INTERNATIONAL MONETARY FUND

IMF POLICY PAPER

REVIEW OF THE ROLE OF TRADE IN THE WORK OF THE FUND

April 2023

IMF staff regularly produces papers proposing new IMF policies, exploring options for reform, or reviewing existing IMF policies and operations. The following documents have been released and are included in this package:

- A **Press Release** summarizing the views of the Executive Board as expressed during its March 27 consideration of the staff report.
- The **Staff Report**, prepared by IMF staff and completed on February 27 for the Executive Board's consideration on March 27.
- A **Staff Supplement**.

[The documents listed below have been or will be separately released.]

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International Monetary Fund
Washington, D.C.

PRESS RELEASE

PR23/105

IMF Executive Board Concludes the Review of the Role of Trade in the Work of the Fund

FOR IMMEDIATE RELEASE

Washington, DC: On March 27, 2023 the Executive Board of the International Monetary Fund (IMF) concluded a periodic Review of the Role of Trade in the Work of the Fund. The review provides an opportunity for the Fund to update the objectives and modalities of its work on trade issues.

The paper emphasizes that open, stable, and transparent trade policies remain key for economic growth and resilience, and for addressing key global challenges. It cautions that the deteriorating global trade policy landscape poses risks to the current levels of prosperity, and a weakened multilateral trading system has been ill-equipped to address these challenges.

Against this backdrop, the review emphasizes the continued importance of the Fund's advocacy for open, stable, and transparent trade policies and outlines an agenda to reinvigorate the role of the Fund to help country authorities address key trade-related challenges. These challenges include identifying opportunities and managing risks associated with structural changes in the global economy, such as those driven by climate change and new technologies. It also includes finding ways to cooperate amid rising geopolitical tensions, managing the risks of geo-economic fragmentation, and promoting policy coherence between trade and non-trade objectives such as climate, inequality, and security.

To operationalize this agenda, the review outlines priorities for future work, including on analytical issues, surveillance, and cooperation with other international organizations, especially the World Trade Organization (WTO).

The review's main findings on trends, the Fund's work on trade and trade policy, emerging challenges, and priorities for a forward-looking agenda are reflected in the Main Paper, while technical information and in-depth analysis of several key trade issues are covered in the accompanying Background Paper.

Executive Board Assessment

Executive Directors welcomed the timely review of the role of trade in the work of the Fund and broadly agreed with its main findings. They noted that the review will serve as a blueprint for an enhanced strategy that will reinvigorate the role of the Fund in trade. This will assist country authorities navigate the challenges associated with a changing trade landscape in the coming years.

Directors recognized the importance of the Fund fulfilling its traditional institutional mandate on trade and welcomed the high-quality and policy-relevant work done by the Fund in this area in recent years. Nonetheless, against the backdrop of a changing trade policy landscape with

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challenges related to climate change and technology, the growing use of trade policy for non-trade objectives, and recent trade tensions, Directors considered that the Fund should boost its attention to trade policy issues, including in the context of bilateral surveillance, as well as scale up its expertise, to ensure that the Fund's work on trade remains central and its policy advice is seen as evenhanded. Directors noted that the trade work should continue to focus on the areas of Fund expertise, emphasizing topics of macroeconomic, fiscal, and financial relevance. Amid competing institutional priorities and resource pressures, Directors generally agreed that the scale up of Fund work on trade should primarily be attained through careful internal re-prioritization, while protecting other priorities, and continued active collaboration with other international institutions, including the WTO. Some Directors cautioned against underestimating the needed resources for the reinvigorated trade agenda.

Directors noted that the Fund could contribute to addressing key trade policy challenges through multiple channels, including bilateral and multilateral surveillance, advocacy, and inter-institutional cooperation. Directors generally encouraged staff to maintain its support for strengthening the WTO. They agreed that a strong multilateral system is central to open, stable, and transparent trade policies, and the Fund should remain a vocal advocate. The Fund could bring a more active voice to major global trade policy debates, such as on subsidies and other trade-distortive policies and barriers to trade and investment. Directors noted that the Fund is not well placed to assess the appropriateness of trade measures imposed for national or international security reasons, but that it should assess the economic implications of such policies, including spillovers.

Directors encouraged more consistent and more active coverage of trade policy issues in bilateral surveillance and urged staff to translate its analysis and multilateral surveillance into tailored and practical policy advice, including how the gains from trade can be shared by all. Regardless of countries' level of development, open, stable, and transparent trade policies are important for economic growth and stability. Trade diversification and supply chain resilience will also be crucial. For advanced economies, a key priority is to avoid new trade and investment restrictions and other discriminatory measures wherever feasible. Further opening markets to products, especially those of export interest to developing countries, and reducing barriers to services trade will also be important. Improved domestic policies to facilitate adjustment to technological change and import competition are critical to better share the benefits of open trade. For emerging market economies, further liberalization of goods and services markets would bring benefits. At the same time, trade policy should be better integrated with structural reforms promoting competition. For low-income countries, greater trade openness should be complemented by improved trade facilitation and increased access to regional and global markets. This should be underpinned by macroeconomic stability and structural reforms and supported by relevant technical assistance. The Fund can fill the analytical and policy gaps to assess the development and growth impacts of trade in the world economy. Attention should also be paid to the implications of country characteristics on trade.

Going forward, Directors considered it important to continue to periodically review the role of trade in the Fund's work. They asked staff to provide regular briefings on the evolution of the trade landscape and implementation of this trade strategy.

INTERNATIONAL MONETARY FUND

February 27, 2023

REVIEW OF THE ROLE OF TRADE IN THE WORK OF THE FUND

EXECUTIVE SUMMARY

Open, stable, and transparent trade policies remain key for economic growth and resilience and for addressing key global challenges. Open trade has been an essential part of the global policy agenda to bolster growth, allowing millions of people to raise their living standard and exit poverty. Diversification through trade is also crucial to improve macroeconomic resilience, as evidenced during the COVID-19 pandemic. Large global gains remain to be derived from further trade reforms, including in services and environmental goods needed to combat climate change. Together with domestic policies to help share the gains more widely, open trade—while paying due attention to its possible adverse side effects—can promote balanced growth and support cooperation on other global priorities, such as climate change, food and health security, and poverty reduction.

The deteriorating global trade landscape poses risks to the current levels of prosperity. Trade tensions that have emerged in recent years have deep underlying causes. After rising sharply in the 1990s and early 2000s, the ratio of trade to GDP has been flat since about 2005. Following a stagnation of traditional trade reforms and limited take up of new opportunities in services and other emerging areas, trade restrictions, trade-distorting subsidies, and other distortive policy measures began to spread, especially in the aftermath of the global financial crisis. More recently, the trade tensions between China and the United States, the COVID pandemic, and the war in Ukraine have accelerated these trends. A weakened multilateral trading system has been ill-equipped to address these challenges.

The Fund's longstanding role in international trade and trade policy is deeply rooted. Article I of the International Monetary Fund (IMF) Articles of Agreement specifies that one purpose of the IMF is "to facilitate the expansion and balanced growth of international trade…". The Fund fulfills its mandate primarily through analysis and policy advice in the context of its multilateral and bilateral surveillance, as well as in the context of preventing currency manipulation and the use of unapproved exchange restrictions. These surveillance activities are complemented by trade work related to lending and capacity development.

Although the Fund has responded quickly to key trade developments in its multilateral surveillance, the review shows that attention to trade policy has declined and improved expertise is needed. Over the past two decades, there has been a significant decline in attention to trade policy even as the economic importance of trade issues rose, the pace of trade reforms slowed and then reversed, and the global trading system came under threat. Moreover, there have been persistent gaps in translating the lessons from multilateral surveillance into bilateral policy advice. Staff see the need to scale up its internal trade policy expertise to ensure that the Fund's work on trade remains central in policy areas of growing relevance (e.g., services and digital trade) and key sources of trade tensions (e.g., subsidies and climate change). The scale up of the Fund's trade expertise will be achieved via internal reprioritization.

This review outlines an agenda to reinvigorate the role of the Fund in trade to help country authorities address the key trade-related challenges. These include addressing trade opportunities and risks associated with new technologies, promoting policy coherence between trade and non-trade objectives, and managing growing risks of geo-economic fragmentation. The Fund should bring its macroeconomic perspective to identify major trade-related developments and risks and to translate this analysis into policy advice tailored to different countries' needs, including on the domestic policies needed to share the gains from trade and technological progress more widely. This requires providing country teams with the tools and policy guidance they need to carry out their work effectively and efficiently. The Fund should continue to be a vocal advocate for open, stable, and transparent trade policies and a strong multilateral trade system that oversees these policies. Enhanced trade-related collaboration with other international organizations, especially the World Trade Organization (WTO), will be key to achieve these goals.

To help implement the enhanced trade strategy, there is a need for greater attention to a number of key issues. First, core trade areas deserve continued attention, but would benefit from more granular analysis. For example, more attention to the spillover effects of trade and domestic policies could help to underpin improved international policy cooperation. Second, the Fund needs to further analyze "modern" trade areas such as services trade that have increasing macroeconomic ramifications. Regionally, more attention should be devoted to Africa, given its persistent trade-related challenges and potential for growth and reforms. Third, the Fund should not fall behind in its use of new data and tools. Trade work requires investment in more granular data (including firm-level data and trade policy data) and specific expertise.

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CONTENTS

FIGURES

TABLE

Glossary

AB	Appellate Body (WTO)
AD	Anti-dumping
AEs	Advanced Economies
AfCFTA	African Continental Free Trade Agreement
BCA	Border Carbon Adjustment
BoP	Balance of Payments
CD	Capacity Development
COVID-19	Coronavirus Disease of 2019
CVD	Countervailing Duty
CPTPP	Comprehensive and Progressive Agreement for Trans-Pacific Partnership
DDA	Doha Development Agenda (Doha Round) (WTO)
EMs	Emerging Markets
EMDEs	Emerging Markets and Developing Economies
FDI	Foreign Direct Investment
G-20	Group of 20
GATT	General Agreement on Tariffs and Trade
GATS	General Agreement on Trade in Services (WTO)
GEF	Geo-Economic Fragmentation
GDP	Gross Domestic Product
GFC	Global Financial Crisis
GTA	Global Trade Alert
GVCs	Global Value Chains
IEO	Independent Evaluation Office (IMF)
IMF	International Monetary Fund
IMF IV	International Monetary Fund Institutional View
IMS	International Monetary System
ISD	Integrated Surveillance Decision
LICs	Low-Income Countries
MC-12	WTO 12th Ministerial Conference
MFN	Most Favored Nation
NTBs	Non-Tariff Barriers
NTM	Non-Tariff Measure
OECD	Organization for Economic Cooperation and Development
RCEP	Regional Comprehensive Economic Partnership
REO	Regional Economic Outlook
RTAs	Regional Trade Agreements

SOEs	State-Owned Enterprises
SPS	Sanitary and Phytosanitary Measures
STRI	Services Trade Restrictiveness Index (OECD)
TBT	Technical Barriers to Trade
TFA	Trade Facilitation Agreement (WTO)
UNCTAD	United Nations Conference on Trade and Development
UFR	Use of Fund Resources
USMCA	United States-Mexico-Canada Agreement
WEO	World Economic Outlook
WTO	World Trade Organization

INTRODUCTION

1. **The Fund has a longstanding role in providing trade policy advice to its members through multilateral, regional, and bilateral surveillance.** The root of the IMF's mandate primarily lies in Article I, which specifies that one purpose of the IMF is "to facilitate the expansion and balanced growth of international trade…" (see Background Paper, Section 1). Trade work is carried out in three broad areas: (i) surveillance, where the bulk of the work takes place, (ii) lending, and (iii) capacity development.

2. **While the underlying mandate has been constant throughout the Fund's history, the level of attention and the type of issues addressed have evolved with changes in the global economy as well as staffing.** As the 2009 Independent Evaluation Office (IEO) Evaluation highlighted, trade work peaked in the 1980s and 1990s. Since then, a slowdown in the pace of trade reform, an increase in protectionism, and risk of further reversals have been a drag on trade, productivity, and income growth (IMF, October 2016, WEO Chapter 2). Throughout the same period, the absolute number of IMF staff positions specifically focused on trade has declined by about three quarters (presently accounting for about 0.1 percent of staff), prompting the IEO to underscore the need to maintain a "critical mass" of trade policy expertise.

3. **This review follows the Board-endorsed recommendation by the IEO in 2009 to conduct periodic assessments of the Fund's work on trade.** The last review took place in 2015, in which the Executive Board called for a work agenda to better embed trade in surveillance work, including by translating key implications of the global trade landscape into surveillance (IMF, 2015). The Board also called for tailoring coverage of trade issues in Fund surveillance to specific needs of individual countries and ensuring that the Fund's approach to trade policies was evenhanded. At the same time, several Directors expressed reservations about a broader trade agenda that may have resource implications. The 2019 IEO Update called for (i) better translation of multilateral surveillance into bilateral policy advice; (ii) deepened cooperation with other trade-related international organizations; and (iii) greater attention to rapidly developing issues such as digitization and e-commerce (IEO, 2019) (see Box 1).[1]

4. **Implementation of these recommendations has been mixed.** Amid declining overall coverage of trade policy issues and limited resources, the focus has been on responding to major global developments (e.g., the trade war) (see Chapter 3). As a result, in most cases there has been little attention to proactive policy advice tailored to a country's own reform needs and bilateral trade policy surveillance has been focused on systemic countries. Some forms of cooperation with the WTO have improved (in particular, joint policy analysis has demonstrated thought leadership and helped establish common views and perspectives), although there is further room to leverage synergies with the WTO and other international organizations (Chapter 4).

[1] The 2019 IEO Update did not include recommendations for the Executive Board's endorsement.

5. An overarching goal of this Review is to ensure that the Fund fulfils its mandate in this important area of work in line with changes in the world economy. Beyond this broad goal, the current review has three specific objectives. First, to assess how the Fund's work has promoted open, stable, and transparent trade. Second, to review and update policy advice on topical trade issues. Third, to engage the Board on a future trade agenda for the Fund in light of the changing trade and trade policy landscape.

6. The review identifies three key trade-related challenges that the country authorities will face in the coming years.

- **Climate change and technology.** Structural forces such as climate change and technology are poised to reshape global trade by altering comparative advantage and making some previously non-tradeable services tradeable. Resistance to shifting trade patterns could further erode support for open trade, underscoring the importance of domestic policies to adapt and to share the gains from trade and technological progress more widely.

- **Using trade to accomplish non-trade objectives.** This includes environment, inequality and inclusion, food security, public health, as well as national security concerns. Closer links between trade and other policy areas has increased the need for policy coordination, as governments need to cooperate to keep trade open and carefully assess the impact of their measures on economic and non-economic outcomes at home and abroad.

