

E-Trade Age and Supply Chain Resiliency

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A contribution to the Policy Hackathon on Model Provisions for Trade in Times of Crisis and Pandemic in Regional and other Trade Agreements

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Executive Summary

Despite the world having suffered several pandemics in the past, COVID19 has been tremendously harmful in all aspects, primarily due to the unpreparedness of an infection that has reached so far 216 countries worldwide in a matter of weeks.

It is well-known the key role the trade plays, not only for the economy but also to fight infection of this scale; we learned with this pandemic how quickly supply chain could be disrupted, and the consequences in a situation that the essential goods trade is needed the most.

Based on the experience with this pandemic, where medical supplies are needed as a matter of urgency to treat people in hospitals, the question is: what measures can be taken to make the Supply Chain resilient, not only to restore the disruption already caused, but also to be efficient and effective in crisis times to prevent the situation presented with COVID19? This policy brief indicates the learning topics along with the provisions followed by the Canadian government, and recommendations.

First and foremost, a virus outbreak does not mean there is a pandemic; hence, it should be taken as a reference all pandemic phases defined by the World Health Organization (WHO) and determine *the pandemic phases and actions for trade* in order to minimize the disruption; thus, a Pandemic phase/action chart for the WTO is recommended to be prepared and prevent the supply chain collapse.

The chart's backbone is the Crisis Regional Trade Agreement (CRTA), promoting the production and supply of essential goods per region to alleviate the volume of manufacturing countries that are equally or more affected by the virus. It will not only help the local economy by generating work, but also will help to shorten the supply chain lead times. It is a temporary measure that will help recover the regular supply chain.

Also, it is recommended not to close the borders and ports for commerce; for this reason, it is essential to assuring the port crew's protection based on the recommendations made by the International Maritime Organization (IMO). The CRTA could promote the implementation of those measures and e-governance as crucial factors to move to the e-trade age.

This policy brief will explain each of the recommended measures as a solution to make the supply chain resilient and move to the e-trade transformation to be prepared an minimize the impact of a pandemic, or even a second wave of COVID19 in trade, and how they collaborate to reach the Sustainable development agenda 2030.

Please see below the proposal of the chart for trade presented by this Policy brief.

WTO PANDEMIC PHASES | ACTIONS DESCRIPTIONS

WTO PHASE	DESCRIPTION	MAIN ACTION	WHO PHASE	WHO PHASE DESCRIPTION
Phase 1	The cluster is localized in a region, where the essential goods are mainly produced.	Evaluate and assess the situation to define the critically.	Phase 5	Human to Human transmission of an animal or human-animal influenza reassortant virus has caused sustained community level outbreak in two or more countries in one WHO region.
Phase 2	The cluster is localized in a region, where the essential goods are mainly produced, and there is a lockdown or quarantine	Maximization of the Supply Chain and identify industries/sources that can support production of essential goods in the region.	Phase 5	Human to Human transmission of an animal or human-animal influenza reassortant virus has caused sustained community level outbreak in two or more countries in one WHO region.
Phase 3	There is a pandemic Alert.	The CRTA entries into force	Phase 6	In addition to criteria defined in phase 5, the same virus has caused sustained community level outbreaks in at least one other country in another WHO region.
Phase 4	Post peak period	The CRTA applies only to countries or regions that still have the peak.	Post peak period	Levels of pandemic influenza in most countries with adequate surveillance have dropped below peak levels.
Phase 5	Post pandemic Period	Evaluate and assess with measures that need to be still in place, until the trade practices back to normal.	Post Pandemic Period	Levels of influenza activity have returned to the levels seen for seasonal influenza in most countries with adequate surveillance.

Framework:

- This chart's application is linked with the pandemic phases defined by the World Health Organization (WHO), given that the actions per phase are taken for the period of crisis, more specifically by the current or future pandemics.
- The purpose of the phases and actions for Trade in times of crisis indicated in this document is to contribute to meet the UN Sustainable Goals, more specifically the ones indicated on the left side of this chart.
- The actions described should be triggered by the WHO phase 5 (pandemic Alert Period) when the supply chain's first step (Raw material sourcing and manufacturing) is impacted. The same way, those actions are ceased during the Post Peak Period or Post pandemic Period.
- The actions described should be applied for essential goods exclusively.
- The Crisis Regional Trade Agreement recommendations are mentioned in the Policy Brief.

