30 hours for normal bills of entry.
- AEO bills of entry enjoyed higher full facilitation, at 84.6%, compared to 60.2% overall, and had an average release time of 103.06 hours. The advance facilitated bills of entry filed by AEOs had an impressive release time of 69.18 hours.
- The number of DPD bills of entry has increased by 83.7% since 2017. With a full facilitation level of 75.1%, the average release time for DPD advance facilitated bills of entry was 65.36 hours.

- The Study identified six categories of commodities, based on specific requirements associated with them, to highlight their impact on release times, which is sometimes hidden in the arithmetic averages. The average release times are presented below.

S. NO.	COMMODITY	RELEASE TIME (IN HOURS)
1	Food items (chapters 7, 8 and 9)	247.18
2	Pharmaceuticals (chapter 30)	138.49
3	Fertilizers (chapter 31)	134.19
4	Plastics (chapter 39)	131.54
5	Textiles (chapters 59 and 60)	173.06
6	Auto components (tariff heading 8708)	91.52

10. Single Window – partners in a common pursuit

- The release times for bills of entry that were referred to participating government agencies such as Animal Quarantine, Plant Quarantine, the Food Safety Authority, Textile Committee, Wildlife Control, etc. under Single Window (SWIFT) were quantified separately to obtain a perspective on release times in terms of PGAs.



** data pertains to chapter 59 & 60 only

11. Exports

- The methodology adopted for computation of export release involved collecting data concerning the top five exporters of each of six major categories of goods: (i) frozen meat, (ii) frozen fish, (iii) pharmaceuticals, (iv) automobile parts, (v) two-wheelers and three-wheelers (bikes, auto rickshaws), and (vi) electrical machinery (falling under chapter 85).
- The gross average export release time, measured from the time of departure of cargo from factory premises till departure of the vessel, was found to be 108 hours. The net average export release time, arrived at by excluding the domestic transport time from the gross average export release time, was 84.1 hours. This is in line with the World Bank’s Ease of Doing Business Report 2018 finding, where export release time is about 85 hours. There is significant variation in the average export release time, with a net average export release time of 53.4 hours for frozen meat, and of 99.7 hours for electrical machinery.

The average time taken, in terms of stages, in the export process is presented below:

Net Time Share in Export Process



III. Recommendations

12. Based on the detailed analysis, the recommendations below have been made to reduce the release time for import cargo.

- Constant review of the risk parameters and profile to increase the level of full facilitation (involving neither assessment nor examination).
- The need for physical examination of cargo must be more carefully considered, and scanning capability at the terminal premises should be strengthened.
- Enhance the outreach programme to increase the share of advance bills of entry, make use of the e-Sanchit facility (for online uploading of supporting documents with bills of entry in Single Window) to minimize the need to raise queries during assessment, and to encourage prompt filing of normal bills of entry and prompt payment of duty.
- Effective engagement with regular importers/exporters and logistics operators to increase enrolment under the AEO and DPD schemes.

- Partner government agencies, such as FSSAI, ADC, PQ and TC, should review their risk parameters and processes to reduce the share of interdicted bills of entry.
- Develop a logistics hub in the vicinity of the port to house various offices of PGAs and other stakeholders, and state-of-the-art laboratories.
- Installation of fixed and mobile scanners by port terminals will help reduce the recourse to physical examination of goods and the time involved in such scanning, as well as improve interdiction and consequent effectiveness in risk profiling.

13. The Study recommends the measures below to further reduce the export release time.

- Setting up of a centralized parking plaza, catering for all four terminals, with adequate facilities for scanning and examination of the containers.
- The proposed testing facilities for import cargo may also be equipped with testing facilities for main items of export, including perishable goods.



LAO PEOPLE'S DEMOCRATIC REPUBLIC

1. The Lao Customs Department (LCD) has been conducting the Time Release Study (TRS) on a regular basis to measure a key performance indicator of the Customs and Trade Facilitation Project. The Project adopted the "ASYCUDA World" system to support cargo clearance processing, and introduced advanced techniques, such as risk management and advance rulings, to Customs administration in order to enhance trade facilitation. One of the Project's key performance indicators was to reduce the average time required for cargo clearance by 10% each year. This indicator has been measured by conducting the Time Release Study. To date, three Studies have been carried out: in 2009, 2012 and 2016. The first TRS set out the baseline information on the clearance process; the second assessed the impact of the introduction of trade facilitation initiatives, including implementation of an e-Customs system to manage cargo clearance; and the third measured the achievement of the roll-out of the e-Customs system to major Customs border posts, and the effectiveness of risk management.

2. A TRS Working Group was established to guide and monitor the Study's progress. It comprised permanent representatives of various trade stakeholders, such as the LCD, the Ministry of Industry and Commerce, the Ministry of Agriculture and Forestry, the Ministry of Health, the Statistics Bureau and the private sector.

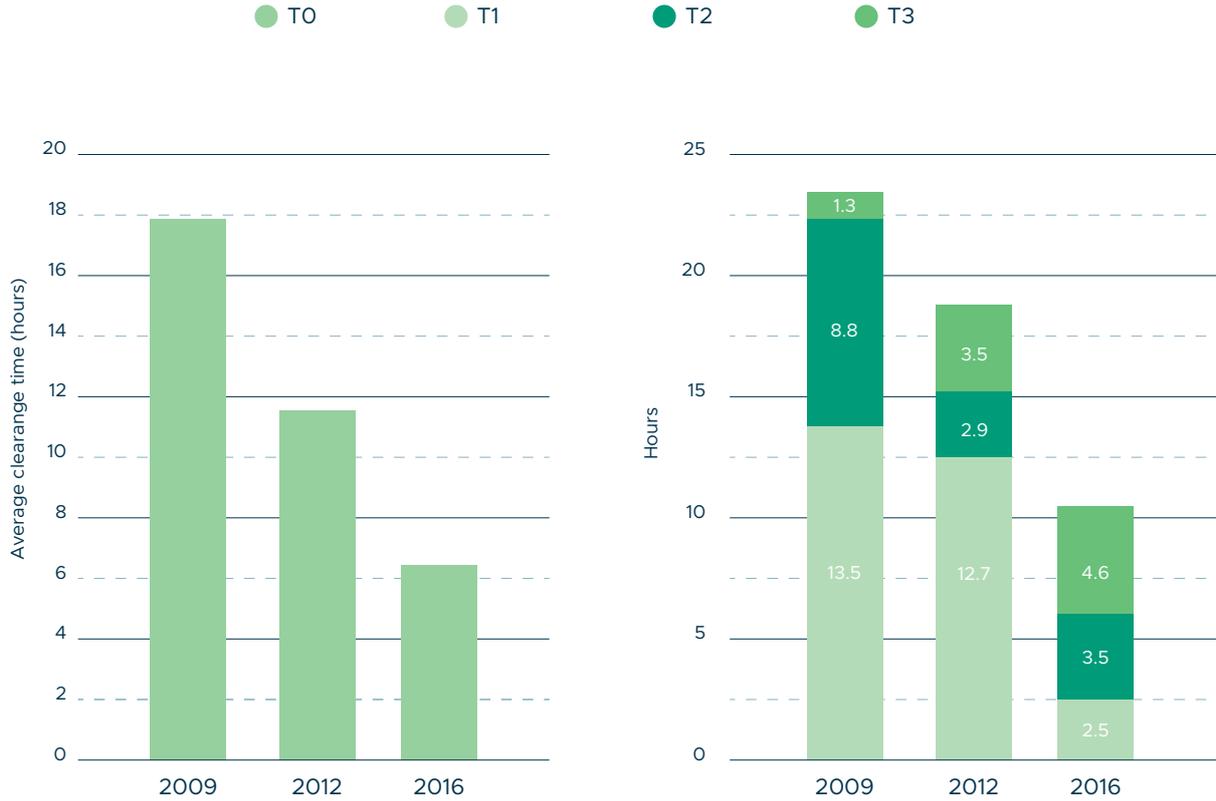
3. Four time intervals were measured as follows:

T0: Arrival-Removal was the overall interval between the arrival of a shipment at the checkpoint and its physical removal after receiving permission for release. It represented the average time required for cargo clearance at the border crossing.

T1: Arrival-Unloading was the interval between the arrival of a shipment at the checkpoint and the end of unloading of the cargo at the temporary storage warehouse.

T2: Declaration-Permission was the interval between the lodgement of the Customs declaration and permission to release the cargo granted by Customs.

T3: Permission-Removal was the interval between the granting of permission for release and the physical removal of the goods from the temporary storage area.



4. The design of the 2016 Lao TRS was as follows:

- Traffic modes: road and air
- Duration: 21 March - 24 May 2016
- Types of goods: all shipment types
- Survey sites: ten Customs border posts and one Customs office at the international airport
- Numbers of samples: 832 declarations for road shipments
- And 45 for air shipments
- The data was collected manually.

5. The WCO TRS software was used to develop questionnaires and for data collection. However, different software was used to analyse the data, as the Lao Customs Department wanted to analyse other parameters, such as medians and percentiles.

6. The results of the 2016 TRS allowed LCD, among other things, to observe the impact of the successful implementation of various policies and actions in the national clearance process. The figures above clearly indicate that one of the major outcomes of LCD carrying out periodic TRS is that average clearance times have been significantly and steadily reduced between 2009 and 2016.

7. As per the WCO TRS methodology, one of the main purposes of the TRS was to identify bottlenecks in the clearance process, and to formulate recommendations to address these bottlenecks. The 2016 TRS found some areas for improvement. These are detailed below, together with the respective recommendations.

Findings

Risk analysis results were dominated by the high risk category, with 42% of cases flagged as requiring physical examination. Selectivity was introduced in 2012, but risk profiles have not been updated in a consistent manner.

Recommendation

Higher-risk shipments require mandatory inspection, and therefore incur substantially longer clearance times. Improving the accuracy of risk categorization is therefore an obvious area for improving overall clearance times. The risk profiles should be reviewed and updated more regularly by incorporating changing factors, such as trade patterns, levels of compliance, records of seizures, and intelligence.

Findings

Operational hours were too short. The trade volumes transacted through each Customs border post varied widely. Service hours in all offices were the same (08.00-16.00) on the working days of Monday to Friday.

Recommendation

The Study revealed that 62 shipments, or 9% of the total, took over 48 hours to process from arrival to removal. Analysis of these shipments showed that the main reason for the delays was that declarations were lodged at the end of the week (Thursday or Friday), and thus the completion of the permission stage was delayed until the following Monday. Extending the hours of operation at each checkpoint from five to six days a week, and/or extending working hours beyond 16.00, would address these delays and should lead to a decrease in the T0 and T2 intervals observed.

Findings

Telecommunications connections in several Customs offices located in remote areas were not stable, interrupting the cargo clearance process as a result.

Recommendation

- The ASYCUDA system also needs to establish a connection to the central database, so disruptions to the network either at the local checkpoint or at the central database do not stop the system from being able to process shipments.
- The Lao Customs Department should focus on improving the reliability of the ASYCUDA system network. Additionally, an emergency plan should be established. For example, a paper-based process could be used during network outages, which would slow down the Customs process but enable the checkpoint to continue operating. The data could then be entered into the system when it came back online.

Findings

The implementation of the ASYCUDA system helped standardize the Customs process in many checkpoints in the country. Nonetheless, there are still variations in Customs procedures at different checkpoints. A number of these are due to the layout of the checkpoint, as some have warehouses and storage spaces that are far away from the actual border checkpoint.

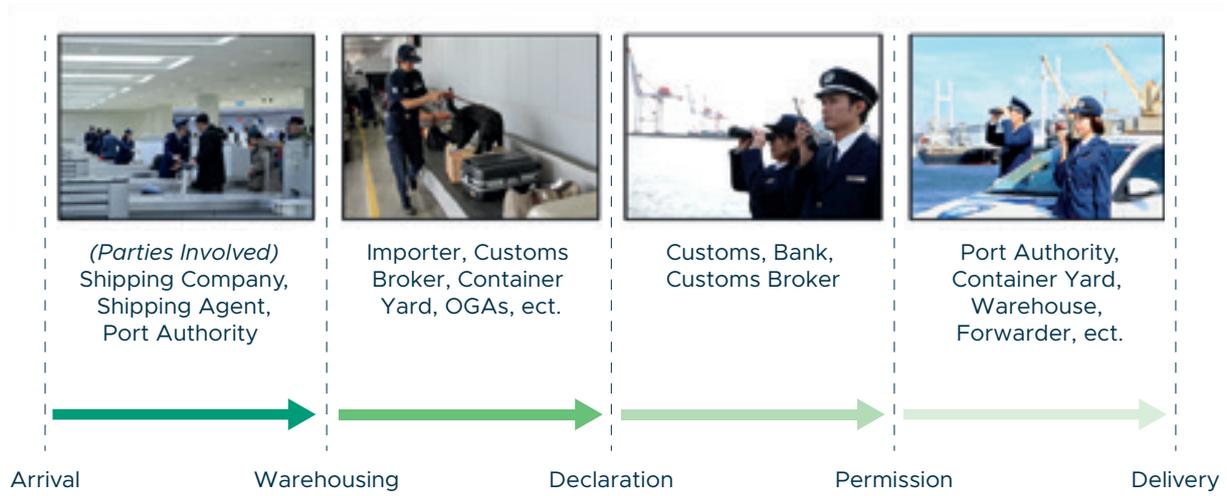
Recommendation

Lao Customs should standardize its cargo clearance procedures to ensure a seamless clearance process. Staff relocation and facility improvement may be needed at some border crossing checkpoints.