- **The intensification of geopolitical tensions.** Geopolitical tensions increase the risk of geo-economic fragmentation, introducing uncertainty, reducing economic efficiency, and distorting investment patterns and decisions (Aiyar and others, 2023). The WTO-based multilateral trading system was not designed to resist such pressures. For instance, the WTO has active monitoring and transparency functions, but, in contrast to the IMF surveillance function, does not provide policy advice. Mitigating risks from increased trade restrictiveness will require building awareness of the costs, voicing concerns, and promoting better policy choices.

7. A reinvigorated trade strategy should bring macroeconomic perspectives to the trade challenges identified above and bring a "Fund" perspective to key global trade policy debates—including in the WTO. The strategy should bring macroeconomic perspectives in a way that is selective and effective to best meet the Fund's broad mandate on trade. While much of the work will remain decentralized across Fund departments, this more active engagement will require to scale up the internal trade policy expertise to support surveillance and other activities. Fund work on trade should continue to be carried out through three main channels:

- **Analysis and multilateral surveillance** should boost efforts to identify major trade-related developments and risks and provide the intellectual leadership and analytical underpinnings for Fund policy positions.

- The Fund should also redouble efforts to translate analysis and multilateral surveillance into **bilateral surveillance** and better integrate trade policy into broader macro-structural reforms at a time when these policies become more frequent and complex.

- **Trade-related collaboration** with other international organizations, especially with the WTO, should exploit synergies in critical areas such as addressing the risks of runaway geo-economic fragmentation.

- **To better tailor trade-related bilateral surveillance,** staff will provide additional support to country teams through policy guidance, data, and other tools.

8. Fund members at all income levels should aim for greater trade openness in traditional and "new" trade areas and facilitate domestic adjustment to better share the benefits of trade, while protecting the vulnerable. In addition:

- **For advanced economies**, priorities include avoiding trade fragmentation, further opening markets to products—especially those of export interest to low-income developing countries (LIDCs) and reducing barriers to services trade.

- **For emerging markets**, priorities include further liberalization of goods and services markets, including for products of export interest to LIDCs, and better integrating trade policy into the structural reform agenda.

- **Low-income countries** should complement openness with improved trade infrastructure, better economic institutions, and increased access to regional and global markets, including through the implementation of the WTO Trade Facilitation Agreement.[2]

9. The remainder of the report expands on these themes and is organized as follows. Chapter 2 provides an overview of the changing trade and trade policy landscape during the review period (2014–2022). Chapter 3 describes the modalities of Fund work on trade and evaluates the Fund's bilateral and multilateral coverage of key trade issues. Chapter 4 elaborates on the emerging challenges in global trade and provides a roadmap for reinvigorating the Fund work to meet these challenges. The accompanying Background Paper provides technical information and in-depth analysis of several key trade issues.

[2] Section II of the Background Paper discusses the Fund's role in capacity development on customs administration.

Box 1. Past Recommendations and Actions Taken

This box describes key Executive Board conclusions from the 2015 Review of the Role of Trade in the Work of the Fund. The second and third columns summarize both IEO (2019) and staff comments.

2015 Trade Review Recommendation	IEO (2019) Comments	Staff Comments
To better embed trade in IMF surveillance work, Directors called for "enhancing efforts to translate key implications from the evolving trade landscape and continuing analytical work" into IMF surveillance, and for "further developing a work agenda for the Fund for the next five years."	IEO (2019) noted that translating "multilateral surveillance work into practical bilateral policy advice remains a work in progress, as authorities would appreciate more specific and well-tailored advice…" and encouraged deepening "bilateral trade policy surveillance and advice beyond the largest economies.…"	Multilateral surveillance reacted to shocks that affected trade and trade policy, but given limited resources and the need to respond to major global developments, coverage of trade policies in bilateral surveillance has been focused on systemic countries. This review proposes developing a specific work agenda to address the current gaps in trade policy coverage.
Directors felt "coverage of trade issues in Fund surveillance should be tailored to the specific needs of individual countries" and reflect varied priorities across income levels. Key areas were: (i) for AEs, "new trade policy areas such as services, regulations, and investment," (ii) for EMDEs, "traditional liberalization and anchoring to global supply chains," and (iii) for LICs, "sustained efforts to reduce trade costs."	IEO (2019) noted that staff's response to high stress in the trading system had "stretched available trade policy expertise and resources thin, implying less attention to other relevant issues." "This situation may not be sustainable if trade tensions are long-lasting."	Amid declining overall coverage of trade policy issues and limited resources, the focus has been on responding to major global developments (e.g., the trade war). As a result, in most cases there has remained little attention to proactive policy advice tailored to a country's own reform needs. This review proposes to address the identified gaps.
Directors called for continued collaboration with the WTO.	IEO (2019) described cordial, effective relationships among IMF and WTO staff, leading to influential joint policy work, but identified a "generalized concern at the WTO that the Fund's overall interaction with the institution has decreased over time … despite the greater role of trade in the global economy and increased linkages between trade and other policies." The small size of the IMF trade team also presented a "key person risk" for the institutional relationship.	Joint policy analysis with the WTO and other IOs demonstrated thought leadership and helped establish common views and perspectives. This includes an April 2022 paper on subsidies, a 2018 paper on reinvigorating trade and inclusive growth, and a 2017 joint paper on how to share the gains from trade more widely. Joint staff efforts also have helped to broaden somewhat the scope of operational collaboration, such as regarding WTO accession preparations for certain IMF members, and joint advocacy on issues such as the pandemic response and food security.

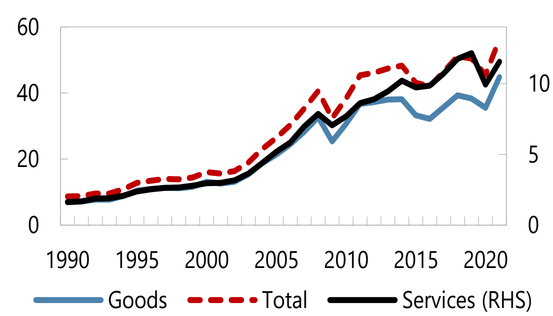
THE CHANGING TRADE AND TRADE POLICY LANDSCAPE

A. Changing Trade Landscape

Global trade is not in retreat, but it is changing and facing mounting risks. In recent years, the growth of goods trade has decelerated, while services trade has shown more dynamism; EMs have been playing a larger role in world trade, including trading more with each other; and shocks such as the pandemic have put world trade under stress, although global value chains have so far shown resilience.

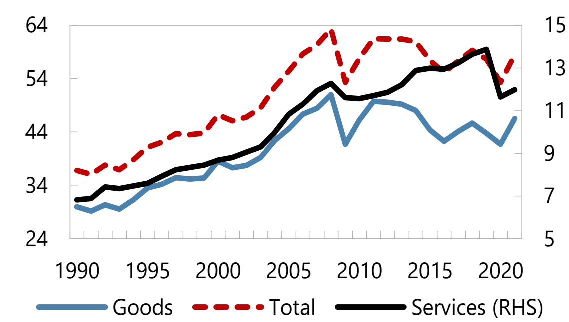
10. In the past three decades, the growth of goods trade has decelerated, while services trade continued to expand more rapidly (Figures 1 and 2). Since 2011, the growth rate of goods trade has slowed to an annual average of 4.1 percent (down from an annual average of 9.1 percent during 1990 to 2008). Global goods trade also reduced as a share of global GDP, from 51.0 percent in 2008 to 46.5 in 2021. Meanwhile, the world economy experienced a robust growth of services trade from $1.6 trillion in 1990 to $11.5 trillion in 2021, an average annual growth rate of 6.9 percent. Trade costs in services have traditionally been much higher than those in goods but due to the advances in digital technologies, they are dropping at a faster rate—a trend that is likely to continue in the future (Chapter 4).

Figure 1. Global Trade (Imports + Exports) Values
(Trillion USD)



Source: UN Comtrade and WTO.

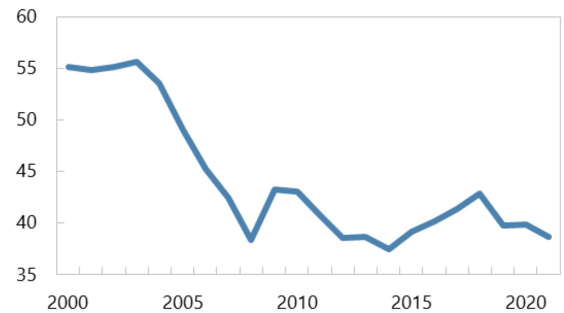
Figure 2. Global Trade (Imports + Exports) Values
(Percent of World GDP)



Source: UN Comtrade and WTO.

11. The persistent slowdown in goods trade started before the Global Financial Crisis (GFC) mostly due to structural factors. The rise of GVCs promoted by technological innovation and trade liberalization enabled the rapid growth of goods trade starting in the late 1980s. The increasing fragmentation of production stages across multiple countries allowed many emerging markets and developing economies (EMDEs) to expand their participation in international trade. However, this expansion slowed over time as the impact of technological innovation and trade reforms waned. Constantinescu, Mattoo, and Ruta (2020) find that this slower expansion in GVCs, especially as China's growing production of intermediate goods replaced imported inputs, is a main driver of the long-term decline in the growth of goods trade (Figure 3). Other factors, such as the weakness in economic activity after the GFC, particularly in investment, and the waning pace of trade liberalization and the persistent increase in trade protectionism have contributed to holding back world trade growth (IMF, October 2016, WEO Chapter 2).

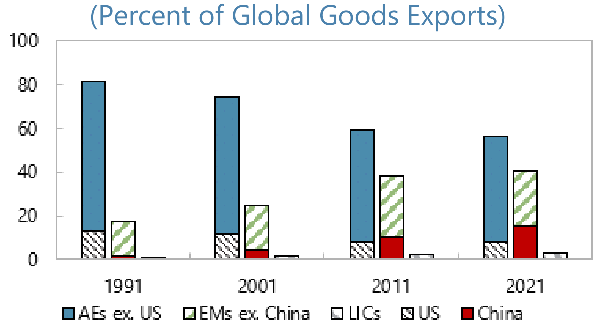
Figure 3. China's Participation in Global Value Chains (GVCs)—Ratio of Immediate Imports of Goods
(Percent)



Sources: Constantinescu, Mattoo, and Ruta (2020) and calculation based on World Integrated Trade Solutions (WITS).
Note: Intermediates defined as categories 22, 42, and 53 in UN Comtrade's BEC Classification. Manufacturing defined as SITC3 categories 5 through 8 minus 68 and 891.

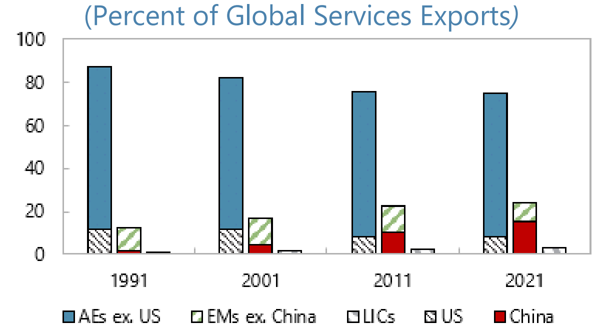
12. The contribution of EMs to global trade has grown notably in the past three decades, albeit at a slower pace since 2011. As shown in Figure 4, AEs accounted for 82 percent of global goods trade in 1991. Since then, EMDEs have robustly improved their share in global merchandise trade, driven by the integration of China and other EMs in the world economy. AEs account for more than 75 percent of services trade, a share that has been fairly stable over the period (Figure 5). EMs have increased their share in services trade to 24 percent, although this growth was mostly concentrated in China and India. The low participation of other EMs and LICs points to the more limited investment and higher barriers to services trade.

Figure 4. Contribution to Global Goods Exports
(Percent of Global Goods Exports)



Source: Comtrade and WTO.

Figure 5. Contribution to Global Services Exports
(Percent of Global Services Exports)

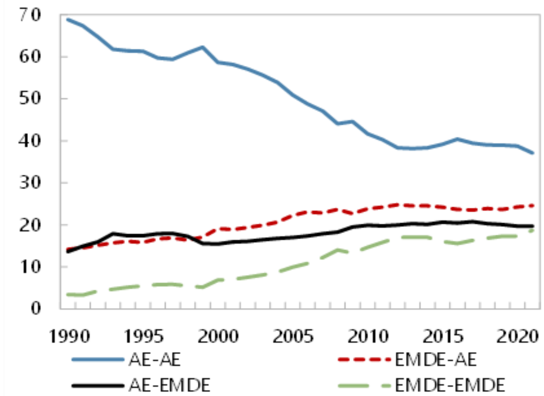


Source: Comtrade and WTO.

13. There has been a significant shift in the pattern of international trade flows from and towards EMDEs. In the past three decades, the share of trade among EMDEs has increased by more than fivefold, from 3.4 percent in 1990 to 18.7 percent in 2021 as more EMDEs participated to global value chains. The share of exports of AEs to EMDEs has been relatively stable while the share of trade among AEs in global exports has declined from 68.8 percent to 37.1 percent (Figure 6). For LICs, the major improvement has been in the share of their exports to EMs (from 0.3 percent to 2.7 percent of global exports) partly due to rising commodity demand in EMs and their growing domestic markets.

Figure 6. Global Goods Exports by Origin–Destination

(Percent of Global Goods Exports)

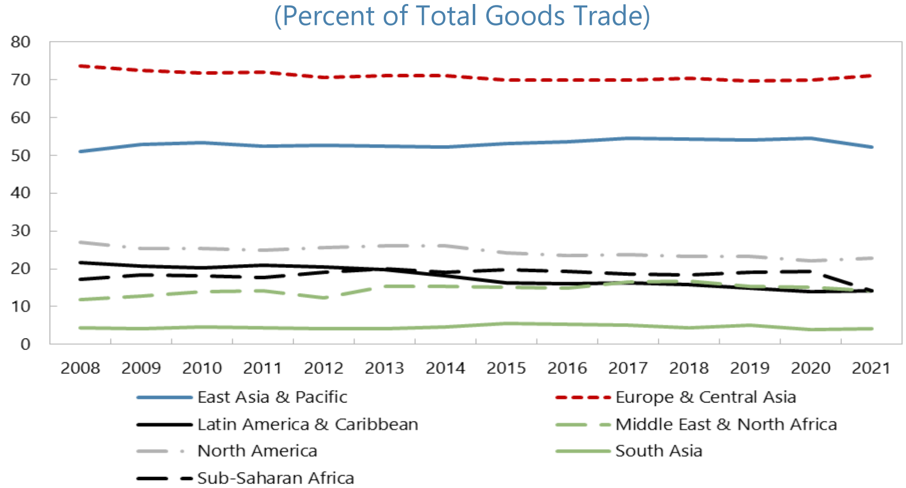


Source: UN Comtrade and WTO.