Reach overview

Supply Chain disruption

January 2020: Before COVID19 was declared pandemic by the World Health Organization (WHO), the Trade and Supply Chain started suffering a disruption. China, the primary manufacturer in the world, locked down Wuhan province. Even though, most countries were purely spectators at that time, raw materials and parts supply presented delays. Consequently, the manufacturing of products was significantly affected. The forecast showed a decrease in the inventory and product delivery in North America in March.

March 2020: Two months later occurred the unexpected, COVID 19 is considered pandemic (March). Lockdowns, quarantines, and closed borders were the main measures taken across the board. Essential goods were significantly limited because the supply chain was disrupted from production until delivery to final consumers.

Despite COVID19 is not the first pandemic, and the SARcov1 outbreak was in 2003 -which has similar symptoms- this is the first global pandemic that has affected so far 216 countries¹. The level of infection and the simplicity of transit of people worldwide helped the virus spread quickly. It made governments take measures to prevent the infection that impacted the global trade and Supply Chain tremendously.

It was inevitable that the measures to prevent the virus spread disrupted the supply chain; nonetheless, the lack of essential goods, especially healthcare products during the peak, was concerning as it had harmful consequences in people's lives.

Hence, how to make the Supply Chain resilient, not only to restore the current disruption but also to be efficient and effective in crisis times to prevent the situation presented with COVID19?

Looking retrospectively

This global influenza pandemic has driven terrible consequences on all sorts of levels. Nevertheless, this situation is not unprecedented anymore, and we must be prepared to face it if a similar situation happens again.

There are some lessons that we have learned so far:

1. Be proactive, not reactive: As mentioned above, the supply chain and trade disruption happened before the pandemic was declared. It is critical to identify what triggers the disturbance and the contingency plan to follow, especially when the outbreak starts in countries with a high level of production.

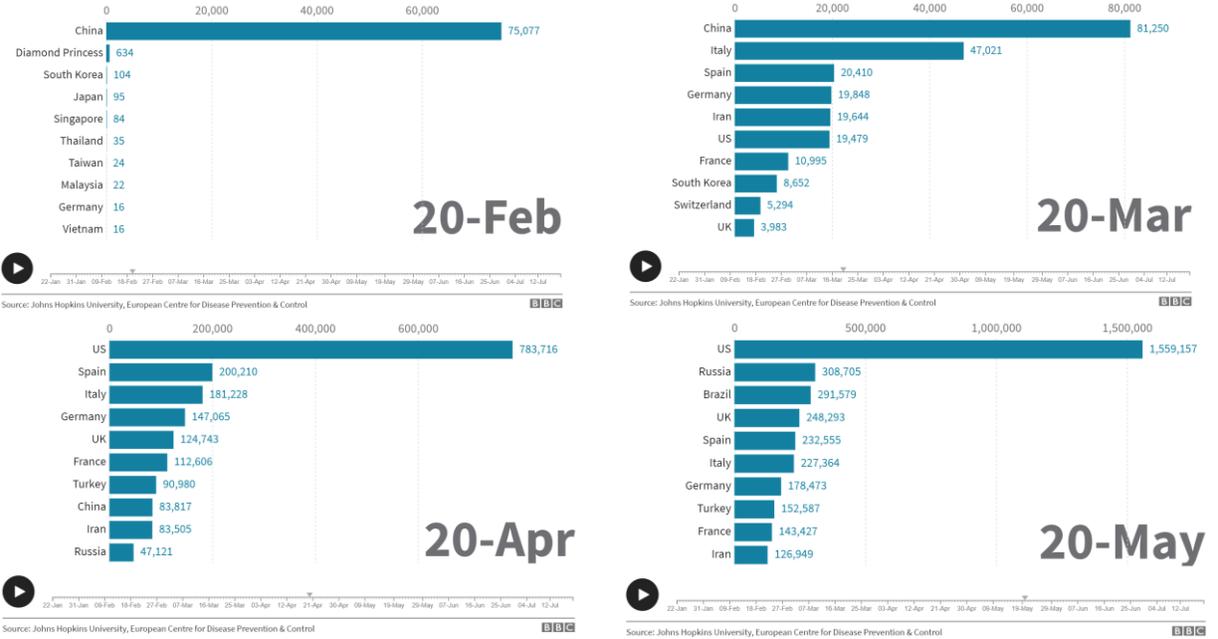
¹ World Health Organization. Coronavirus disease (COVID-19). Numbers at glance. Website: <https://www.who.int/emergencies/diseases/novel-coronavirus-2019>

It is essential to mention that China has become a critical player in the world economic ecosystem in the past years, and the capacity of production and technology implemented has made most of the countries depend on it². The fact that the outbreak (without pandemic status) happened in China affected the trade environment profoundly.