 **JAPAN**

The TRS as a Tool for Measuring the Performance of Trade Facilitation Measures

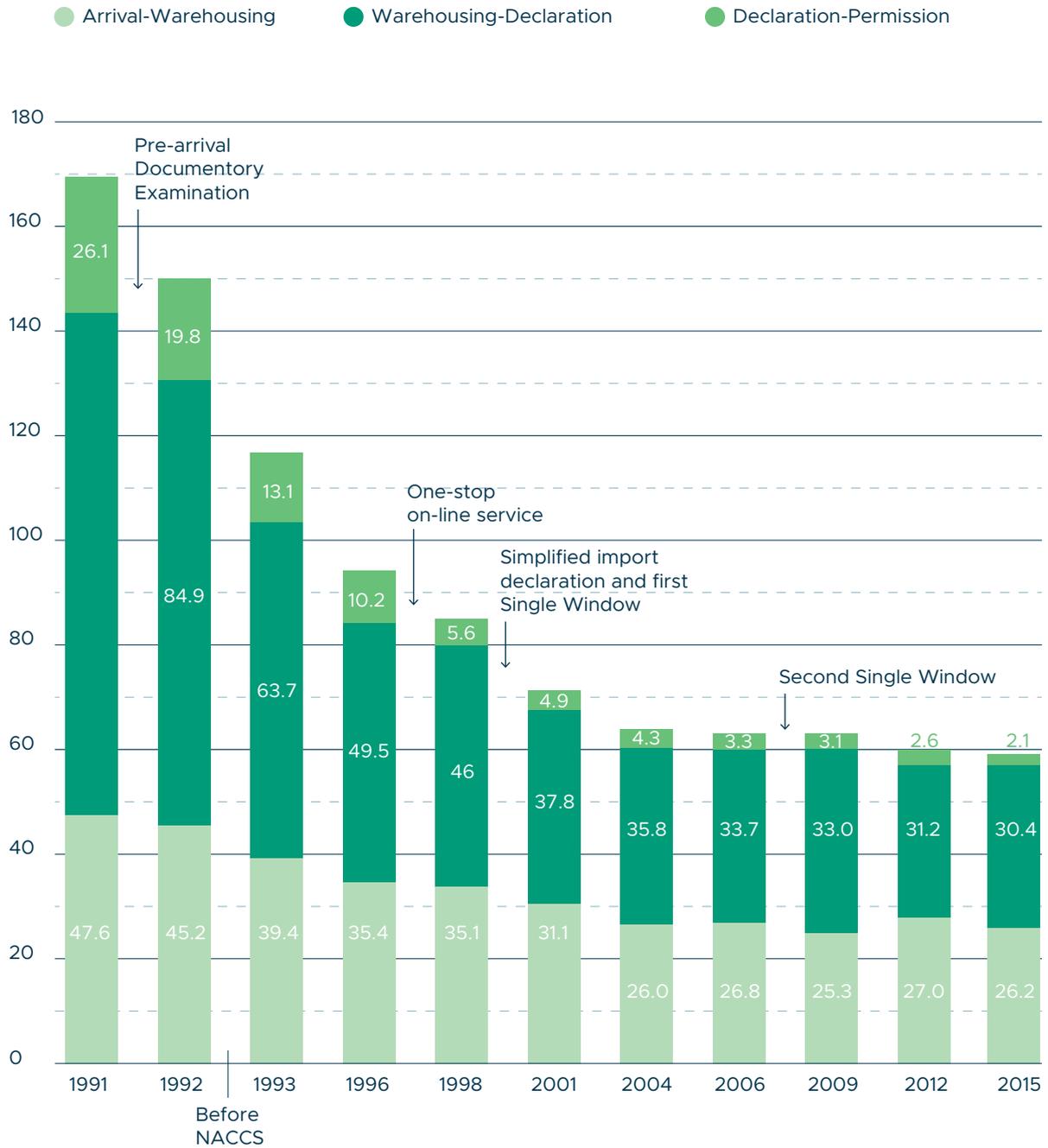
1. Japan is a WCO Member which is regarded as one of the pioneer countries in terms of carrying out Time Release Studies, having undertaken them on a periodic basis since the 1990s. Japan Customs has used the TRS results as a Customs performance indicator, and to evaluate the efficiency of new trade facilitation measures, including Customs schemes and procedures. The normal scope of the TRS in Japan is illustrated below, covering the key intervals.



2. Each TRS cycle allows Japan Customs to evaluate the impacts of a number of measures it has undertaken on the import clearance of goods. The “Changes in the mean time required for clearance” in the results of the 2015 TRS clearly show that the introduction of various measures, such as pre-arrival lodgement of the goods declaration, and the Single Window and AEO programmes, have made a positive contribution to reducing the time required for release over the years.

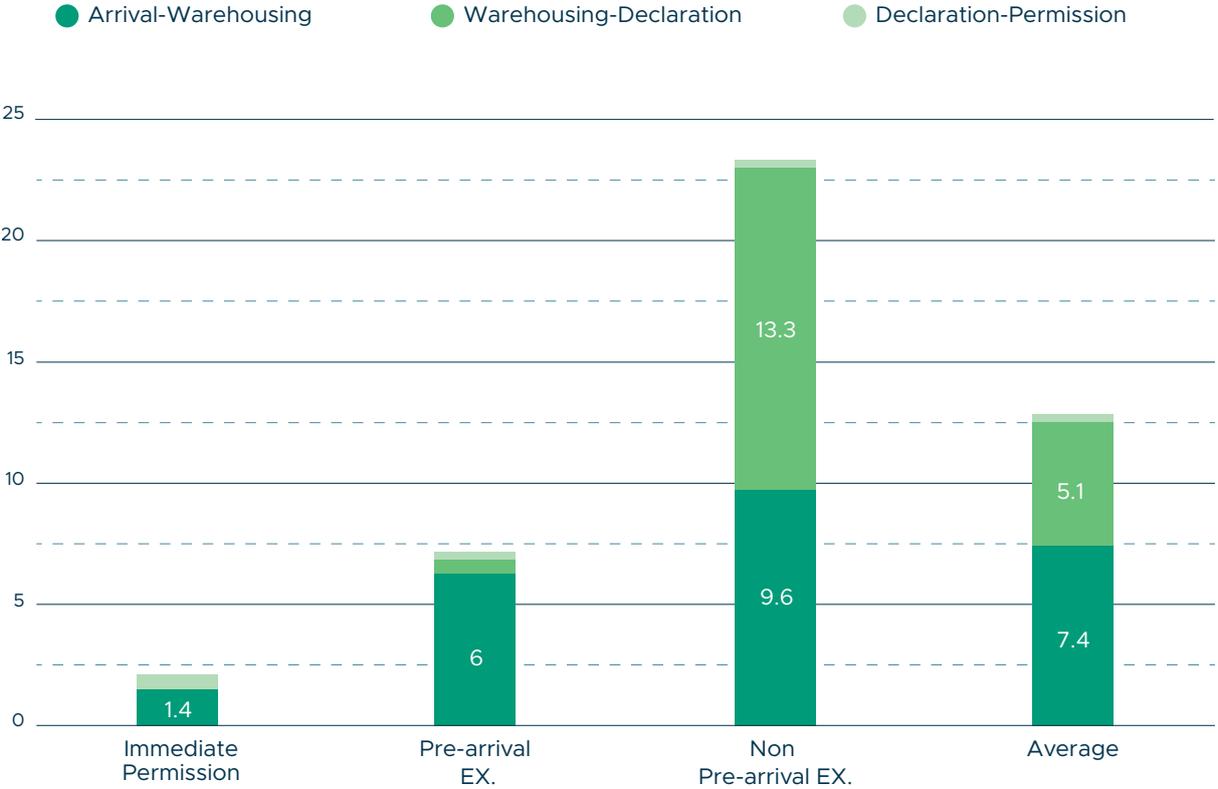
3. Taking the results for general sea cargo (not including AEOs) as an example, the mean time has decreased by 108.7 hours over the last two decades. This is shown in the graph below, which also includes the results of the 2015 TRS in Japan. The graph clearly illustrates the steady reduction in times required over the years in which Japan has carried out TRS.