14. Goods trade in some regions is more integrated than others, but in the last decade the shares of trade among regions have been stable across the globe (Figure 7). The share of goods trade within Europe and East Asia and Pacific is substantially higher compared with the other regions of the world. This higher share in part reflects the importance of regional value chains and trade reforms at the national (East Asia) and regional (Europe) level. In the past decade, the shares of regional trade have been largely stable in most areas. Deeper forms of regional trade agreements, such as the African Continental Free Trade Area (AfCFTA), can be important in promoting intra-regional trade in regions that currently display low levels of integration and support further integration into the global economy.[3]

Figure 7. Intraregional Goods Trade

(Percent of Total Goods Trade)



Source: UN Comtrade.

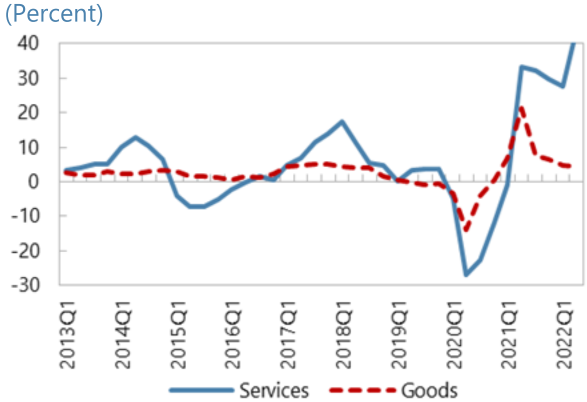
[3] See Maliszewska and Ruta (2020) for a study of the impact of the AfCFTA.

15. The pandemic and Russia's war in Ukraine have disrupted international trade, although their long-term implications are still unfolding. World trade sharply declined at the outset of the pandemic, but goods trade recovered quickly (see Box 2). The war in Ukraine primarily impacted trade in food and energy products (Russia and Ukraine together account for a quarter of global exports of wheat and natural gas) and had broader short-term effect through multiple channels, including logistics, especially shipping, disruptions and sanctions that were imposed on Russia and Belarus (Ruta, 2022). In the longer term, these events have contributed to reduce the trust in the open trade system and have exacerbated geopolitical tensions which are in part responsible for the surge in trade distortive measures discussed in the next section. While structural factors have played a major role in explaining long-term trends in world trade, as discussed above, the increase in trade policy activism could become a more significant headwind for trade integration.

Box 2. COVID-19 and Trade

Although global trade was negatively affected by the COVID-19 pandemic, goods trade recovered rapidly. At their troughs in 2020Q2, goods and services trade values dropped by 12.2 and 21.4 percent, respectively, compared with 2019Q4. Nonetheless, goods trade bounced back quickly in response to strong demand while rebound of services trade was sluggish mainly because of the drastic collapse and slow recovery of travel and tourism services. The growth in services trade progressively gained momentum as COVID restrictions were removed.

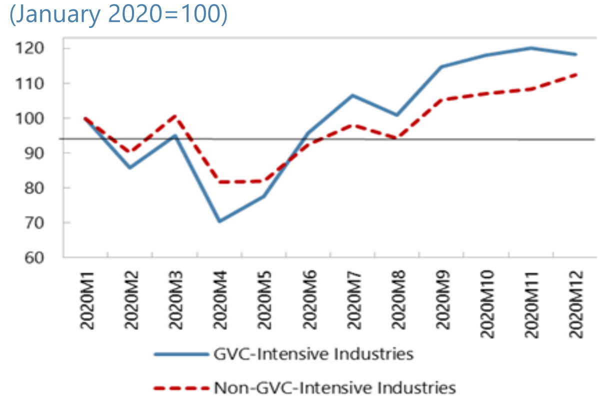
Annual Growth Rate of Trade Values
(Percent)



Source: WTO.

GVCs were especially affected by the pandemic, but they have proven remarkably resilient as disruptions were short-lived. GVC-intensive industries suffered greater declines, given (by definition) their greater exposure to potential disruptions across multiple countries and that they constitute more durable goods where consumption can be postponed in times of uncertainty. This drop was quickly reversed in a sharp recovery, in contrast to previous recessions; trade in services was slower to recover due to travel and tourism (IMF, April 2022, WEO Chapter 4).

Trade of GVC-Intensive vs. Non-GVC Intensive Industries Early in the Pandemic
(January 2020=100)



Source: WEO April 2022 – Chapter 4.

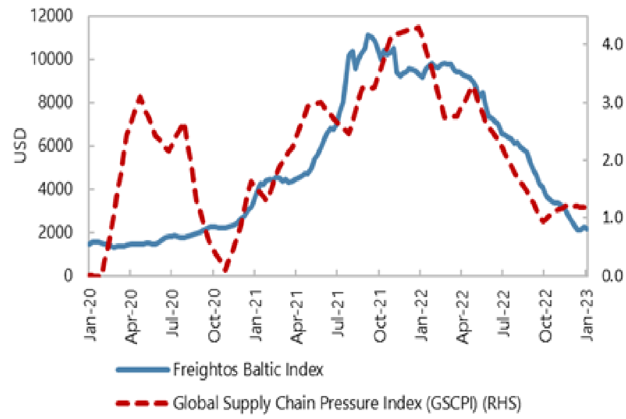
Factors unique to the pandemic contributed to the sharp decline and faster than usual rebound in goods trade. Lockdown policies were a key driver of the trade collapse early in the pandemic; these spillovers were mitigated in industries where telework was a possibility and have diminished over time as firms adapt to the public health measures (Espitia and others, 2022; IMF, April 2022, WEO Chapter 4).

Box 2. COVID-19 and Trade (concluded)

Fiscal and monetary stimulus, the simultaneous rotation of consumer demand away from services into durable goods in AEs, and the increase in demand for imported pandemic-related medical goods contributed to the strong rebound in goods trade, surpassing pre-pandemic levels in 2021 (August 2022 ESR–Chapter 1).

Global shipping costs spiked during the pandemic and further impacted trade flows. Shipping costs soared as consumption shifted away from services to durable goods and lockdowns, labor shortages, and strains on logistics networks mounted. These effects further disrupted the world's supply chains (Carriere-Swallow and others, 2022; Celasun and others, 2022; Komaromi, Cerdeiro, and Liu, 2022). Global container rates surged throughout 2021, but it also shows that these rates declined afterwards, and eventually returned to pre pandemic levels, as consumer spending on services recovered and pressure on global supply chains eased.

Global Container Freight Index and Global Supply Chain Pressure Index



Source: Freightos and Federal Reserve Bank of New York Global Supply Chain Pressure Index, http://www.newyorkfed.org/research/gscpi.html.

A key policy lesson from the pandemic is the need to improve diversification through open trade as a means to enhance GVCs resilience. Future shocks can have very different geographic origins and contagion dynamics, but some policy lessons from the pandemic are generalizable. The Fund has advised against mutually harmful export restrictions and reshoring-type policies and emphasized instead the need to increase diversification through trade to limit the disruptions that supply and demand shocks can have on GVCs. This includes moving away from domestic sourcing of inputs, and the need for greater substitutability in input sourcing (IMF, April 2022, WEO Chapter 4). Specifically, supply chain disruptions can be minimized by implementing policies that reduce trade costs, such as reducing non-tariff barriers and investing in transport and logistics infrastructure. This point is supported by recent evidence showing that non-tariff barriers on imported inputs reduced the resilience of exporters facing changes in foreign demand (Cali and others, 2022).

B. Trade Policy

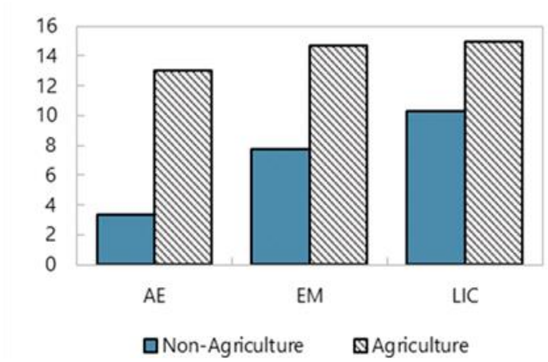
The trade policy landscape has worsened significantly in recent years. Trade restrictions, non-tariff measures (NTMs) and subsidies have risen sharply. The stagnant pace of trade reforms has left in place trade distortions in key sectors and has weakened the multilateral trading system. Regional trade agreements (RTAs) can reduce trade costs in regions such as Africa where they have been historically high and can help advance "frontier" issues, but they should be complemented by a strong WTO.

Trade Measures

16. Tariffs have decreased only slightly over time, while NTMs are on the rise (Figures 8 and 9). Average tariffs are inversely related to development level—i.e., higher for LICs and for EMs than AEs, but the latter tend to impose higher tariffs on agricultural products and other sectors such as textile, where LICs have a comparative advantage. Average tariffs have also decreased only slightly since the early 2000s. The number of notified NTMs, meanwhile, has continued to rise steadily.

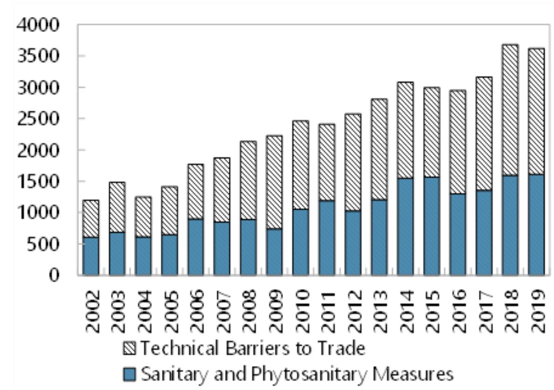
Technical barriers to trade (TBTs) and sanitary and phytosanitary measures (SPS) make up the bulk of this increase.[4] The number of contingent measures such as antidumping, countervailing duties, and safeguards, is below early 2000s levels and has remained steady over the review period, but their coverage of trade reached record levels in 2019 (Bown, 2022). AEs are relatively larger users of NTMs, although their use has increased also in EMs.

Figure 8. Average Applied MFN Tariffs
(Percent)



Source: WTO.

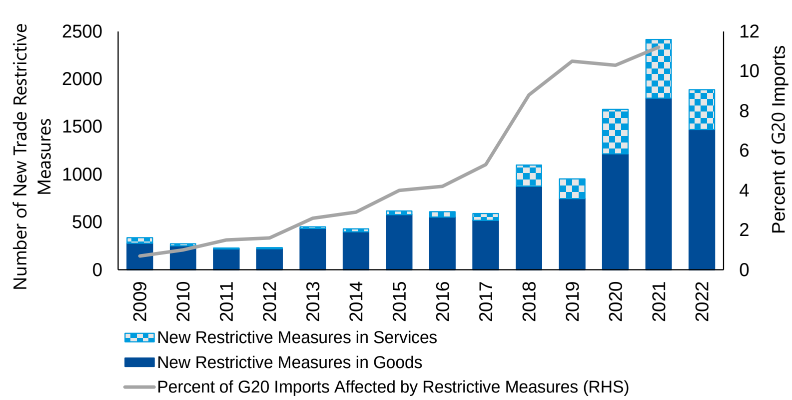
Figure 9. Number of NTM Notifications per Year



Source: WTO I-TIP, wiiw. EU measurers counted as one.

17. Goods, more than services, trade has been hit by new trade restrictive measures. The number of new trade restrictive measures that increased in 2018 as trade tensions between the United States and China ramped up (see Box 3), further escalated during the pandemic, and with Russia's war in Ukraine (see Box 4). While in recent years a higher share of these measures affects services, most new restrictions continue to apply to goods. Data from the WTO show that the share of G-20 imports that is affected by trade restrictive measures increased to more than 11 percent in 2021 (Figure 10). In addition, the number of trade restrictions targeting high-tech sectors has increased steadily since the GFC, due to the critical role of these sectors in national security and economic competition (IMF REO: Asia and Pacific, 2022).

Figure 10. Number of New Trade Restrictive Measures



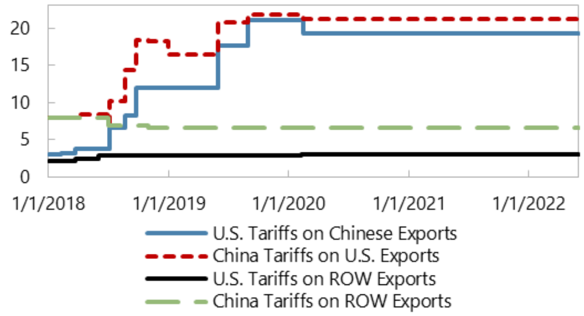
Source: Global Trade Alert and WTO Secretariat.

[4] Governments use NTMs to achieve various public policy goals recognized by multilateral trade rules. The WTO Agreement on the Application of Sanitary and Phytosanitary Measures, for example, permits governments to maintain appropriate SPS protection to ensure food safety and animal and plant health.

Box 3. China–U.S. Trade War

Elevated trade tensions between the United States and China resulted in rounds of bilateral tariff hikes and retaliations in 2018–19. In summers of 2018 and 2019, the China–U.S. tariff war increased the average tariffs on Chinese goods imported to the United States from 3.8 to 21 percent at their peak, and on the U.S. goods imported to China from 8.4 to 21 percent at their peak. These tariff disputes resulted in an unprecedented spike in global trade policy uncertainty. Later, in early 2020, the two countries signed a trade agreement which did not foresee a reduction in bilateral tariffs but it effectively allowed to stop a further escalation in tariffs.

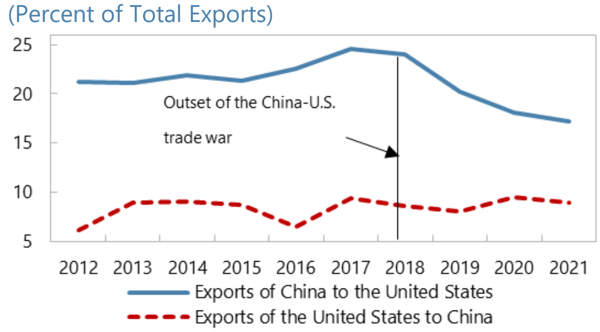
U.S.–China Tariff Rates
(Percent)



Source: U.S.–China Trade War Tariffs: An Up-to-Date Chart | PIIE.

The China–U.S. trade war reduced trade values between the two countries and did not improve the U.S. trade balance. Tariff escalation between the United States and China has been costly and has repressed trade between the two countries as the share of their total trade.[1] In the United States agriculture, transport equipment, and chemical sectors, and in China electronics, machinery, and other manufacturing sectors were the most affected. While the bilateral trade deficit of the United States with China shrank in 2019, the overall trade deficit of the United States did not improve. IMF April 2019 WEO Chapter 4 finds that bilateral trade balances are mostly driven by macroeconomic factors and changes in bilateral tariffs have a smaller role in the evolution of bilateral trade balances. The chapter concludes that targeting specific bilateral trade balances will only lead to trade diversion and offsetting in trade balances with other trading partners.

Exports to the United States and China
(Percent of Total Exports)



Source: UN Comtrade.