Hence, similar to, but independently of the World Health Organization (WHO) Influenza pandemic phases/actions chart, it is necessary to define the different phases and action plans for trade in the case of this type of situation. This document recommends the chart to be considered for the WTO.

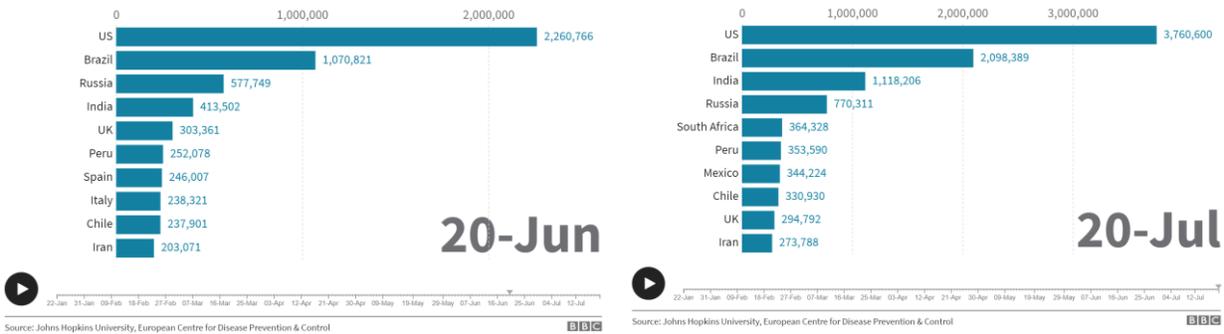
- 2. The curve: All affected countries have their curve, and the goal for all of them is to flatten it as much as possible. However, COVID 19 has shown that the peak of those curves does not reach equally, and simultaneously. Regardless of the potential factors to explain why some countries are more affected than others, the fact is that there are countries that need more assistance than others in a specific period.

The graphics³ below indicate that the number of infections and the affected group of countries are dynamic. China had the initial outbreak and then Europe, and the USA presented the most significant number of cases. We can see that currently it is the Latin American region that is having the peak. In contrast, China, Italy, and Spain are more stable now.



² Harvard Business Review. How Coronavirus Could Impact the Global Supply Chain by Mid-March. Website <https://hbr.org/2020/02/how-coronavirus-could-impact-the-global-supply-chain-by-mid-march>

³BBC News. Coronavirus pandemic: Tracking the global outbreak. Website <https://www.bbc.com/news/world-51235105>



In terms of trade, when a global crisis like COVID19 happens, the essential goods supply and trade facilitation should prioritize those countries profoundly affected that need those products the most.

The World Customs Organization (WCO) and the World Health Organization (WHO) updated the Harmonized Item Description and Coding System - HS classification - for COVID19 medical supplies; however, preferential tariffs for those items and essential goods should be implemented, mainly when countries are found in the peak of the list. It is not the objective of this document to propose the application and scope of the preferential tariffs for essential goods in the pandemic crisis; nonetheless, it suggests the extension of those tariffs for re-exported products. It promotes the supply by countries that can re-export the products even if they are not manufacturers, helping to shorten the supply chain.

3. Essential goods supply: Countries were forced to find alternative solutions to provide essential goods to the population, especially to hospitals and health centers to avoid a trade fight for the limited resources and production.

As a response and recovery of the pandemic, the Canada's government created the COVID19 Supply council which provides advice on the procurement of essential goods by building innovated and nimble supply chain that involves production, sourcing, shipping and distribution strategies. The aggressive buying approach includes ordering essential goods, especially the ones needed in front of lines services in bulk on behalf of all provinces and territories⁴.

Another measure implemented by the Canadian government is the plan to mobilize the industry to fight COVID19⁵ to support businesses and re-tool their manufacturing lines to produce essential goods, made in Canada, produced locally.