Changes in the mean time for a time period from arrival to release (Sea Cargo)



4. In addition to the general trends relating to the mean time required from arrival to release, a number of additional comparisons can be made on the basis of results of the previous Studies. These include analysis by mode of transportation or by specific measure. The graphs below illustrate the analyses made in respect of the 2015 TRS for the Air and Sea modes of transport. The graphs explicitly show the benefits of conducting TRS when different measures are implemented well.

Comparison of the mean time required for a time period from arrival to release applying Pre-Arrival Examination (Air Cargo 2015)



Comparison of the mean time required for a time period from arrival between AEOs and non-AEOs (Sea Cargo 2015)



5. In total, 24 major seaports/airports out of 188 points of entry were chosen within the scope of Japan’s 2015 TRS, which had the following design:

- Duration: seven consecutive days (9-15 March 2015)
- Traffic modes: sea and air
- Types of goods: all cargoes
- Geographical scope: all regional Customs
- Choice of Customs offices: 16 major seaports and eight major airports.

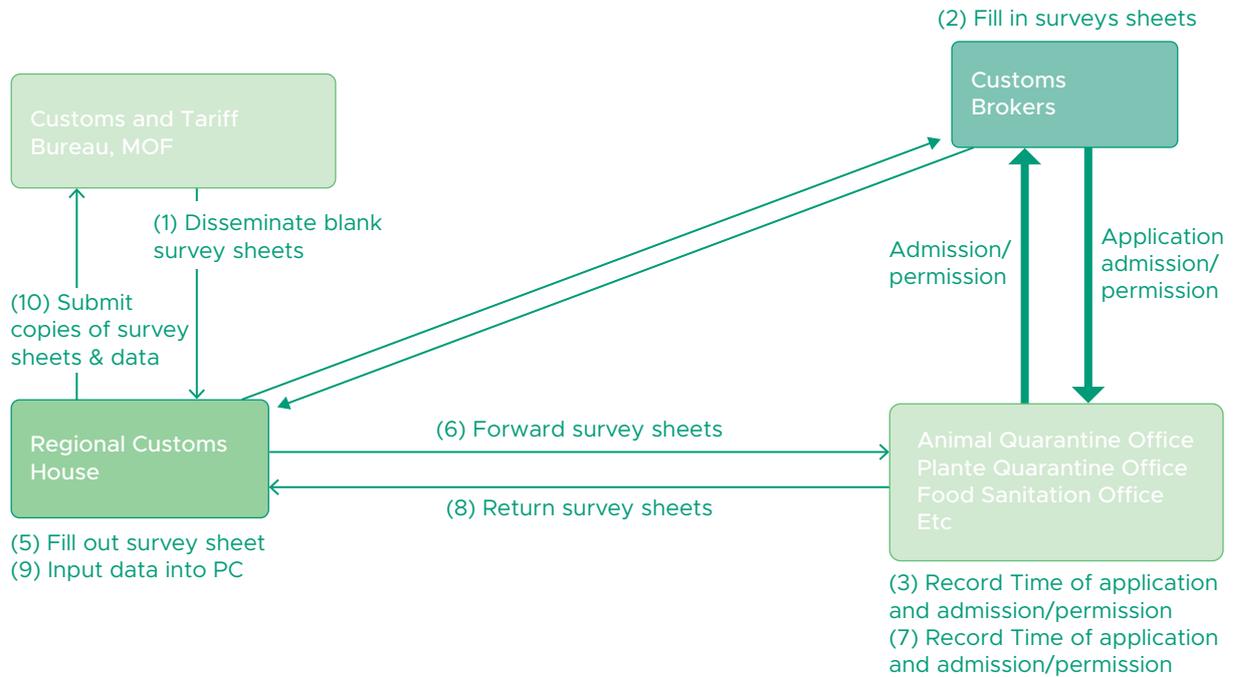
6. It took approximately six months to complete the 2015 TRS project, from preparation to issue of a press release on the results. The various stages of implementation are described below.

January-February 2015: Pre-survey internal coordination to:

- Set the dates of the survey
- Determine the number of samples to be taken
- Review elements of the survey
- Prepare survey forms (air/sea), including lists of factors taking longer than average
- Coordinate with Customs brokers and relevant Other

7. Japan Customs established a cooperative framework for collaborating with other government agencies and business. Nine regional Customs offices played significant roles in communicating with OGA and Customs brokers, and in collecting/recording data under the guidance of the Customs and Tariff Bureau, and the Ministry of Finance (parent Ministry). OGA and Customs brokers provided regional Customs offices with detailed data on the TRS. The workflow for collecting the data is illustrated below.

8. Given the importance of continuing these Studies on an ongoing basis for the purposes of performance measurement, Japan Customs has conducted a TRS every two to three years over the last 20 years. Japan conducted its latest TRS in March 2018, and the results will be published in due course.





MAURITIUS

1. Background

In 2015, Mauritius, which was among the first five countries to ratify the WTO Trade Facilitation Agreement (TFA), categorized Article 7.6 (“Establishment and Publication of Average Release Times”) as a Category C provision, requiring the acquisition of assistance and support for capacity building. A request was therefore made to the WCO for provision of technical assistance to build the capacity of public and private representatives in order to conduct Time Release Studies, and a workshop was held in April 2016, with financial support from the Customs Cooperation Fund of Japan (CCF/Japan). The workshop was attended by some 50 participants, representing all the major actors intervening in the cargo supply chain.