The trade war also led to substantial trade diversion, impacting different countries differently, and led to income losses concentrated in the United States and China. For some emerging market economies including Mexico, India, and Malaysia, trade diversion created gains that outweighed the losses from repressed investment and negative income effects. Fajgelbaum and others (2021) show that the impact of the China–U.S. trade war has varied across countries. They find that trade among bystander countries, as well as trade between the United States and these countries, increased notably and conclude that rather than only reallocating trade flows, the trade war might have created new trade opportunities for some countries. The direct effects of the trade war were concentrated in the United States and China and were estimated by various studies to range from 0.01 to 0.1 percent of GDP in the U.S. and from 0.09 to 0.29 percent of GDP in China (Fajgelbaum and Khandelwal, 2022). These direct effects do not account for the dynamic losses caused by the trade tensions on the global economy such as those linked to the chilling effect on investment of growing policy uncertainty which is further discussed below.

____

[1] IMF April 2019 WEO estimates that a 25 percent increase in tariffs affecting all China–U.S. trade would reduce the bilateral trade between the two countries by 20 to 30 percent in the short-term and possibly up to 70 percent in the long-term depending on the model and the direction of trade.

Box 4. Trade and Essential Goods—Food and Medical Products

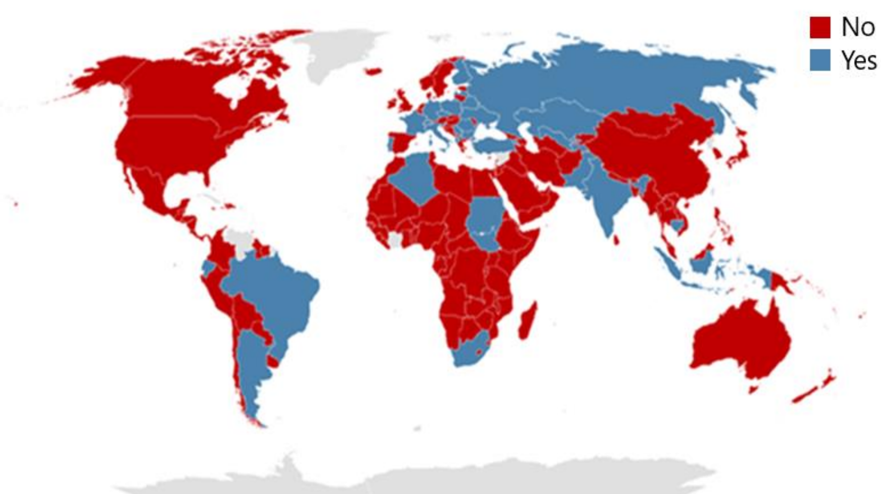
In times of domestic or international emergencies, trade in food and medical products becomes a critical lifeline to meet acute needs and replace disrupted supplies. Cushioning the impact of shocks affecting essential goods is not only macro-critical through its impact on economic growth, but also vital for societies' most vulnerable.

The COVID-19 pandemic and the war in Ukraine underscore the risks from beggar-thy-neighbor trade policies in food and medical products.

- As COVID-19 began to spread in March 2020, new export bans and licensing requirements on food and agricultural commodities are estimated to have affected 9.78 percent of traded calories worldwide. This was further surpassed when Russia invaded Ukraine in February 2022, with countries imposing restrictions amounting to 18.26 percent of traded calories worldwide (Laborde and Mamun, 2022).

- In the case of medical products, countries' initial reactions included a mix of import liberalizing and export restricting measures on trade in supplies critical to fight COVID-19 such as PPEs and ventilators (Global Trade Alert, 2022). These measures led to substantial increases in trade costs for these critical goods in 2020 and 2021 (Egger and others, 2022) and caused significant, although temporary current account implications for several countries in this period (IMF, 2021 ESR; IMF, 2021 Malaysia Article IV Staff Report).

Many Countries Introduced Export Taxes or Restrictions on Medical Goods (e.g., Masks, Respirators, Medicines, or Chemicals Used to Produce Medicines) During the Pandemic



Source: IMF COVID-19 Policy Survey Database (Last Update: March 2021).

But these events also illustrate the value of multilateral trade rules.

- The WTO contributes to medical goods trade in several ways. Negotiated binding tariff commitments have lowered trade costs and reduced uncertainty; the Agreement on Trade-Related Aspects of Intellectual Property Rights (TRIPS Agreement) balances incentives to develop new medicines with flexibilities for governments to address public health needs; the plurilateral 2015 Expansion of the Information Technology Agreement eliminated tariffs on certain modern technology-intensive medical equipment; and the plurilateral Agreement on Pharmaceutical Products eliminated tariffs and other charges on a large set of medicines and their inputs. Trade in health-related services, such as telemedicine, professional education and training, e-commerce, health insurance, health tourism, and temporary movement of healthcare workers abroad, directly impacts the supply of healthcare, and is governed by the GATS.

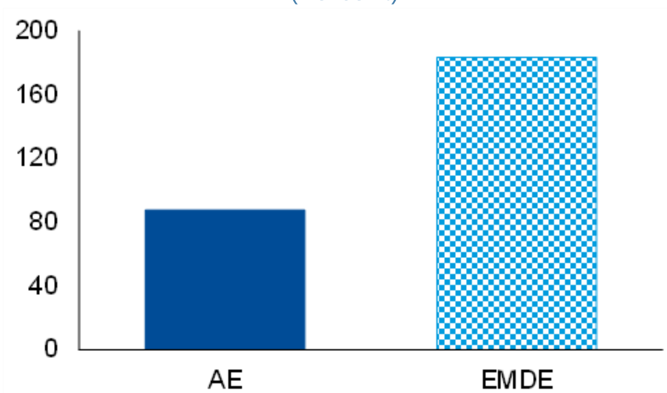
Box 4. Trade and Essential Goods—Food and Medical Products (concluded)

- Multilateral rules on agricultural goods and services, in particular regarding tariffs and subsidies (see Chapter 2), are relatively lax and form part of the unfinished WTO reform agenda. They allow for temporary export restrictions to prevent or relieve critical shortages. Nevertheless, they stipulate notification requirements and due consideration of the impacts of such restrictions on trading partners' food security. The Ministerial Declaration on the Emergency Response to Food Insecurity (WT/MIN(22)/28) issued at MC-12 stressed the need to avoid export restrictions, and called for emergency measures to minimize trade distortions, in particular on vulnerable countries, and to be temporary, targeted, and transparent.

Supplying the world with COVID-19 vaccines relies on highly complex global value chains, underscoring the need for policy coordination. The rollout of vaccines in record time was made possible by the free flow of trade in vaccine inputs, although production itself is concentrated among a small group of countries (Evenett and others, 2022). This success story was nevertheless marred by the unequal access of LIDCs to vaccines. The WTO–IMF COVID-19 Vaccine Trade Tracker (WTO and IMF, 2022) was created to facilitate monitoring of global vaccine access with the aim of ending the pandemic. To this end, some emerging market economies have requested a waiver from certain obligations under the WTO TRIPS Agreement for COVID-19 drugs and vaccines in order to jumpstart their own production, which ultimately resulted in an agreement on the issue by trade ministers at the June 2022 WTO Ministerial Conference (WT/MIN(22)/30).

18. Policy barriers to services trade have remained steady over the review period, and are much higher than goods trade barriers (OECD, 2021). The average trading partner faced services trade barriers of around 80 percent in tariff-equivalent units in AEs and 172 percent in EMs, where variability was significantly greater (Figure 11).[5] Trade in business services faced the lowest barriers while construction faced the highest barriers. Services sectors facing lower trade costs tend to be both more productive and experience higher productivity growth (Miroudot, Sauvage, and Shepherd, 2013). Domestic regulation, which often serves legitimate policy objectives, plays a key role as a barrier, although harmonization, standards, and best practices can help lower trade costs. Deeper liberalization has the potential to unlock substantial welfare gains but has been elusive both at the multilateral and regional level.

Figure 11. Tariff-Equivalent Services Trade Restrictions
(Percent)



Sources: OECD, IMF staff calculations.

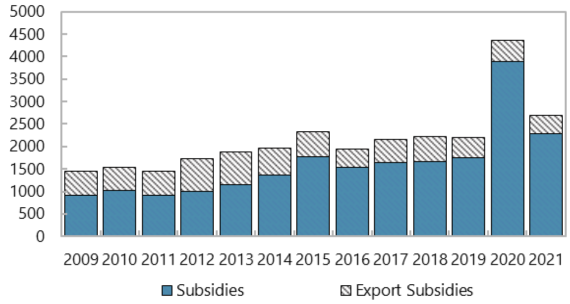
[5] Based on the OECD Services Trade Restrictiveness Index. Regulatory barriers to services trade do not generate customs revenues but their negative impact on imports can be expressed in tariff-equivalent terms.

19. These relatively high trade barriers faced by services compared to goods are an increasing drag on growth. Since structural change implies growing expenditure on services relative to goods, services trade barriers become increasingly important (Lewis and others, 2022). This also has a bearing on current account imbalances by depressing the trade balances of countries with a comparative advantage in services, although estimates of the magnitude vary (Barattieri, 2014; Joy and others, 2018; Boz, Li, and Zhang, 2019). A WTO plurilateral Joint Initiative on Services Domestic Regulation and services provisions in recent RTAs such as CPTPP help lock in existing gains and prevent backsliding.

20. Moreover, there is an increasing risk of proliferation of restrictions to the provision of cross-border services in new areas. The WTO moratorium on the application of customs duties to electronic transmissions has discouraged such restrictions but will lapse in early 2024 unless extended by WTO members. The recent proliferation of digital services taxes (DSTs) motivated by tax base erosion and profit shifting (BEPS) and other fiscal concerns is meant to be addressed under the G-20/OECD Inclusive Framework negotiations to reform international tax rules. Pillar 1 of the agreement would reallocate some taxing rights of digital MNEs to the countries in which they operate and remove unilateral DSTs, and failure to implement it would therefore pose additional risks to trade, including retaliatory measures to DSTs. Pillar 2 would introduce a global minimum tax that helpfully reduces the scope to use tax incentives for industrial policy purposes, particularly important for digital MNEs ("scale without mass"), but could encourage the use of other forms of subsidies. This underscores the need for greater transparency and clearer international norms on the appropriate use of subsidies more generally (IMF, OECD, WBG, and WTO, 2022).

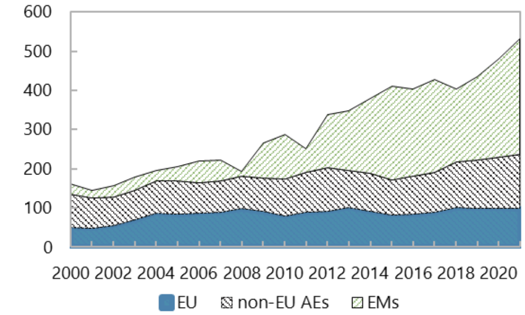
21. Trade distorting industrial policies, including subsidies, have gained momentum. Subsidies can take a variety of forms (e.g., direct grants, below-market finance, tax advantages) and are difficult to quantify, but their use has risen as countries seek to respond to a range of challenges encompassing health, food, and the climate crisis (the latter prompting a debate over the appropriate design of green industrial subsidies) or try to gain a competitive edge in certain strategic sectors such as high-tech products (Figure 12). These measures are sometimes explicitly or implicitly justified on the grounds of national security. EMs have steadily increased agricultural producer subsidies over the last decades, overtaking AEs in recent years (Figure 13). Even when necessary from a public policy perspective, subsidies are costly to sustain, and can have unintended consequences such as weighing down productivity by misallocating resources (Jurzyk and Ruane, 2021) and disadvantaging foreign competitors. Sharp differences over subsidies have brough significant discord to the trading system, which makes additional work to fill data gaps and economic analysis even more of a priority (IMF, OECD, WBG, and WTO, 2022).

Figure 12. New Trade Distorting Subsidies
(Number of measures)



Source: Global Trade Alert, GTA category.
Note: Both type of subsidies may distort both imports and exports.

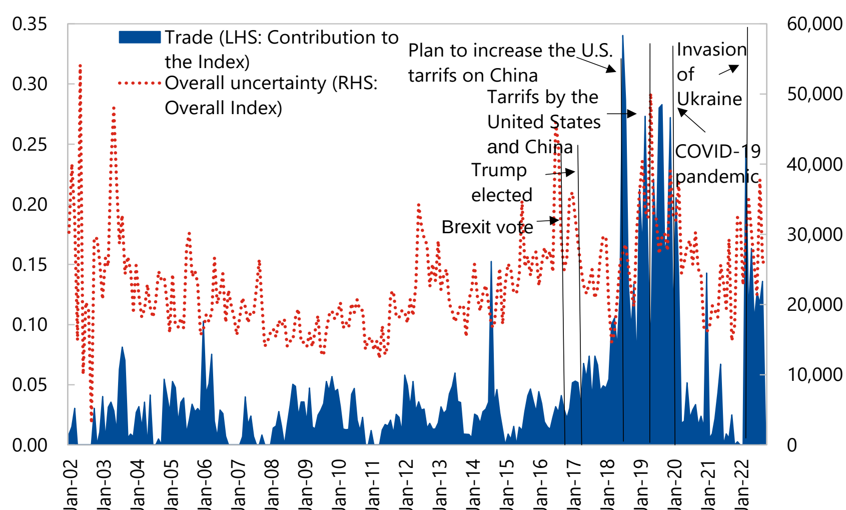
Figure 13. Agricultural Producer Subsidies
(Billions U.S. dollars of 2021)



Source: OECD Producer Support Estimate (PSE) database.

22. Trade policy uncertainty has surged to unprecedented levels in recent years. The withdrawal of the UK from the EU, the trade tensions between the United States and China, the pandemic, and Russia's war in Ukraine have contributed to the sharp rise in trade policy uncertainty (Figure 14). While aggregate trade volumes are still growing, the current geopolitical environment and security concerns have given rise to a surge in trade distortive measures (documented below) that further feed uncertainty and negatively affect trade growth going forward. A less certain environment curtails global economic activity by suppressing firms' investment incentives (Handley and Limão, 2022) and lowering consumers' confidence and spending, in particular on durable goods where consumption can more easily be delayed (Altig and others, 2020). A one standard deviation hike in trade policy uncertainty (e.g., March to June 2018, when the United States introduced tariffs and trading partners retaliated) is estimated to reduce investment by 2.5 percent and GDP by 0.4 percent within three years (IMF 2022 REO: Asia and Pacific). The weakening of the dispute settlement mechanism at the WTO makes it more likely that trade tensions erupt into trade protectionist measures—a point further discussed below.

Figure 14. Contribution of Trade to World Uncertainty Index



Source: Ahir H, N. Bloom, and D. Furceri (2022), "World Uncertainty Index", NBER Working Paper.