⁴ Cision. Government of Canada creates COVID-19 supply council in support of Canada's response and recovery. Website <https://www.newswire.ca/news-releases/government-of-canada-creates-covid-19-supply-council-in-support-of-canada-s-response-and-recovery-889703052.html>

⁵ Justin Trudeau, Prime Minister of Canada. Prime Minister announces Canada's Plan to Mobilize Industry to fight COVID-19, March 20, 2020. Website <https://pm.gc.ca/en/news/news-releases/2020/03/20/prime-minister-announces-canadas-plan-mobilize-industry-fight-covid>

The domestic production helps to:

- a) Ease the international supply chain.
- b) Short the supply of goods (timelines).
- c) Maintain the local economy
- d) Give the priority to countries that absolutely need to supply internationally due to the impossibility to produce locally such as the countries that are suffering the high peak.

It is clear that the domestic/local production is not an alternative for all countries, that's why actions like the ones taken by the Canadian Government should be promoted through the Regional Trade Agreement for pandemic crisis by facilitating the trade based on geographical regions: African Region, Region of the Americas, South-East Asia Region, European Region, Eastern Mediterranean Region, and Western Pacific Region.

4. e-Commerce: Social distancing, quarantines, and lockdown for some countries made change consumer behavior. e-Commerce became, at some point, the main channel for purchasing goods. However, there were/are challenges in terms of platforms (capacity), consumer data protection, and even logistics capability as the distribution, transportation, and delivery. Even though, e-Commerce is not a new trend, official entities and private companies were not prepared and equipped to deliver promptly through an e-commerce channel.

The e-Trade age

Trying to answer the initial question raised above in this document; the solution to prevent this situation from happening again, cannot be formulated without mentioning the digital component that requires it.

It is not only the e-commerce and internal policies that governments need to implement to make sure the internet, websites, and platforms are accessible in a secure way, but also the digital transformation that the supply chain needs to.

It is precisely the topic that this document concerns: e-trade. The World Bank defines it:

“(...) e-trade is one component for a modern digital economy, which focuses on how the internet serves as a market for cross-border transactions of trade in goods and services. As such, e-trade relates closely to policies on international trade in goods and services, but links only directly to other areas of the digital economy, such as e-government, virtual currencies, and governance of the internet itself”⁶

Based on the definition above, two elements are covered in this document and subject of recommendations:

⁶ World Bank Group. E-trade for development. Opportunities, Challenges, and Policy Considerations for Developing Countries. Website <http://documents1.worldbank.org/curated/en/179601549056701219/pdf/Opportunities-Challenges-and-Policy-Considerations-for-Developing-Countries.pdf>

1. Cross-border transactions of trade in goods and services: COVID19 is accelerating this digital transformation. Lockdowns prevent people from working in ports; it slows down the customs procedures; and distribution centers, and carriers cannot process and deliver the orders as usual.

The International Maritime Organization (IMO) and the World Customs Organization (WCO) have provided recommendations⁷ to the governments with the purpose of customs administrations and ports authorities keep facilitating the cross-border movement of essential goods during COVID19 crisis, without compromising worker's health.

Some of those recommendations⁸ are linked to:

- Measures to facilitate crew changes.
- Measures to facilitate port (and related) operations.
- Measures to ensure health protection in ports.

Given that the Maritime transport is mostly used – around 90% - for global trade, the CRTA should reinforce to members the importance of following and implementing those or similar recommendations.

During this pandemic, Canada has been introducing different actions to decrease the impact and prevent the virus from the spread. In March, Canada restricted international flights; it closed the border with the USA for people transit (no commerce); at that time, the number of cases risen to 103 people and no deaths. During the same month, Canada committed to facilitate the cross-border movement of goods, services and people by keeping open and connected the supply chain⁹.

However, the digitalization will boost the openness and prevention of the supply chain disruption during a pandemic; the e-government is a critical element of it.