2. Objective of the TRS

Following the workshop, a decision was made to carry out a TRS in Mauritius from 5 September to 9 October 2016. It was expected that the TRS would positively contribute to trade facilitation and improve the ranking of Mauritius in the World Bank’s Ease of Doing Business Report.

Accordingly, the TRS was aimed at achieving the following objectives:

- a. Complying with one of Mauritius’s Category C TFA commitments pertaining to the “Establishment and Publication of Average Release Times” under Article 7.6; and
- b. Assisting national efforts to improve the ease of doing business through the:
 - Identification of bottlenecks in the clearance of cargo, and
 - Formulation of specific recommendations to address these bottlenecks.

3. Setting up of committees

Three committees, each with a different mandate, were set up for proper coordination and seamless conduct of the TRS. Due care was taken to ensure the participation of all government agencies, as well as private bodies involved in the clearance of goods, and other organizations contributing to trade facilitation.

I. National Steering Committee

This Committee was set up to define in broad terms the scope and objective of the TRS. Members were invited to join this Committee at the request of the Director of Customs, as chair of the Committee. Given its international impact, the Committee was also responsible for approving the TRS Report before its publication. The Committee was composed of representatives from:

- a. Mauritius Revenue Authority – Customs Department
- b. Ministry of Finance and Economic Development
- c. Ministry of Foreign Affairs, Regional Integration and International Trade
- d. Board of Investment
- e. Mauritius Chamber of Commerce and Industry

II. Inter-Agency Technical Committee

This Committee comprised members who are actively involved in the cargo supply chain. Most of the members participated in the TRS workshop facilitated by the WCO in April 2016. Its members played the essential role of apprising the group of the different process flows pertaining to their respective organizations and how best to capture the different time-stamps. This Committee was also set up at the request of the Director of Customs.

III. Customs Working Group

The Customs Working Group had overall responsibility for coordinating the TRS processes and was composed of 16 Customs officers who had participated in the TRS workshop facilitated by the WCO. They were selected from different sections of the Customs Department so as to provide proper understanding of the various procedures applicable in all sections involved in clearance processes. This Working Group was responsible for:

- a. Determining the methodology, sampling method, the data to be collected and the collection method;
- b. Designing the questionnaires, and conducting training and awareness sessions with stakeholders on the questionnaires and data to be collected;
- c. Distributing, collecting and verifying the questionnaires;
- d. Operating a virtual helpdesk to assist with completion of questionnaires;
- e. Recording all manual data using Excel;
- f. Determining the analysis to be carried out and performing calculations on data collected;
- g. Drafting and submitting the TRS Report, together with recommendations, to the National Steering Committee and to management for approval;
- h. Holding regular meetings with the different Committees in order to provide feedback on the progress of the Study and the results obtained.

4. Scope of the Study

It was decided that, since the country is relatively small, with a single port and a single airport, the Study would be carried out at both locations, for both imports and exports.

The scope of the Study, as directed by the TRS Steering Committee, therefore encompassed the following:

- a. Sea and air consignments into Mauritius during the period from 5 to 11 September 2016;
- b. Sea and air consignments for which a declaration had been submitted during the same period;
- c. Follow-up of the consignments at (a) and (b) above, from the arrival time of the vessel/aircraft, to the gate-out time of the consignment from the landing place/warehouse, up to 9 October 2016.

5. Data collection and analysis

The Study findings were based on data retrieved from the various IT systems operated by the main stakeholders in the logistics supply chain. Data pertaining to non-automated processes was collected manually from economic operators by means of specially designed questionnaires. The completed forms were physically submitted/collected or sent via email, and the data then compiled in the required format (Excel files).

All data collected/retrieved was compiled in two master databases, one for imports, and the other for export consignments. The analysis was conducted using these two master databases.

The table below provides an overview of the number and percentage of records used for the Study.

Consignement Type	Description	Number of records for study period	Number used for analysis	Percentage used
Sea Imports	No. of Full Container Load (FCL) consignments	1,742	769	44%
	No. of FCL containers	1,629	1,401	86%
	No. of declarations for FCL containers	1,575	775	49%
	No. of Less than Container Load (LCL) consignments	2,060	751	36%
	No. of declarations for LCL consignments	698	644	92%
Air Imports	No. of air consignments	1,600	803	50%
	No. of air declarations	1,431	1,344	94%
Sea Exports	No. of declarations	1,666	1,666	100%
Air Exports	No. of air declarations	910	345	38%

6. Overview of results

The median was used to calculate the results as it was considered more representative of the central trend of the data collected than the mean, which was greatly influenced by extreme values/outliers collected. The tables below provide a summary of the median time taken for the various key procedures to be completed for the import and export of goods, respectively.

It should be noted that “Submission of the BOE up to Customs release” and “Customs release up to gate-in” take comparatively longer for exports by air. This is due to the fact that, unlike exports by sea, where consignments can be transferred to the place of shipment in containers in a single trip, goods pertaining to a single air consignment sometimes have to be transferred in multiple stages.

7. Findings and general recommendations

The table below provides an overview of the findings derived from a careful analysis of the results obtained, and the corresponding recommendations.

Import Processes	Sea	Air	Exports processes	Sea	Air
Vessel/aircraft arrival up to submission of the Bill of Entry (BOE)	25.44 hours	22.3 hours	Submission of the BOE up to Customs release	16 minutes	38 minutes
Submission of the BOE up to Customs release	22.56 hours	2.9 hours	Customs release up to gate-in	2.8 hours	10.9 hours
Customs release up to gate-out	27.12 hours	2.3 hours	Gate-in up to loading on vessel/aircraft	28.8 hours	4.2 hours
Vessel/aircraft arrival up to gate-out	5.15 days	1.9 days	Submission of the BOE up to loading on vessel/aircraft	4.4 hours	4.5 hours

Findings	Recommendation
Only 25% of BOEs relating to sea consignments are submitted prior to arrival of the vessel.	Promote pre-arrival clearance through stakeholder meetings and other awareness sessions.
The working hours of Customs, the Cargo Handling Corporation Ltd. (CHCL), logistics operators and agencies involved in the clearance of goods do not match.	Harmonize working hours for border agencies and operators to provide 24/7 uninterrupted service.
Only 47% of sea consignments are physically removed by importers/hauliers within one day of Customs clearance.	Expedite the removal of goods after Customs clearance by providing incentives for early removal.
Not all agencies or organizations involved in the clearance process are present at the port and airport	House all border clearance agencies under one roof or empower Customs to administer the requirements for permits and authorizations.
Only a few importers have a clear picture of the submission and processing of their declarations.	Improve visibility as regards the submission and processing of declarations, through automatic messaging with importers.
616 tariff lines require clearances from multiple agencies. This means that importers sometimes have to go to various offices to obtain clearances for a single consignment.	Review and re-engineer the process for permits and authorizations and expedite the implementation of a Single Window.