WTO and Trade Agreements

23. The multilateral trade agenda has been sluggish; relaunching it requires updating the WTO system to address new and emerging issues. The slow pace of multilateral reforms has left in place major obstacles and trade distortions, and the failure to address these issues has contributed to recent trade tensions. In response, at the 2018 Buenos Aires Summit, G-20 Leaders called for the "necessary reform of the WTO"—a call that continues to be reaffirmed by Leaders. The reform agenda has focused on four areas. First, strengthening WTO rules, such as those on subsidies, investment disciplines, intellectual property rights protection and enforcement, and flexibilities for developing countries. Second, improving transparency, including through notification requirements and independent monitoring—an area where practice has fallen short.[6] The third area is restoring effective dispute settlement by resolving the current impasse over Appellate Body vacancies. The final area is reaching new market-opening agreements in areas relevant to the modern economy (such as e-commerce, services, and investment facilitation).

24. The June 2022 WTO Ministerial (MC-12) included several positive developments, but broader liberalization and WTO reform will require further progress, including a pragmatic approach in which subsets of WTO members move ahead. In December 2021, 67 WTO members concluded negotiations on a Joint Initiative (JI) on Services Domestic Regulation (SDR), making it the first WTO services deliverable since the 1997 agreement on financial services, and the first JI to reach conclusion. At MC-12, members reached an agreement on fisheries subsidies, an extension to the long-standing moratorium on electronic transmissions duties, and a partial five-year waiver from WTO intellectual property rules for COVID vaccines. Trade Ministers also agreed at MC-12 to work toward a roadmap on WTO reform and to conduct discussions with 'the view' to having a fully and well-functioning dispute settlement system by 2024.[7] Negotiations toward agreements on e-commerce and investment facilitation continue. Where possible, this should involve the whole membership, but experience also shows that it can be valuable, where necessary and legally feasible, to proceed within the WTO on a plurilateral basis, among sub-sets of the membership.

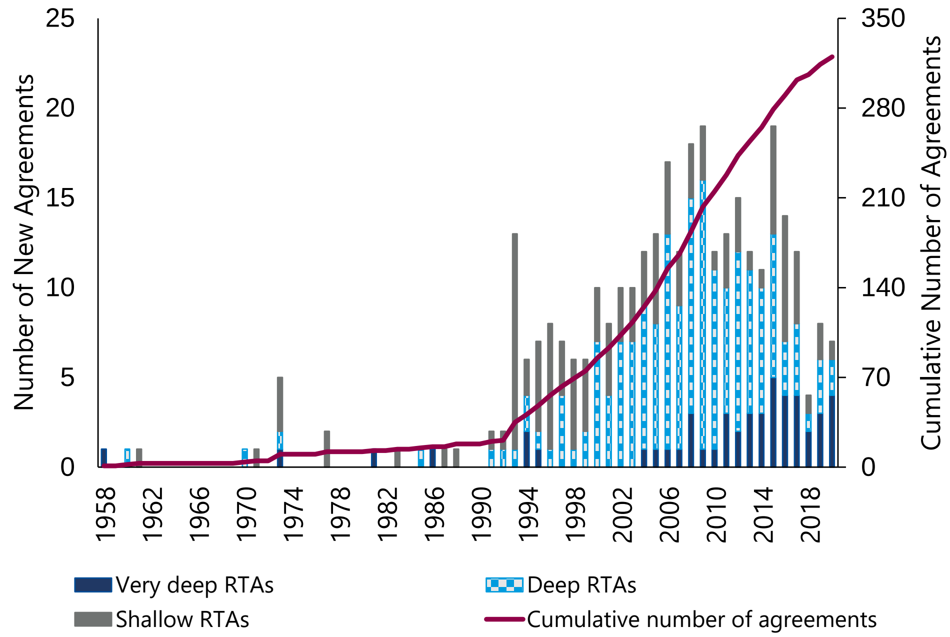
25. While progress on the multilateral agenda stalled, RTAs mushroomed globally and increased their depth. The number of RTAs such as the African Continental Free Trade Agreement (AfCFTA) and the Comprehensive and Progressive Trans-Pacific Partnership (CPTPP) rose from below 50 in 1990 to over 350 today. Many of these agreements have "deepened" (Figure 15), extending their reach beyond tariffs and precisely in those behind-the-border areas where the WTO has been unable to deliver such as subsidies and state-owned enterprises, services, and investment (Mattoo, Rocha, and Ruta, 2020). More recently, RTA activity appears to have slowed down and, in some cases,

[6] According to the WTO Secretariat, and as of May 2022, 94 members had still not submitted their 2021 subsidy notifications, 78 members had not submitted their 2019 subsidy notifications, and 67 had yet to submit their 2017 notifications.

[7] WTO, MC-12 Outcome Document, June 22, 2022.

countries have turned to novel approaches such as the Indo-Pacific Economic Framework for Prosperity (IPEF) which primarily aim at regulatory cooperation rather than market-opening.

Figure 15. Deepening of RTAs Over Time



Source: Hoffmann, Osnago, and Ruta (2017).

Notes: Shallow RTAs are defined as agreements that cover up to 10 policy areas; deep RTAs are agreements that cover between 10 and 20 policy areas, and very deep RTAs are agreements that cover more than 20 policy areas.

26. RTAs contribute to reduce trade costs and can be useful laboratories for regulatory innovation but need to move in complement with multilateral integration to avoid fragmentation. The WTO and the multilateral system's unique strengths cannot be duplicated in RTAs and countries need the institutional framework of the WTO to ensure that RTAs can co-exist with an open multilateral trade system. The WTO's global reach, inclusiveness, and institutional, legal, and enforcement characteristics cannot be matched, and are particularly important to smaller countries and LICs, who rely on stable rules and open access to larger markets. Crucially, the WTO provides governments and policymakers with a set of consistent rules that support informed decision making and efficient markets.

27. Negotiations of WTO-based plurilateral agreements have gained momentum and can be another way to advance the trade agenda. Several plurilateral initiatives are moving forward at the WTO, including those on e-commerce and investment facilitation, while negotiations for a plurilateral agreement on Services Domestic Regulation concluded in December 2021. Innovations in the 2017 Trade Facilitation Agreement, which allows for variable speeds and depths of integration, may also help to point a way forward. While WTO-based plurilateral agreements may be a helpful way to rekindle trade integration, some members have argued that this approach may not be legally consistent with the WTO rules and principles.

MODALITIES OF FUND WORK ON TRADE

A three-pillared evaluation shows the Fund's strengths of responding to shocks and key trade events with high quality coverage in surveillance and analytical outputs, but also a decline in attention to trade policy overall. Further investment is needed to keep up with policy areas of growing importance, anticipating headwinds to globalization and better translating multilateral surveillance into bilateral policy advice.

A. Methodology

28. The analysis is based on three complementary evaluation approaches aimed at the systematic review of bilateral and multilateral work between 2014 and 2022. The first approach involves textual analysis to assess the coverage of trade developments and trade policies in multilateral surveillance, bilateral surveillance, and program reviews. The textual analysis uses a search software to calculate the number of trade-related words and phrases, covering 2002–2022 to help establish a longer-term perspective on the Fund trade work. The second approach is a survey of IMF country teams regarding their Article IV and program staff reports.[8] The third approach relies on a review of multilateral surveillance and research work in consultation with external experts (Professors Douglas Irwin and Nina Pavcnik at Dartmouth College and Professor Amit Khandelwal at Yale University) who assessed the coverage of key themes in the overall output and examined in greater depth the quality and relevance of a subset of outputs. The methodology is further detailed in Section 3 of the Background Paper.

B. Review of Multilateral Surveillance and Research

The review of multilateral surveillance showed timely coverage of key issues such as supply chain resilience, state-owned enterprises, and the importance of rules-based trade to the global economy, but also identified areas for further investment (e.g., policies underlying trade tensions, services and digital trade, development issues, climate change).

29. The textual analysis of the IMF flagship products[9] suggests that the coverage of trade issues has increased in the past two decades while attention to trade policy topics has been marginal. The result of the textual analysis reveals that coverage of trade developments grew in multilateral surveillance (Figure 16).[10]

- Multilateral surveillance in some cases showed timely reaction to shocks that affected trade and trade policy. For example, following the outset of the China–U.S. trade war, more attention was

[8] Over 120 responses, representing all regions and income levels.

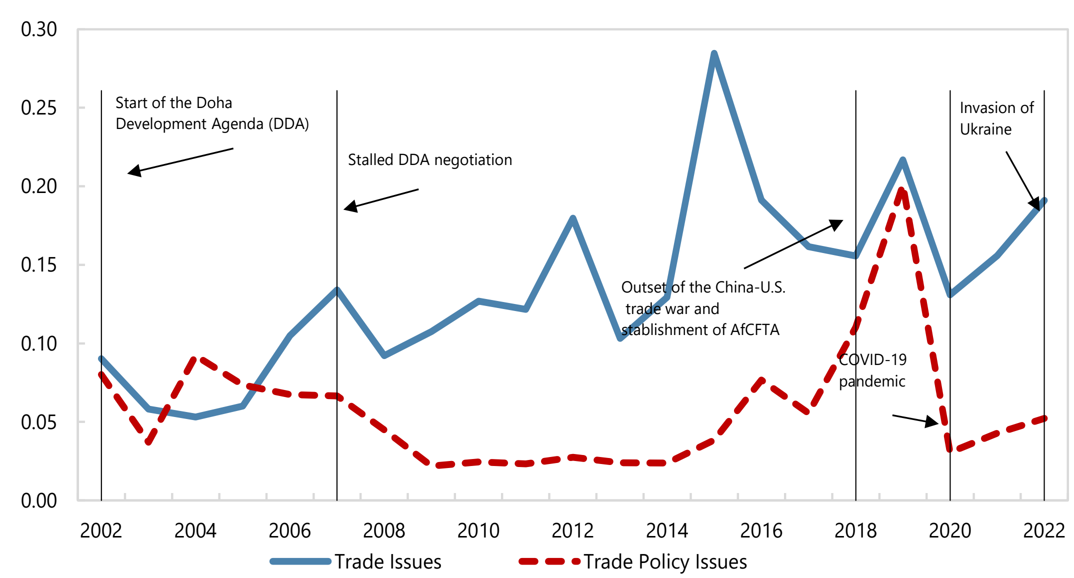
[9] The textual analysis was done on World Economic Outlooks (WEOs), External Sector Reports (ESRs), Global Financial Stability Reports (GFSRs), Fiscal Monitors (FMs), and Regional Economic Outlooks (REOs).

[10] The textual analysis exercise is performed on three disjoint sets named BOP, trade, and trade policy. Each set includes multiple topics, and each topic contains several keywords. For a detailed list of words and topics, please see Section 3 of the Background Paper.

dedicated to trade integration and trade tensions. More recently, with the pandemic and the war in Ukraine, the Fund flagships studied the resilience of GVCs and the trade effects of geopolitical tensions.

- With the exception of the China–U.S. trade war, the attention to trade policy topics has been marginal. For example, the textual analysis does not detect the launch of the WTO Doha Round in late 2001 nor the breakdown in negotiations in 2007 and 2008.

Figure 16. Textual Analysis of Trade and Trade Policy in Multilateral Surveillance
(Percent, Related Words Over Total Number of Words)

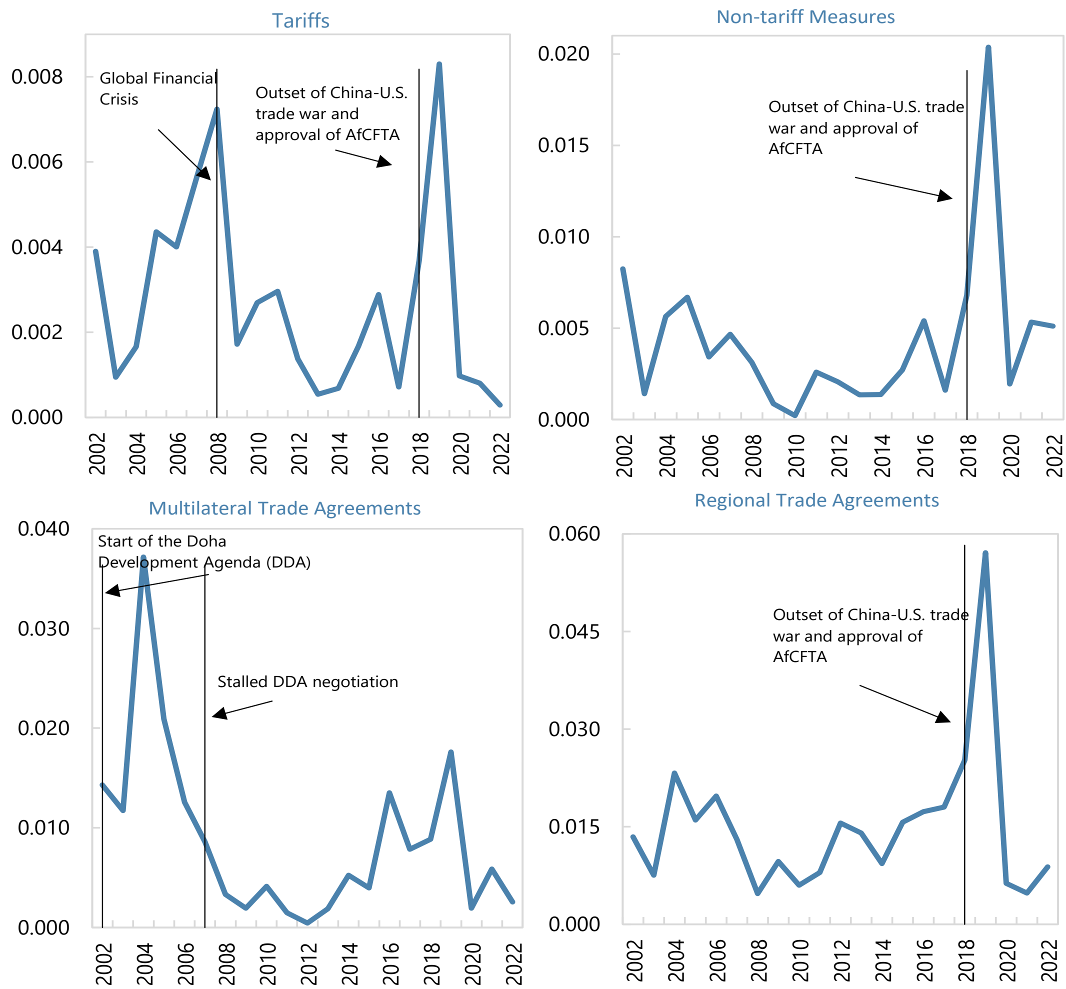


Source: Textual analysis exercise of flagship products by IMF staff.

30. In line with the aggregate trend, the Fund has been responsive to selected trade policy developments but was not consistent in its coverage. Figure 17 shows that flagship products increased their coverage of tariffs and NTMs after the outset of the China–U.S. trade war. Similarly, there is an increase in focus on RTAs in correspondence to the approval of large RTAs such as the African Continental Free Trade Area.[11] The search for keywords related to multilateral trade agreements confirms that the coverage of MTAs in IMF flagship documents has declined over time and has been unresponsive to key developments in WTO negotiations such as the launch of the Doha Round and the breakdown of its negotiations.