2. E-Government

It is well known that the World Trade Organization (WTO) has included on the agenda the e-commerce for years and has reinforced the criticality of the e-trade environment as a support of the digital economy that needs to be done by the governments. The figure¹⁰ below indicates three components, apart from the human element that it is already treated by this

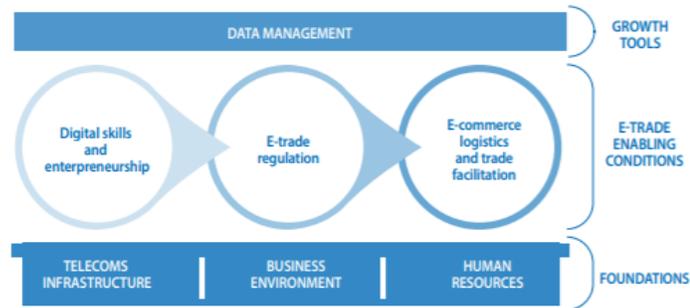
⁷ Joint WCO-IMO statement on the integrity of the global supply chain during the COVID19 pandemic. April17, 2020 http://www.wcoomd.org/en/media/newsroom/2020/april/joint-wco_imo-statement-on-the-integrity-of-the-global-supply-chain.aspx

⁸ International Maritime Organization. Circular Letter No. 4204/add.06.27March2020. Website <http://www.imo.org/en/MediaCentre/HotTopics/Documents/Circular%20Letter%20No.4204Add.6%20%20Coronavirus%20Covid-19%20Preliminary%20List%20Of%20Recommendations.pdf>

⁹ Government of Canada. Statement on joint international effort to ensure supply chain connectivity amid COVID-19 pandemic. Website <https://www.canada.ca/en/global-affairs/news/2020/03/statement-on-joint-international-effort-to-ensure-supply-chain-connectivity-amid-covid-19-pandemic.html>

¹⁰ Aid for trade at a glance 2017: promoting trade, inclusiveness and connectivity for sustainable DEVELOPMENT - © OECD, WTO 2017 DEVELOPMENT - © OECD, WTO 2017. Chapter 6 Improving the e-trade environment. Page 180. Website https://www.wto.org/english/res_e/booksp_e/aid4trade17_chap6_e.pdf

type of crisis, the legal framework, and the infrastructure are critical to facilitate and provide the proper conditions to implement the e-trade.



Canada is working on its digital transformation by creating the Canadian Digital Service and Shared Services Canada. Its mandate is to provide the tools that the public servants need to deliver the level of service expected in the digital age,¹¹ which is part of the Technology strategic plan to be implemented this year.

Recommendations

Based on the topics appointed above, these are the recommendations for the Policy Hackathon on Model Provisions for Trade in Times of Crises and Pandemic in Regional and other Trade Agreements.

1. **The chart of Pandemic Phases and actions for TRADE:** This chart breaks down the situation in five different phases, in order to act in an early stage. The chart should be implemented and followed as a guide of actions to prevent the trade and supply chain disruption and guarantee the people will have access to the essential goods and protect people’s lives.

Pandemic Phase Chart proposal by e-trade age and Supply Chain Resiliency Policy brief - Estefania Aguilar

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- The actions described should be applied for essential goods exclusively.
- The Crisis Regional Trade Agreement recommendations are mentioned in the Policy Brief.

¹¹ Government of Canada, Speaking Points for the Honorable Joyce Murray, Minister of Digital Government. Website <https://www.canada.ca/en/government/system/digital-government/speaking-points-joyce-murray.html>

2. **The Crisis Regional Trade Agreement (CRTA)**: This agreement would be essential to take the necessary measures to fight this pandemic (second wave) or future pandemics. It includes:
- a. Once the application of this agreement is triggered, phase 3 of the chart. The countries will promote the local production of essential goods in its region¹². The goal of this measure is 1) alleviate the supply in manufacturer countries that might be impacted by the virus. Furthermore, 2) Reduce the timeline of transit and make efficient the supply chain.
 - b. Not to close the borders for commerce. For that, it is recommended:
 - i. Countries implement and follow the suggestions made by the IMO, especially the:
 1. Measures to facilitate crew changes.
 2. Measures to facilitate port (and related) operations.
 3. Measures to ensure health protection in ports.
 - ii. Countries invest in e-government and implement a digital process to make more automated the import/export process.
 - iii. The preferential tariff should be extended to re-exported essential goods, not only when they come from the country of origin directly.

The suggested chart and the CRTA presented here are aligned with the agenda 2030 on Sustainable Development, especially because being prepared in case of a pandemic situation or a second wave of COVID19 with a defined action plan per phase is vital.