In addition to the above recommendations, other issues were brought to the attention of the Customs Working Group during the various meetings and discussions with economic operators in the supply chain. Although these are not a direct result of the TRS, some valuable suggestions have been taken up. These are listed below.

1. Create a new exit gate for scanned containers to improve truck turnaround times.
2. Review Customs procedures for the examination of goods, including the automation of appointments with automatic messages to declarants/importers and CHCL.
3. Adopt a comprehensive approach for declaration processing, whereby examination, valuation and classification of goods by Customs can be carried out simultaneously.



NEW ZEALAND

New Zealand's history of Time Release Studies

1. New Zealand has a modern and well-developed cargo reporting system and Customs clearance processes combined with risk management. Cargo is reported electronically and in advance of arrival. The cargo reporting information is electronically risk-assessed and, if accepted, cleared by Customs, often before arrival of the vessel carrying that cargo. Payment of any duty and taxes is by deferred payment account or cash.
2. The Time Release Studies carried out by New Zealand Customs have, in the main, been used to confirm and provide the data and evidence in support of the Customs clearance processes, and to measure Customs performance in facilitating trade. That is, the Studies are used as a measurement and validation tool, rather than as a tool for change. In periods between major changes to border clearance processes, it is expected/assumed that there will be little variation and reasonable stability in the TRS measures, and certainly no variation statistically significant enough to indicate any major changes (ongoing) in performance. That is, once the major change is implemented and settled in, the times required for clearance should remain relatively stable and consistent until the next change.
3. New Zealand Customs has carried out three Time Release Studies and assisted in one other: there were two Studies in 2009 – a New Zealand only Study and a trans-Tasman Study with the Australia Border Force; in 2010 there was a further New Zealand only Study; and in 2014, a TRS was carried out with Cook Islands Customs.
4. The 2009 trans-Tasman TRS was jointly led by New Zealand and Australia. This Study extended the application of the methodology to include exports, with a methodology and measures developed for exports. It measured the performance of both countries' Customs in clearing cargo from export in one country to import in the other, and vice versa. This TRS found that both Customs were efficient in clearing cargo and did not impede clearance.
5. The trans-Tasman TRS is an example of how two Customs organizations worked co-operatively together and overcame differences in policy, processes, border clearance events, and definitions to produce a joint consolidated analysis and Study. A key lesson drawn from this Study is to get together pre-Study, with the aim of understanding each other's border clearance processes, the stakeholders involved, the key parts of the process that need to be measured, and whether it is possible to measure them. It was also important to ensure that both agencies were clear about, and agreed on, the definitions and measurement of the key clearance events measured in the Study.
6. The 2010 New Zealand TRS enabled comparative analysis with the 2009 Study and reported on changes in the measurements and performance of Customs in the time it took to clear cargo. The 2010 Study verified and confirmed the findings from the 2009 New Zealand Study.
7. The objectives of the 2010 Study were to: replicate the 2009 Study to produce comparable measurements; compare the year-on-year results to show any changes over time; and identify opportunities to improve performance.

Results of key measurements (days) from the 2010 NZ TRS

IMPORT	Sea 2010	Sea 2009		Air 2010	Air 2009
Arrival to release	-1.8	-1.8	Arrival to release	0.5	0.3
Arrival to gate-out	2.6	2.8	Arrival to availability	0.1	n/k
% release before arrival	74	75	% release before arrival	40	60
EXPORTS	Sea 2010	Sea 2009		Air 2010	Air 2009
Receipt to lodge	0.8	1.5	Receipt to lodge	-0.9	n/k
Clear to load	-4.5	2.8	Clear to load	-1.2	-1
% cleared > 48 hrs loading	87	82	% cleared > 9 hrs loading	70	76

8. There were changes, but mostly minor, in the 2010 measures compared to the 2009 baseline measures. Generally, Customs performance in clearing cargo (trade facilitation) remained at a comparable and similarly high level to that found in 2009. This was expected, given that there had been no changes to the cargo clearance process or systems.

9. The findings from the 2010 Study support those from the 2009 Study. The key findings are:

- Customs is efficient in clearing cargo at the border and does not impede trade unnecessarily.
- The level of advance or early reporting for imports by sea remains high, with a high percentage of cargo cleared for release by Customs before arrival. Advance reporting was a key finding from the 2009 Study. There are benefits to Customs and traders from completing Customs clearance requirements early. Customs' early receipt of the required documents for assessing and processing release of cargo provides more time and certainty, benefiting both Customs and travellers.
- Export reporting and clearance measures for sea cargo have improved, supporting the 2009 finding. Reporting as soon as the cargo enters Customs' control provides time for Customs to assess and process the information and take any action, so as not to impede the cargo before it is loaded.
- The analysis of export full container load (FCL) shows benefits to exporters who are Secure Exports Scheme (SES) partners. The SES is New Zealand's equivalent to an AEO programme.
- Unlike sea cargo, air cargo is reported later — after arrival. In 2010, both the reporting time and percentage of entries lodged before arrival declined (did not improve) compared to 2009. The information required to complete Customs' reporting requirements, and shorter transport and dwell times, are the most likely explanations why air cargo is reported later. In addition, it is thought the increase in overseas online purchases has led to an increase in air cargo volume and in the workload to prepare and lodge the documents for import clearance.

Main contribution of the TRS to the Government's goal

10. At the Government level, the TRS, to date, supports the over-arching goal of delivering greater prosperity, security and opportunity to all New Zealanders, and to growing the economy. The TRS also contributed to the Customs Annual Plan for 2010- 2013 and supported one of the priorities agreed with the then Prime Minister and Minister of Customs, which was to “Enhance border agency coordination to reduce duplication and improve the experience for traders and travellers” (as per the “Statement of Intent 2010-2013”). This was done by identifying opportunities to improve service delivery and hence the experience of traders.

Most recent TRS in New Zealand: the 2014 “Cook Islands TRS”

11. In 2014, New Zealand Customs assisted Cook Islands Customs in carrying out a TRS. This Study was part of the Cook Islands Customs modernization programme, and aimed at measuring the impact on clearance times of a new computer system for processing cargo (CusMod). The system was installed and implemented in November 2013, and represented a major technological step in the modernization of processing import entries and releasing cargo. In effect, the cargo clearance process changed from a manual process to an electronic process. An earlier Study carried out in May 2013 by the Oceania Customs Organization (OCO) enabled a “before and after” comparison.

12. The main reasons for carrying out this TRS in 2014 were:

- To measure if the new computer system had an impact on cargo clearance times for imports;
- To compare times with the OCO TRS; and
- To provide a baseline set of times.