[11]April 2019 WEO–Chapter 4, April 2019 Sub-Saharan Africa REO–Chapter 3, and October 2019 Sub-Saharan Africa REO–Chapter 1.

Figure 17. Textual Analysis of Trade and Trade Policy in Flagship Products
(Percent, Related Words Over Total Number of Words)



Source: Textual analysis exercise of flagship products by IMF staff.

31. The report by the external experts stressed the quality and policy relevance of the Fund's output on trade (see Figure 18 and Box 5).[12] The strengths of the Fund were the ability to respond rapidly to shocks affecting trade with high-quality analysis, including the China–U.S. trade war, pandemic, and Russia's war in Ukraine, and to cover a wide array of trade topics, spanning GVCs, spillovers, currency pass-through and invoicing, aggregate gains from trade, knowledge flows, and commodity prices. The consistently high quality and policy relevance of WEOs drew special praise.

[12] Quality and policy relevance are rated 1 (lowest) to 10 (highest). Here 10 denotes the frontier or state-of-the-art research methodology for quality, or utmost policy relevance as assessed by the external experts.

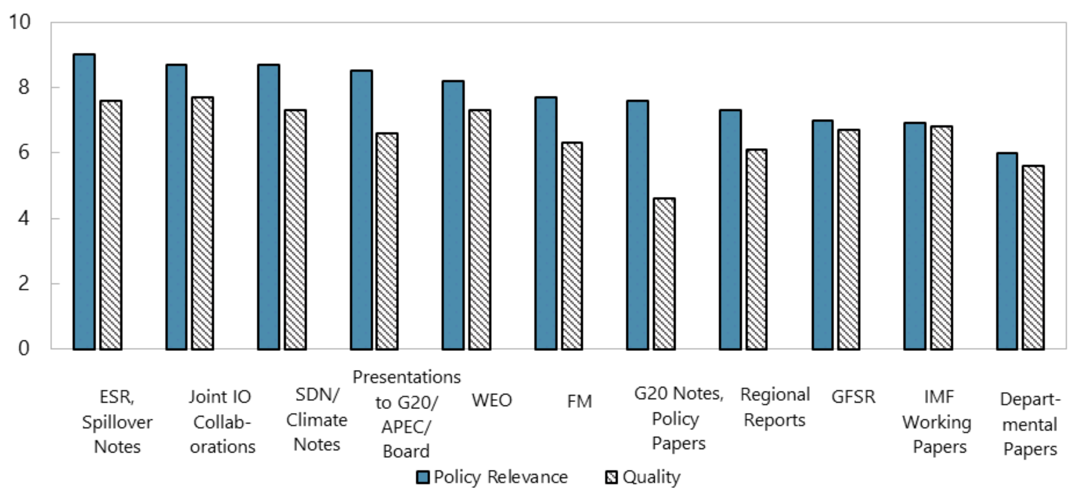
32. External experts made three sets of recommendations, which are in line with staff views:

- **The core trade areas deserve continued attention but would benefit from more granular analysis.** These core issues include the analysis of spillovers through GVCs, the uneven impacts of trade on workers, complementarities with development policies and institutions, and interactions with climate policies. Regionally, more attention could be devoted to Africa, given its persistent trade-related challenges and potential for growth and reforms (and the role of IMF-supported programs).

- **The Fund needs to further analyze "modern" trade areas that have increasing macroeconomic ramifications.** The coverage of services trade should be improved to meet their growing economic significance. A more extensive treatment of areas where globalization continues to advance rapidly (digitalization, e-commerce, cross-border data flows, regulatory harmonization) in multilateral surveillance would be highly impactful in the global policy debates.

Figure 18. External Reviewers' Assessment

Ratings: 1 (Lowest) to 10 (Highest)



Source: External experts' report.

- **The Fund should not fall behind in its use of new data and tools.** Trade work requires investment in more granular data (including firm-level data and trade policy data) and specific expertise, including through training. In most cases, new data can best be developed in collaboration with other IOs. Internal workshops could be held on state-of-the-art empirical, modeling, and forecasting methods (e.g., gravity models and quantitative trade models), which better account for country-specific frictions and market distortions, and thus allow for more targeted policy advice.

Box 5. Select Management Engagements and Research on Trade

This box provides a snapshot of select IMF Management engagements on trade, including speeches and conferences, as well as trade-related research outputs during the review period (2014–2022). A more complete list of activities and publications in this area are included in the online appendix.

Flagship and G-20 Reports

- April 2022, Chapter 4: "Global Trade and Value Chains in the Pandemic".
- April 2020, Fiscal Monitor Chapter 3: "State-Owned Enterprises: The Other Government".
- April 2019, Chapter 3: "The Price of Capital Goods: A Driver of Investment under Threat?"
- April 2019, Chapter 4: "The Drivers of Bilateral Trade and the Spillovers from Tariffs".
- October 2018, Chapter 1, Section: "Risks" and Scenario Box 1: "Global Trade Tensions".
- July 2018, G-20 Surveillance Note Annex: "The Global Impact of Escalating Trade Actions".
- October 2016, Chapter 2: "Global Trade: What's behind the Slowdown?".
- July 2016, "Group of Twenty – Reinvigorating Trade to Support Growth: A Path Forward".

Joint Papers and Statements with other International Organizations

- April 2022, "Subsidies, Trade, and International Cooperation". (IMF-OECD-WB-WTO)
- April 2020, "Joint Statement on Trade and the COVID-19 Response." (IMF and WTO)
- September 2018, "Reinvigorating Trade and Inclusive Growth". (IMF-WBG-WTO)
- April 2017, "Making Trade an Engine of Growth for All: The Case for Trade and for Policies to Facilitate Adjustment". (IMF-WBG-WTO)
- October 2016, "How to Make Trade Work for Everyone," op-ed by Christine Lagarde, Jim Yong Kim, and Roberto Azevedo.

High-level Events and Speeches

- April 2022, "Preserving Open Trade: Subsidies, Geopolitics, and International Cooperation" – Joint IMF-World Bank-WTO-OECD Panel.
- October 2019, "Greater Coherence in Global Economic Policy-Making: The Case of WTO Accession" – Joint IMF-World Bank-WTO Conference.
- December 2018, "Why a New Multilateralism Now?" – Remarks by First Deputy Managing Director David Lipton at the Bloomberg Global Regulatory Forum.
- October 2018, "How Global Trade Can Promote Growth" – Joint IMF-OECD-World Bank-WTO conference for the 2018 Annual Meetings.
- November 2017, "Sixth IMF-WB-WTO Trade Conference".
- October 2016, "Making Trade an Engine for Growth for All" – Annual Meetings Seminar.

Other Research Outputs

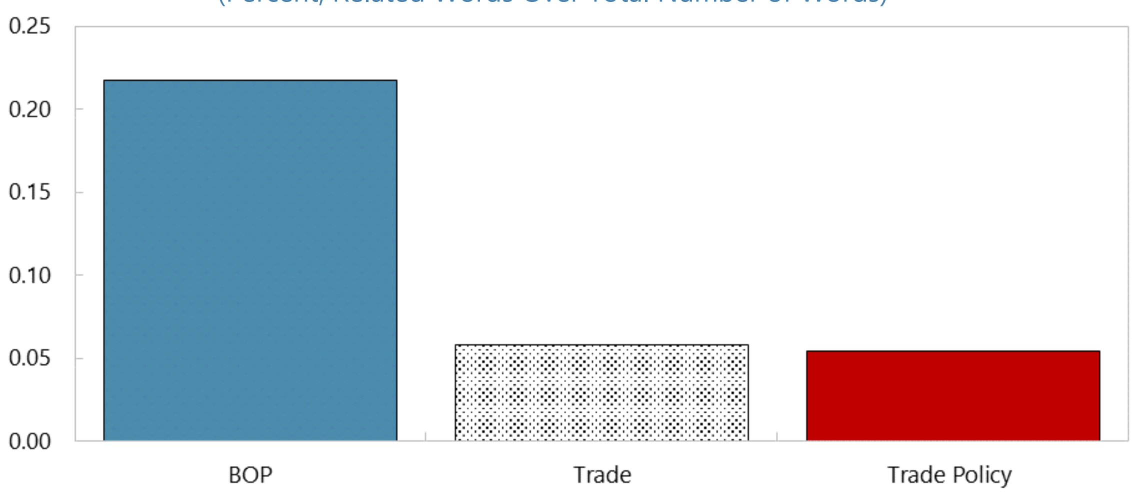
- September 2021, "Carbon Pricing: What Role for Border Carbon Adjustments?".
- May 2020, "The African Continental Free Trade Area: Potential Economic Impact and Challenges

C. Review of Country Coverage

The textual analysis and the country team survey show consistent attention to trade issues, in line with the continued relevance of trade for IMF member countries. In contrast, the analysis shows a significant decline in the coverage of trade policy despite the surge in the number and complexity of trade measures.

33. The textual analysis of Article IV surveillance and program review documents shows most of the focus has been on balance of payments (BOP) assessments. This is consistent with the findings of the 2015 review.[13] Keywords and phrases used in the textual analysis for BOP assessment—imports, exports, trade, trade balance, and the WTO BOP committee—occur with high frequency and are more than three times higher than word counts for other trade and trade policy issues (Figure 19).[14] Separating these words and phrases allows for a more complete picture of coverage of "trade issues" beyond BOP assessments, including topics ranging from trade in goods and services to spillovers, trade and technology, and fragmentation, to "trade policy issues," which include topics such as tariffs, non-tariff measures, trade war, RTAs, and MTAs.

Figure 19. Textual Analysis of BOP, Trade, and Trade Policy Issues in Bilateral Surveillance
(Percent, Related Words Over Total Number of Words)



Source: Textual analysis exercise of AIV surveillance and program review documents from 2002 to 2022 by IMF staff.

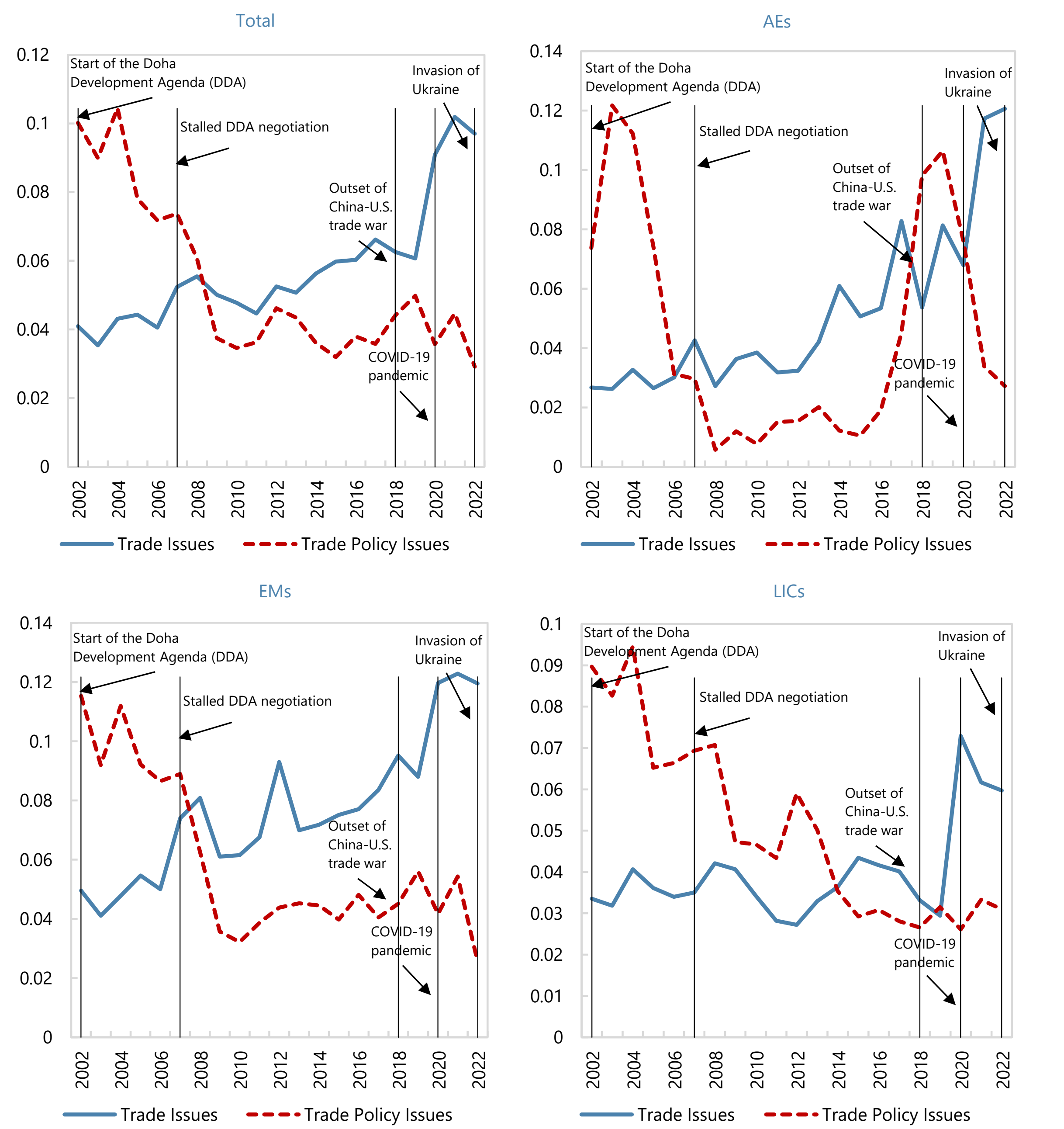
34. The coverage of trade issues in IMF reports kept up with the long-term trend of trade becoming a more prominent part of IMF members' economies. For the median IMF member (goods plus services) trade as a share of GDP surged over time from 69 percent in 2002 to 86 percent in 2022. Moreover, trade issues came to the forefront under the period covered by this review, especially since 2018 with the growing trade tensions between China and the United States

[13] The higher coverage of BOP-related topics is expected given that Article IV documents include an External Sector Assessment and program documents include a discussion of recent external sector developments.

[14] A "weighted" textual analysis exercise, where weights are defined as the share of GDP of countries in the world GDP, shows that the coverage of BOP and trade topics remains the same, but the coverage of trade policy issues nearly doubles to 0.1 percent. This reflects the higher attention in staff reports to trade policy developments in large economies such as China and the United States, as further discussed below.

and also since the beginning of the pandemic with the severe disruptions to GVCs and trade in essential goods as documented in Chapter 2. This is most visible in the chart for LICs—the coverage of trade topics was relatively flat prior to the pandemic and picked up after 2020 driven by key words related to disruptions to GVCs and trade in food and medical products (Figure 20).