It has been proven that this type of crisis affects the economy tremendously; lockdowns, and quarantines impact the economic environment, and people lose their jobs, and commerce closes. Being prepared for a pandemic reduces the contingency, not only to protect the population by providing all necessary items to provide health care and fight the pandemic but for the economy.

No poverty, good health and well-being reduced inequalities. Responsible consumption, and production goals impact positively if the action plan per phase is defined and implemented.

The proposed CRTA - especially the measure of promoting the local sourcing per region to alleviate the production in manufacturing countries that are affected by the pandemic, and therefore cannot supply the essential goods needed to fight the pandemic - is equally critical to reaching the Sustainable Development Goals. By producing locally and shortening the supply chain, responsible consumption and production goal will be benefited, and hence it will help with the Zero Hunger goal. Allowing companies that produced similar items can manufacture essential goods, help to have decent work and economic growth. Digitalizing and solidify the e-trade help with the industry innovation and infrastructure and shorten the supply chain will impact the climate action goal.

<u>The Crisis Regional Trade Agreement (CRTA)</u>	
What is proposed	Apply the CRTA as main trade action in the pandemic crisis
What it means	Members must promote: <ul style="list-style-type: none"> • The production of essential goods in the region

¹² African Region, Region of the Americas, South-East Asia Region, European Region, Eastern Mediterranean Region, and Western Pacific Region

	<ul style="list-style-type: none"> • The trade and supply chain within the region <p>Prioritize the essential goods supply to countries with suffering a high peak.</p>
Development applications	<ul style="list-style-type: none"> • Measures to protect people who work in ports • Digitalization of the import/export processes • E-government implementation • Sustainable Development Agenda 2030 collaboration
Issues for further discussions	Extension of preferential tariff for essential goods for re-export.

References

World Health Organization. Coronavirus disease (COVID-19). Numbers at glance. Website: <https://www.who.int/emergencies/diseases/novel-coronavirus-2019>

Harvard Business Review How Coronavirus Could Impact the Global Supply Chain by Mid-March <https://hbr.org/2020/02/how-coronavirus-could-impact-the-global-supply-chain-by-mid-march>

BBC News Coronavirus pandemic: Tracking the global outbreak <https://www.bbc.com/news/world-51235105>

Cision. Government of Canada creates COVID-19 supply council in support of Canada's response and recovery <https://www.newswire.ca/news-releases/government-of-canada-creates-covid-19-supply-council-in-support-of-canada-s-response-and-recovery-889703052.html>

Justin Trudeau, Prime Minister of Canada, Prime Minister announces Canada's Plan to Mobilize Industry to fight COVID-19, March 20, 2020 <https://pm.gc.ca/en/news/news-releases/2020/03/20/prime-minister-announces-canadas-plan-mobilize-industry-fight-covid>

World Bank Group. E-trade for development. Opportunities, Challenges, and Policy Considerations for Developing Countries <http://documents1.worldbank.org/curated/en/179601549056701219/pdf/Opportunities-Challenges-and-Policy-Considerations-for-Developing-Countries.pdf>

Joint WCO-IMO statement on the integrity of the global supply chain during the COVID19 pandemic. April 17, 2020 http://www.wcoomd.org/en/media/newsroom/2020/april/joint-wco_imo-statement-on-the-integrity-of-the-global-supply-chain.aspx

International Maritime Organization. Circular Letter No. 4204/add.06.27March2020. <http://www.imo.org/en/MediaCentre/HotTopics/Documents/Circular%20Letter%20No.4204Add.6%20%20Coronavirus%20Covid-19%20Preliminary%20List%20Of%20Recommendations.pdf>

Aid for trade at a glance 2017: promoting trade, inclusiveness and connectivity for sustainable DEVELOPMENT - © OECD, WTO 2017 DEVELOPMENT - © OECD, WTO 2017. Chapter 6 Improving the e-trade environment. Page 180 https://www.wto.org/english/res_e/booksp_e/aid4trade17_chap6_e.pdf

Government of Canada, Speaking Points for the Honorable Joyce Murray, Minister of Digital Government. <https://www.canada.ca/en/government/system/digital-government/speaking-points-joyce-murray.html>

Government of Canada. Statement on joint international effort to ensure supply chain connectivity amid COVID-19 pandemic. Website <https://www.canada.ca/en/global-affairs/news/2020/03/statement-on-joint-international-effort-to-ensure-supply-chain-connectivity-amid-covid-19-pandemic.html>