13. The three-phase approach of the TRS methodology was also followed for the Cook Islands TRS, and adapted to local conditions, cargo volumes, and flows. It is worthwhile to underscore the following in respect of each of the phases:

- Phase One involved planning and preparation in New Zealand, and contact with Cook Islands Customs, to establish a Working Group. The cargo arrival and clearance process was observed and the design of the Study scope and methodology developed and adapted to the local conditions.
- Phase Two involved the collection of information and data, the observation of arrival and unloading processes, and the recording of times (for example, for manual entries lodged during the TRS week). Much of the data was collected manually.
- Phase Three involved the analysis of the data and writing of the Report.

14. The TRS targeted all international flights for the week spanning Monday 10 November to Sunday 16 November, and the three cargo vessels that discharged cargo during the month of November. Only imports were studied.

15. This Study showed improved times for cargo clearance for Cook Islands Customs as a result of the investment in the computer system.

16. Important to the success of this Study was the pre-Study work that involved developing a working relationship, and working with and alongside Cook Islands Customs. This enabled the unique local conditions to be observed, and ensured all aspects of the local cargo arrival and clearance process were incorporated into the TRS scope and methodology (for example, having to adjust the times to account for vessels, aircraft, and cargo crossing the International Date Line).

Highlights of the Time Release Study : Cook Island Customs

Events	2013 Study (by OCO - preCusMod period)	2014 Study (by NZ Customs post-CusMod period)	Remarks
Manual vs electronic processing	100% manuel	74% CusMod 26% Manual	Change is a significant outcome. Lodgement via CusMod might increase but due to loca conditions it would be difficult to have 100% entries lodges electronically
Average release time of entries - see cargo	145 hours after arrival	27 hours after arrival	Significant positive outcome
Average release time of entries - air cargo	27 hours after arrival	13 hours after arrival	Significant positive outcome
Lodgement		Lodged 58 hours earlier when compared to	Traders taking up benefits

Mode/entry type	Drop-off to RA	RA to EO/Lodge to release	EO to pick-up	Drop-off to pick up
Manual vs electronic processing	100% manuel	74% CusMod 26% Manual		
Average release time of entries - see cargo	145 hours after arrival	27 hours after arrival	Significant positive outcome	
Average release time of entries - air cargo	27 hours after arrival	13 hours after arrival	Significant positive outcome	
Lodgement		Lodged 58 hours earlier when compared to	Traders taking up benefits	

17. In summary, the introduction of the computer system for cargo processing significantly reduced the times for processing and clearing import entries, compared to the manual processing days. The electronic processing is faster, freeing up officers' time (otherwise spent on manually checking the import entry and documents) so that it can be spent on other work activities.

18. The findings from this Study can be used as a baseline set of times to compare against future Time Release Studies; and to make changes to further improvements in the processing and clearance of cargo.

New Zealand's next Time Release Study: 2018

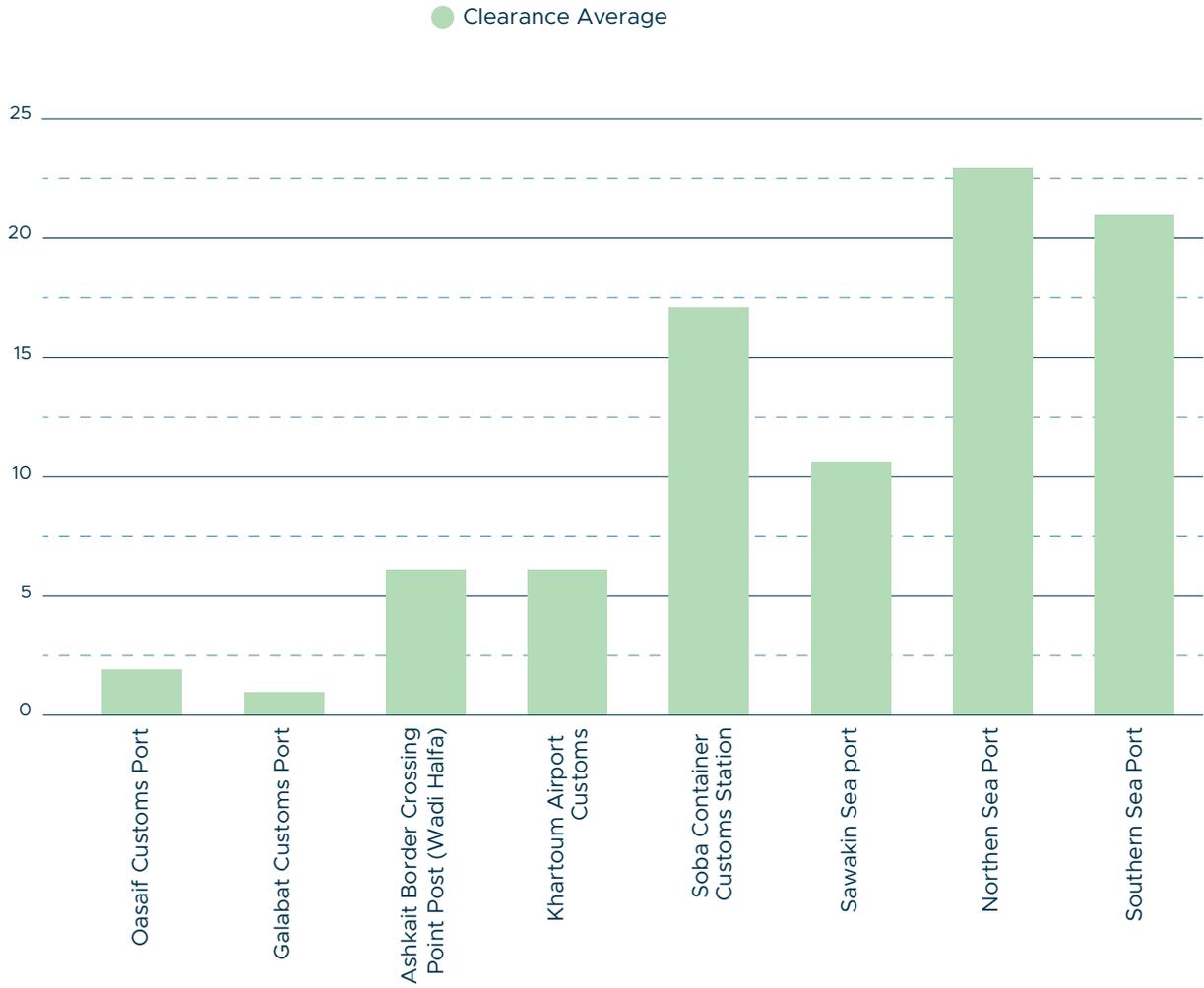
19. Another TRS is scheduled for 2018. Since the last Study, there have been changes to the clearance of cargo at the New Zealand border. Another TRS will provide data and evidence to measure the impact (in time) of these changes.