Figure 20. Textual Analysis of Trade and Trade Policy in Bilateral Surveillance
(Percent, Related Words Over Total Number of Words)



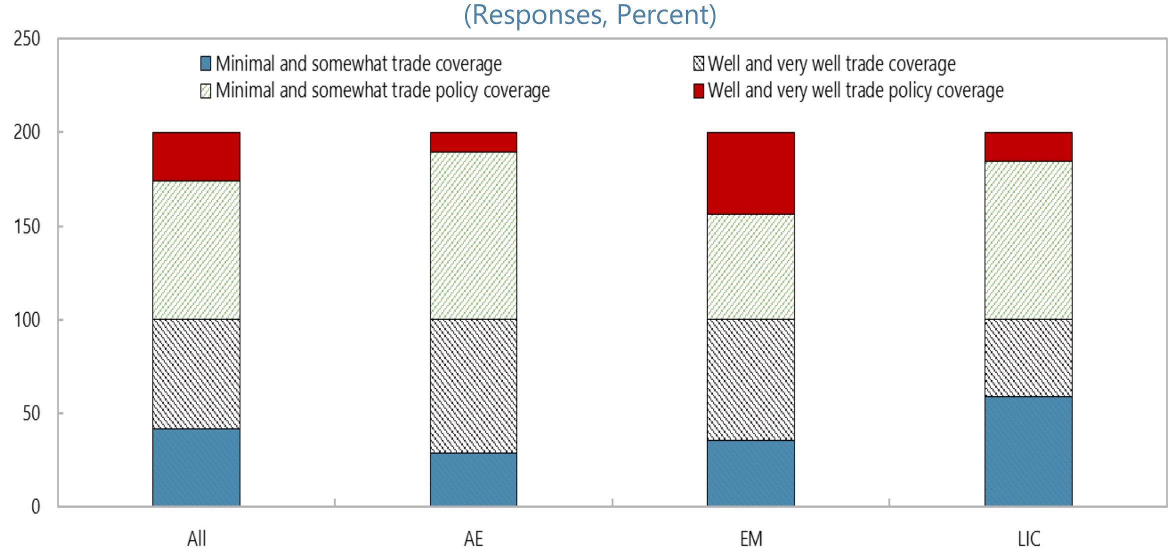
Source: Textual analysis exercise of AIV surveillance and program review documents by IMF staff.

35. Over time, the coverage of trade policy in Article IV surveillance and program review documents has notably declined, even as the importance of trade policy issues increased. This declining pattern is present across countries with different income levels, apart from the coverage by AEs during Brexit and the trade war (Figure 20). In addition, bilateral surveillance for China and some East Asian economies included higher coverage of trade policy issues during the trade war which offsets the declining attention to trade policy developments in EMs and LICs in other regions during the last decade.[15] The overall decreasing coverage of trade policy issues may reflect a sustained decline in trade policy support for country teams, even as the number of trade measures increased and trade policies themselves grew more complex. It also suggests that there may be persistent difficulties in translating multilateral surveillance into bilateral policy advice—a finding that is consistent with the 2015 Trade Review and requires careful thinking for a forward-looking strategy.

36. Consistently with the textual analysis, the country team survey also shows a noticeable difference between trade and trade policy coverage. While the country survey was not able to assess historical trends and focused on the last three years or reports (unlike the textual analysis), trade issues were covered to a greater degree over trade policy issues which, in contrast, were overwhelmingly assessed to be only minimally or somewhat covered both in aggregate and across income levels (Figure 21). In addition to the determinants as described above, country teams cited several reasons for gaps in their overall coverage, including space constraints, need to cover other more pressing issues, and limited relevance.

Figure 21. Country Survey—Coverage of Trade and Trade Policy

(Responses, Percent)



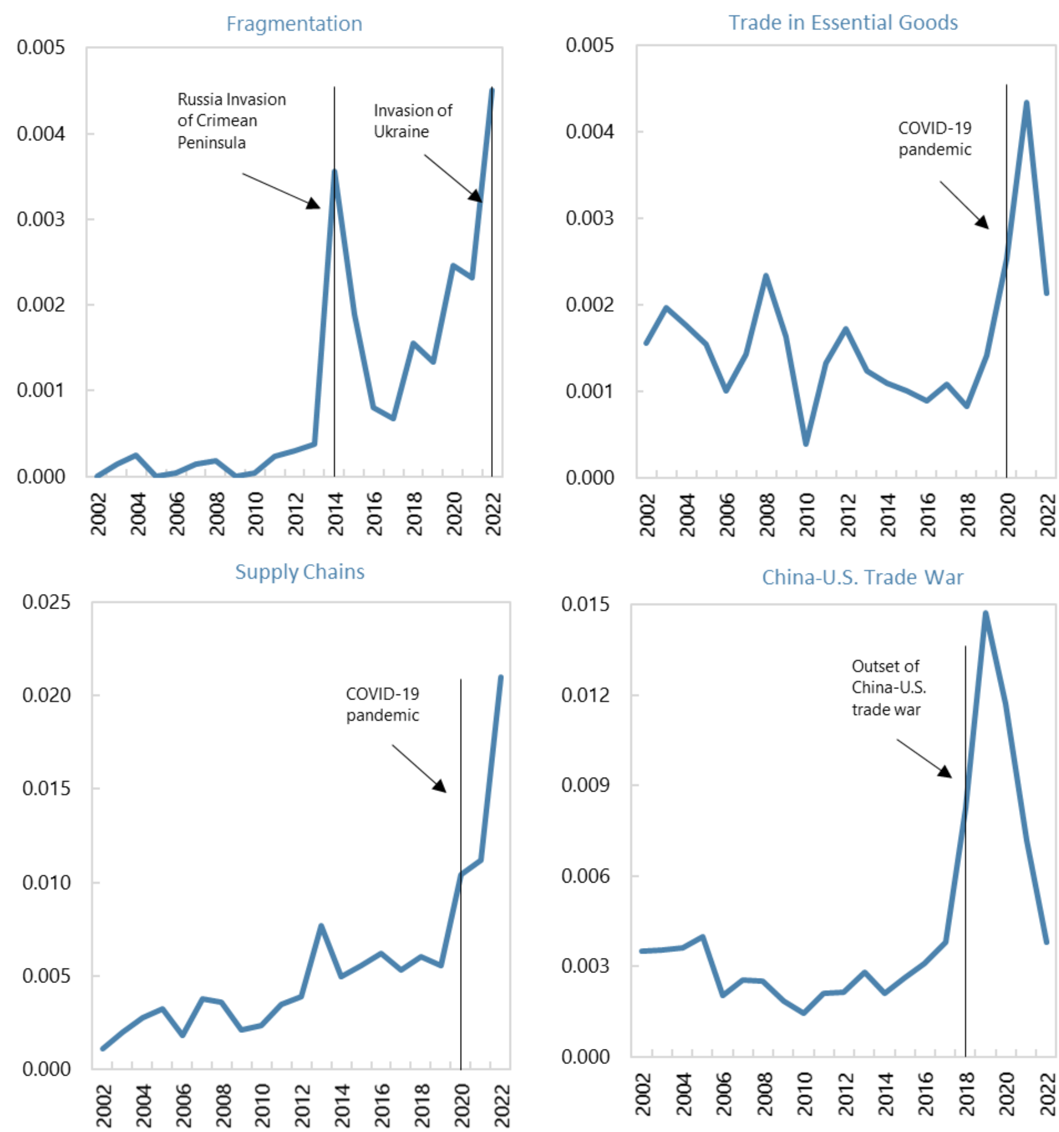
Source: IMF staff.

[15] To provide a benchmark for comparing the ratios depicted in the textual analysis charts, we have counted the number of paragraphs (instead of words) that cover trade and trade policy matters in the United States and China 2015 and 2018 AIVs. For the United States, in 2015, 3 paragraphs mentioned trade issues and 2 paragraphs mentioned trade policy issues, but these numbers increased to 13 and 17 paragraphs in 2018, respectively. For China, 5 paragraphs discussed trade matters and 2 paragraphs covered trade policy issues. The coverage in 2018 increased to 12 and 13 paragraphs for trade and trade policy issues, respectively.

37. At the same time, textual analysis shows that country coverage has reacted promptly to key events related to trade (Figure 22). This finding is consistent with the results of textual analysis for multilateral surveillance. For example, attention to fragmentation increased around developments in Crimea in 2014 and with Russia's invasion of Ukraine in 2022. Trade in essential goods (food and medical products) had higher coverage during the food crises of 2008 and 2012, and at the height of the COVID-19 pandemic. Similarly, coverage of issues related to supply chains surged as bottlenecks emerged starting in the second half of 2020, and attention to issues related to the China–U.S. trade war spiked in 2018 as China–U.S. tensions mounted.[16]

Figure 22. Textual Analysis of Trade in Bilateral Surveillance

(Percent, Related Words Over Total Number of Words)

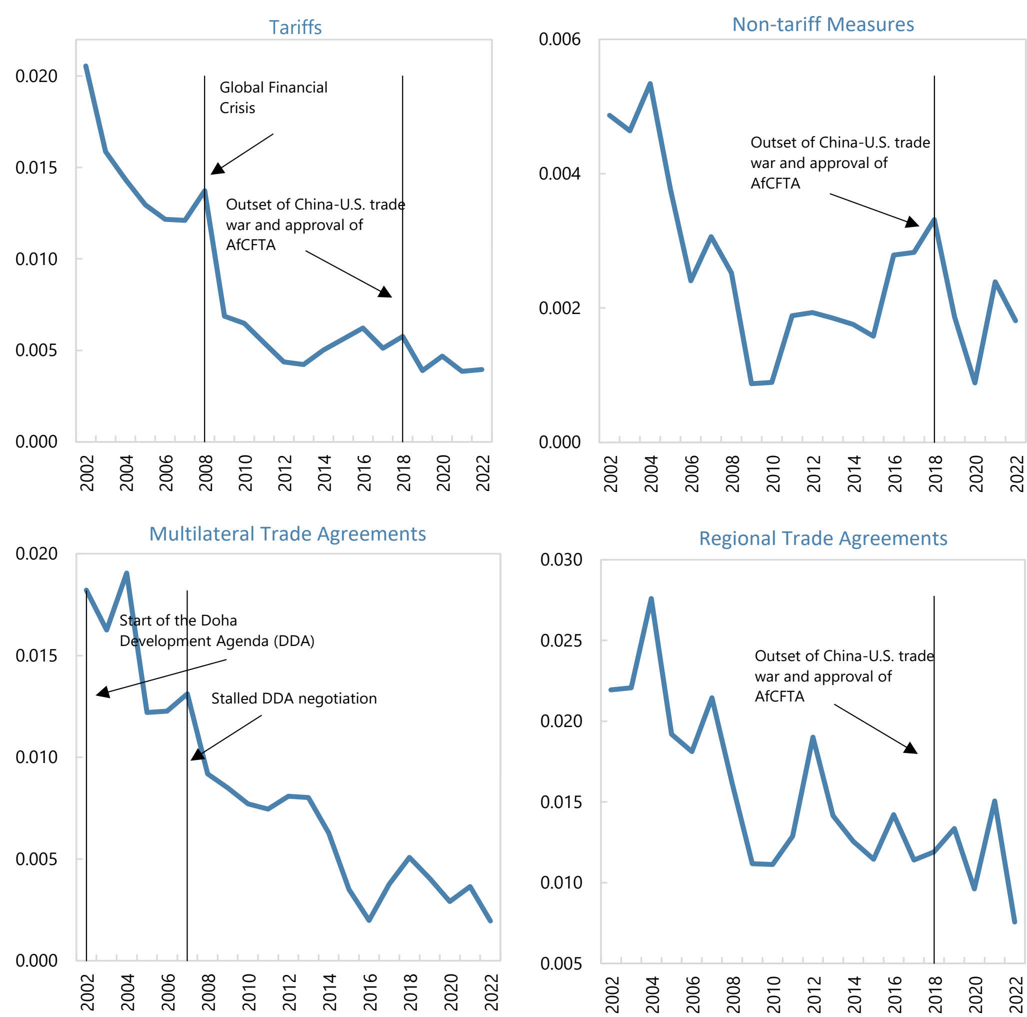


Source: Textual analysis exercise of AIV surveillance and program review documents by IMF staff.

[16] This surge was driven by AIV reports for China and the United States but also from key countries facing significant spillovers (e.g., Vietnam, Mexico).

38. In contrast to trade issues, the coverage of most trade policy topics has declined in bilateral surveillance and program reviews (Figure 23). The coverage of tariff-related issues in staff reports has declined as the relative importance of tariff barriers has decreased in the past decades. However, textual analysis shows that this has not been matched by an increase in coverage of non-tariff measures—although some attention was devoted to this around 2016 (Brexit referendum) and 2018 (China–U.S. trade war). In addition, as documented in Chapter 2, many countries prioritized RTAs over multilateral negotiations as the multilateral trading system weakened. Incognizant of these developments, the coverage of all of these topics declined in bilateral surveillance. This is a surprising finding considering that many RTAs include commitments that can have implications across economic policy, including in areas relevant to the Fund (e.g., service sector reforms, investment, worker mobility, tariff reductions).

Figure 23. Textual Analysis of Trade Policy in Bilateral Surveillance
(Percent, Related Words Over Total Number of Words)

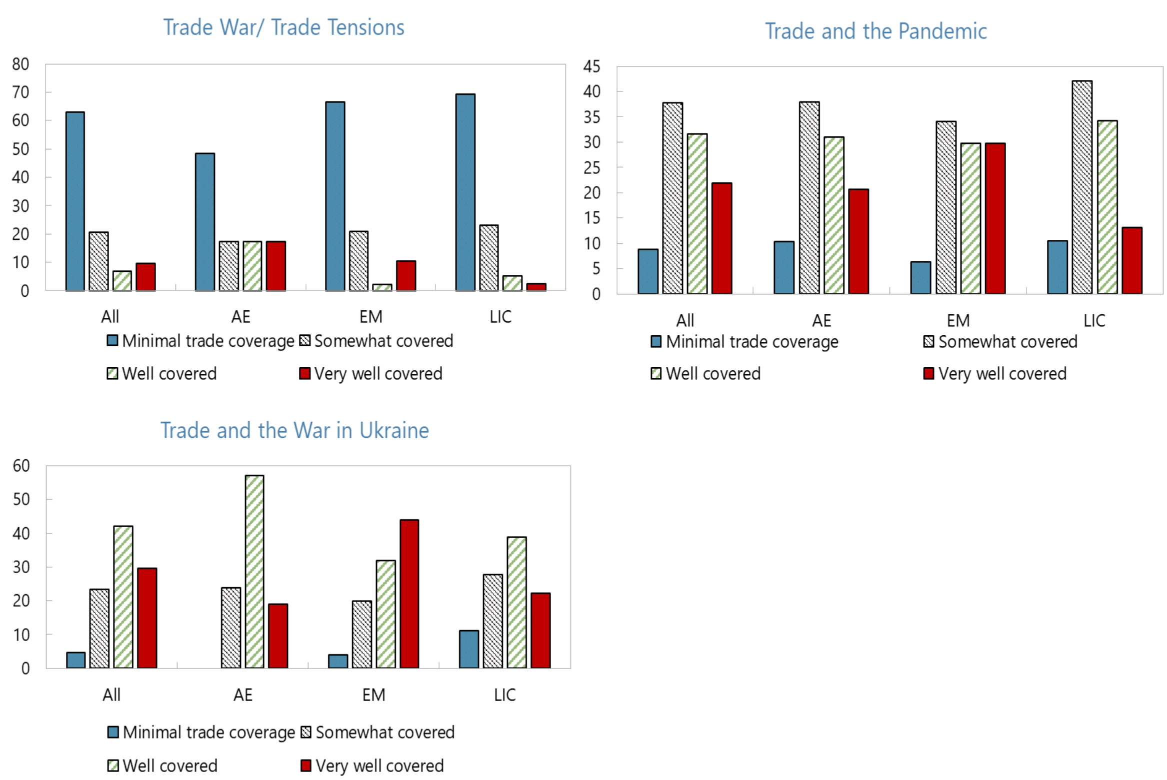


Source: Textual analysis exercise of AIV surveillance and program review documents by IMF staff.