SUDAN

Sudan 2015 Time Release Study

1. Having already carried out Time Release Studies, in 2014 the Sudan Customs Administration made the decision (unprompted by COMESA) to conduct another Time Release Study (TRS) with the following objectives: to find any bottlenecks hindering trade; to identify opportunities to introduce trade facilitation measures; and to create an environment in which to strengthen Sudan's competitiveness in the international market.
2. After receiving technical assistance from the World Customs Organization in conducting a TRS, Sudan Customs established a national Working Group with the mandate to carry out such a Study. In line with the WCO TRS methodology, other Government agencies, besides the national Customs Administration, were involved in the Study, as were representatives from the private sector. The Customs Administration used the WCO TRS software to calculate the average release time.
3. Based on the sampling method, TRS data or time-stamps were collected from a number of Customs clearance stations, using a survey sample generated with the aid of the WCO TRS software. The total data collected was sufficiently representative to calculate the average release times in different Customs stations.
4. The figure above indicates the average release time at each of the stations where TRS was conducted, covering different modes of transport. It is clear that the average release time was higher than ten days for the sea mode of transport, in comparison with the two other transport modes, namely road and air, which registered an average release time of less than ten days. The container Customs station registered an average release time of 17 days.

Figure 1.1: Average clearance times at different Customs stations in Sudan



General bottlenecks

5. Although the TRS Working Group identified a number of bottlenecks related to a particular Customs station, broadly speaking the bottlenecks included the following:
- Operational problems in moving goods to Customs-inspected areas, particularly in the case of goods handled at the Red Sea ports;
 - Delays with regard to verifying manifests submitted by transport companies, mostly related to Khartoum airport;
 - Delays in sending original documents related to the consignment to local banks, a requirement stipulated in Sudan's national legislation.

General recommendations

6. In order to mitigate or tackle the problems, the following general recommendations were made:
- Resolve transportation problems in moving cargo;
 - Speed up the completion of the Single Window project;
 - Amend the circulars of the Central Bank of Sudan concerning the movement of cargo to ensure the smooth flow of goods.
7. Although the decision to conduct a TRS was made in 2014, the Study was only initiated in 2015, and the Final Report approved in 2015. After national approval of the TRS Report, Sudan decided to share a copy with the WCO.

Sudan 2017 Time Release Study

8. More specifically, in the field of trade liberalization and Customs cooperation, COMESA Member States have been engaged in a number of trade facilitation initiatives aimed at eliminating tariffs, and simplifying and harmonizing the Member States' trade documents and procedures. The intention is to reduce the cost of doing business, including transaction costs related to the import and export of goods within the region and beyond.
9. Upon a recommendation by COMESA, in 2017 Sudan decided to conduct another TRS as part of a continuous improvement strategy, and to evaluate the impact of earlier trade facilitation measures that had emerged from previous Studies conducted in the country. As per the figure below, Sudan followed the three phases described in the TRS Guide (Version 2). The Study was carried out in accordance with the WCO TRS methodology, using the WCO TRS software.
10. The TRS was carried out in a number of places, covering three modes of transport and different Customs procedures, such as import and export. As recommended in the WCO TRS Guide, after entering the TRS data collected into the WCO TRS software, a single Report was generated, indicating the average release time at each of the Customs clearance points where the TRS was conducted.

11. As often happens when Sudan carries out a TRS, the average release time was highest in the sea mode of transport, followed by air, and then road. The main reason why the average release time for air was higher than for road is that, for road, Sudan only considered the waiting time for trucks to enter Sudan Customs territory.

Figure 1.2: Thre-phase TRS methodology followed by Sudan



12. The predominant causes of delay in clearance are as follows:

- Repetitive and unproductive processes in the clearance system;
- Documentary checks based on a transaction approach rather than risk management;
- Excessive controls on consignments, resulting in checking and rechecking of the same information by several different sections (e.g. valuation, assessment);
- Poor quality of some declarations lodged by clearing agents, resulting in rejection and queries in respect of the declarations at different levels;
- Delays in clearance procedures, due to lack of investment in infrastructure in certain cross-border regulatory agencies;
- Delayed payment of duties, taxes and other charges by importers or their clearing agents;
- Lack of interconnectivity between Customs and other agencies; and
- Lack of equipment for moving goods to the examination and offloading areas.

LIST OF ABBREVIATIONS

AEO	Authorized Economic Operator
CBM	Coordinated Border Management
FCL	Full Container Load
GPS	Global Positioning System
ICT	Information and Communication Technology
LCL	Less than Container Load
NCTF	National Committee on Trade Facilitation
RFID	Radio-Frequency Identification
RKC	Revised Kyoto Convention
TFA	Trade Facilitation Agreement
TRS	Time Release Study
WCO	World Customs Organization
WTO	World Trade Organization
WTO TFA	World Trade Organization Trade Facilitation Agreement

GLOSSARY OF TRS CUSTOMS TERMINOLOGY

Bilateral TRS

TRS carried out between two countries, either at a single or at multiple border posts or Customs offices, involving the collaboration and participation of officials from both countries.

Consecutive TRS

Within the national, bilateral or multilateral context, TRS conducted at one or more border posts or Customs offices or along different routes, followed by additional Studies conducted at other border posts or Customs offices or along different routes, the results of all Studies being compiled in a single TRS Report.

Multilateral TRS

TRS carried out between more than two countries in a regional context, either along a single or along multiple routes across all the countries involved, and requiring the collaboration and participation of officials from all the countries concerned.

Physical Release

The step of the clearance process when the goods are physically placed at the disposal of the importer or exporter or his/her legal representative for home consumption or export or any other Customs procedure. In the case of export or international transit, it is the stage when the goods are considered to have departed the Customs territory.

Simultaneous TRS

Within the national, bilateral or multilateral context, TRS conducted at the same time at different border posts or Customs offices or along different routes, the results of all Studies being compiled in a single TRS Report.

Test Run

A simulation of the data collection exercise to ensure that the Study will be able, as planned, to capture all the required time-stamps necessary to establish average clearance times. The test run will help identify changes required in the plan to allow effective collection of data. Often, countries conduct this exercise for a minimum of two days.

TRS Cycle

List of tasks to be completed in a chronological order when conducting the Time Release Study, namely: Planning, Data Collection, Testing and Validation, Calculation of Results, Analysis, Identification of Findings, Drafting of Recommendations, Reporting, and Monitoring and Evaluation. It is often followed by another cycle after two or three years.

TRS Report

Report drafted at the end of a Time Release Study to disclose the average physical release times, as well as the average duration of various procedures that have been recorded through the Study. The Report may also contain other details, such as the scope and methodology used for the Study, as well as recommendations to improve release times.

TRS Statistical Report

The TRS statistical report provides details of the number of transactions used for the Study, as well as details of time-stamps for the completion of the different procedures in the Customs clearance process, and establishes the average release times, either for specific procedures or for the whole process.

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