39. In addition to looking at overall trade and trade policy coverage, the country team survey also sought to assess responsiveness to key events. The survey focused on three specific developments during the review period: (i) the China–U.S. trade war and trade tensions, (ii) trade and the pandemic, and (iii) trade and the war in Ukraine. The results largely showed a responsiveness to these events, with the exception of the China–U.S. trade war and associated trade tensions (Figure 24). A higher proportion of AEs assessed the trade war and trade tensions to be well-covered than EMs and LICs who overwhelming responded that coverage was minimal. Trade and the pandemic was generally well-covered, but with more minimal coverage in LICs. The majority of responses indicated that trade and the war in Ukraine was well or very-well covered—a fact that is consistent across income groups. This differences in coverage between the three events could partially be explained by the nature of the shock. For example, the country teams may have assessed the trade war as having a more targeted impact on country groups whereas the pandemic and the war in Ukraine had more global ramifications.[17]

Figure 24. Country Survey—Coverage of Key Events

(Percent)



Source: Textual analysis exercise of AIV surveillance and program review documents from 2002 to 2022 by IMF staff.

[17] Consistently, the coverage of trade policies in Article IV surveillance was correlated with the underlying trade policy uncertainty in the country. This correlation was strongest during periods of heightened trade tensions (2017–2020) indicating that attention was highest in more critical contexts.

40. The findings from the textual analysis and the survey are corroborated by a closer look at Article IV reports which suggests uneven trade policy coverage, and little attention to domestic policies to share the gains from trade and technology more widely. For example, in the largest economies, bilateral surveillance provided policy advice on trade policy issues such as reversing trade restrictions (in the context of the China–U.S. trade war), refraining from using trade measures to address currency concerns, and encouraging state-owned enterprises (SOEs) to act commercially. At the same time, there was little attention to the development impact of large country policies, and few calls to reform domestic trading regimes. Engagement in multilateral trade negotiations received modest attention and was largely focused on G-20 economies. With some important exceptions, there was little attention to domestic policy reforms that would help to share the gains from trade more widely.

FUTURE AGENDA AND PRIORITIES

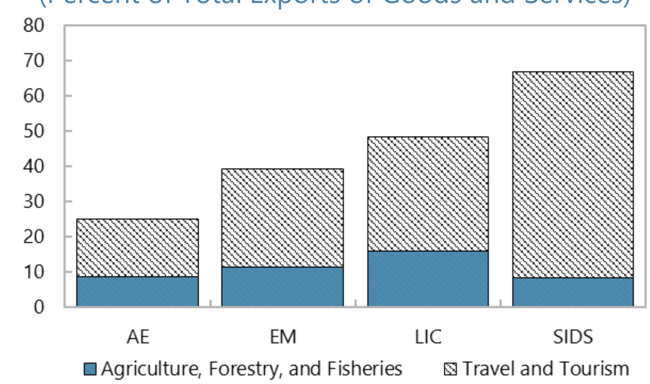
A. Emerging Challenges in Global Trade

Policymakers face key trade and trade policy challenges related to climate change and technology, the growing use of trade policy to achieve non-trade objectives, and the mounting risks of runaway geo-economic fragmentation.

Challenge 1: Structural Forces Such as Technology and Climate Change are Poised to Reshape Global Trade

41. Climate change and extreme weather events lead to shifts in comparative advantage. Climate change affects comparative advantages across all sectors—in particular, agriculture, fisheries, and tourism—by changing the availability and productivity of the different factors of production (i.e., capital, labor, and land). Moreover, recurrent climate-related disasters disrupt trade flows and supply chains, impede capital investment, and impact labor availability through migration. Figure 25 shows that climate change presents significant economic challenges for LICs and especially Small Island Developing States (SIDS) whose exports rely on 'climate sensitive' sectors. While these countries are not among the top carbon emitters, they are expected to face the most adverse consequences of global warming.

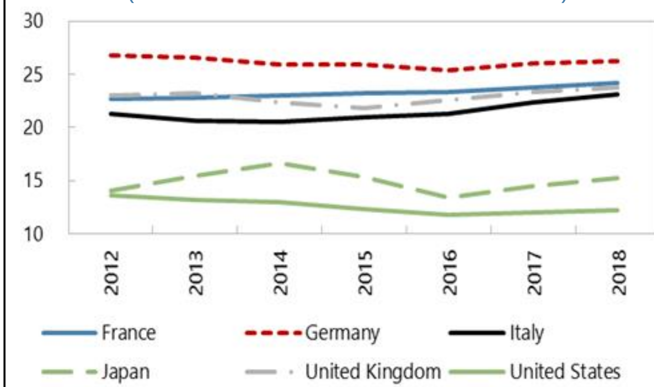
Figure 25. Exports in Climate Sensitive Industries
(Percent of Total Exports of Goods and Services)



Source: UN Comtrade.

42. **Widespread adoption of new technologies (e.g., industrial robots, 3D printing, AI, digital money) can impact trade in several ways.** They may decrease both domestic and cross-border trade costs by reducing transaction and transportation costs, while the spread of automation decreases the role labor costs in firms' sourcing decisions.[18] Uneven adoption of these technologies is likely to influence the patterns of comparative advantage among countries. Thus far, however, there is little empirical evidence for new technologies having an aggregate impact comparable to the ICT revolution of the 1990s that catalyzed GVCs. In fact, Figure 26 shows that foreign value-added in domestic final demand in AEs has not changed significantly in the last decade. Contrary to the view that new technologies will reduce trade opportunities, some recent studies show that the utilization of 3D printing has boosted international trade (Freund, Mulabdic, and Ruta, 2022) and the use of robots has been associated with growing exports of intermediates from developing countries (Artuc, Bastos, and Rijkers, 2020).

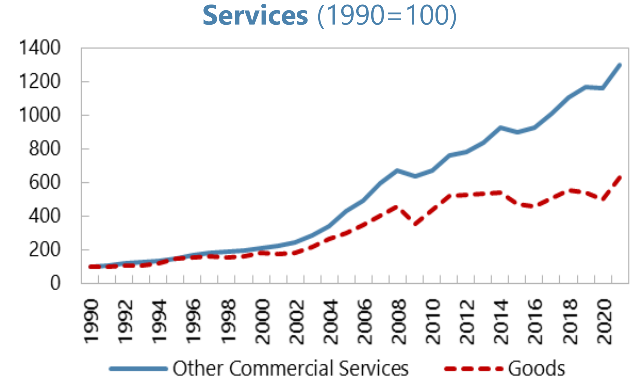
Figure 26. Foreign Value-Added
(Percent of Domestic Final Demand)



Source: The OECD–WTO Trade in Value Added (TiVA) Database.

43. **Digitalization promotes growth of services trade by making some previously non-tradeable services tradable and facilitates goods trade through e-commerce.** For example, nowadays, some services can be provided via "telemigration" where firm and labor are located in two different countries. Beyond easing trade in traditional services, digitalization has given rise to a host of new services such as e-health services (see Background Paper, Section 4.C). Digitalization also may alleviate structural challenges for trade finance (see Background Paper, Section 4.B). Overall, the emergence of new technologies is expected to intensify the growth of services in global trade in the near future—a trend that is already emerging from current trade data (Figure 27). At the same time, new technologies give rise to various challenges related to regulations, privacy protection, market concentration, and the digital divide across and within countries. Section 4.1 of the Background Paper includes a discussion of similar issues with regard to the rise of digital currencies.

Figure 27. Trade in Goods and Other Commercial Services (1990=100)



Source: WTO.

[18] See Section 4.A of the Background Paper for a discussion of the implication of digital money for international trade; Section 4.B of the Background Paper focuses on the broader issue of payment systems and trade.

44. Governments will need to anticipate these changes and adjust their policy stance so as to recognize that:

- **These structural forces will create winners and losers within and across countries.** Uneven impacts by country and industry, on workers of different skill levels, and in different geographical regions will necessitate looking beyond the necessary adjustments to macroeconomic policies to prevent adverse effects on inequality. This entails investment in traditional and digital infrastructure, education and skills, and labor market policies that reduce worker dislocations, as described in Box 6.

- **Countries should take advantage of new growth opportunities.** As global factors reshuffle comparative advantages, countries can support their firms and workers to be better positioned to benefit. For example, the growing share of services relative to goods trade shifts the emphasis from tariffs (which have on average remained low) to a need to liberalize and harmonize more complex and often more restrictive behind the border regulatory barriers, data policies, taxation, and competition policies. The rising demand for environmentally friendly goods and services also offers new opportunities along the value chain.

Box 6. Trade, Worker Dislocation, and Policies to Share the Trade Gains More Widely

The impact of import competition on workers is often misunderstood. On one side, many economists and policy makers long-failed to appreciate how intensified import competition could affect workers in domestic import-competing industries, particularly when those industries are geographically concentrated, and workers find it difficult to change firms, occupations, or locations. On the other side, these effects are often misinterpreted as harming low-income households more generally; this has diverted attention from the main drivers of inequality and amplified calls to restrict trade.

The bulk of empirical evidence indicates that trade has at most a modest impact on income inequality within countries. Experience varies from country to country, but the review by Helpman (2016) concludes that trade is not a main factor behind increased inequality overall, as technology has played the key role. In the IMF, an early WEO chapter pointed to technology as the main driver of increased inequality, with financial globalization also contributing, while "trade globalization is associated with a reduction in inequality" (IMF, April 2007 WEO). A decade later, another WEO chapter (IMF, April 2017 WEO) found that technological change is a main driver of the downward trend in the labor share of income, although expansions of global value chains may also be contributing by raising the capital intensity of production.

While neglected in many studies, there is a strong pro-poor bias in lower prices and consumer choice that comes with trade. Fajgelbaum and Khandelwal (2016) find that in each of the forty advanced and middle-income countries they examine, closing off trade would disproportionately harm the poorest households. In advanced economies, trade is estimated to have reduced by two-thirds (one quarter) the cost of household consumption of a typical low-income (high-income) household. This "pro-poor" bias arises because poor consumers spend relatively more on traded products (e.g., food and beverages) and thus experience larger price drops when trade is opened.

Trade is also associated with more, better paid and better-quality jobs for women. Trade exposure in manufacturing sectors reduces the gender wage gap, since firms find it more costly to discriminate (Black and Brainerd, 2004), and because women's wages are less affected due to their relatively lower switching costs out of manufacturing (Brussevich, 2018). Moreover, exporting firms, where wages and conditions are

Box 6. Trade, Worker Dislocation, and Policies to Share the Trade Gains More Widely (continued)

generally better, are also found to employ substantially more women than non-exporting firms (WB and WTO, 2020).

At the same time, trade has left many individuals and communities behind (IMF, WB, and WTO, 2017). The downside to increased import competition has often been concentrated, harsh, and prolonged. Perhaps most dramatically, in part reflecting the impact of pro-market reforms in China, beginning about 2000 in many advanced economies the manufacturing sectors faced sharply increased import competition. (This occurred even as other sectors benefitted from reduced prices of imported inputs and from increased Chinese demand for their products.) Studies such as Autor, Dorn, and Hanson (2013) and Pierce and Schott (2016) show that the areas most exposed to competition from Chinese manufacturers (due to their industrial structures) experienced significant losses in jobs and earnings.

Unless workers are able to move and change jobs easily, these negative local effects can be stubbornly persistent, with prolonged economic and social consequences. Slow capital adjustment and labor mobility frictions can amplify the initial shock (Dix-Carneiro and Kovak, 2015). At the individual level, knock-on effects of the long-term unemployment spells include poorer health outcomes, higher mortality, and lower educational achievements by children (Pierce and Schott, 2016). The persistent socioeconomic effects can also impact the domestic political economy (Colantone and Stanig, 2018a; 2018b).

This is an avoidable outcome, as suitable domestic reforms can deliver the benefits of open trade policies and help to ensure that those benefits are widely shared. As discussed in a joint paper for the G-20 by IMF, World Bank, and WTO staff (IMF, World Bank, and WTO, 2017), declining worker mobility (across sectors, regions, and skills) has impeded adjustment and concentrated the negative effects of import competition on particular groups of workers and particular communities. Domestic policies that ease the adjustment to trade can also strengthen overall economic flexibility and performance, helping workers to move more rapidly into expanding sectors. Faced with adjustment pressures, whether from technology, trade, or other forces, improving worker mobility should be a priority.

IMF, WB, and WTO (2017) examine policy options to aid adjustment in detail. A stable macroeconomic environment and broadly open trade policies can minimize other labor market disruptions and promote new job opportunities. Adequate social safety nets and other "passive" labor market policies can give displaced workers the opportunity to pursue training and job search on their own and can also help to minimize worker anxiety over import competition. Training programs, job-search assistance, and other "active" labor market programs can facilitate rapid re-employment. By promoting worker mobility and economic flexibility more generally, complementary policies in areas such as housing, credit, and education can facilitate movement from declining sectors, regions, and specific jobs to expanding areas. Finally, although assessments of their effectiveness have been mixed, targeted, trade-specific support programs can complement broader labor market programs. Enabling targeted and place-based policies requires measuring (and anticipating) local trade exposure, the focus of recent work that extends Autor, Dorn, and Hanson (2013) by incorporating export expansion (Feenstra, Ma, and Xu, 2019) and the role of GVCs and input-output linkages (Jakubik and Stolzenburg, 2021).

Attention to these issues in IMF surveillance has been mixed. Multilateral surveillance and collaboration with other IOs should now place greater emphasis on adjustment pressures from technological change and increased import competition, including with respect to services trade. Labor market inefficiencies were often highlighted in bilateral surveillance, but only a few Article IV Staff Reports have linked this to technological changes and import competition, for example:

Box 6. Trade, Worker Dislocation, and Policies to Share the Trade Gains More Widely (concluded)

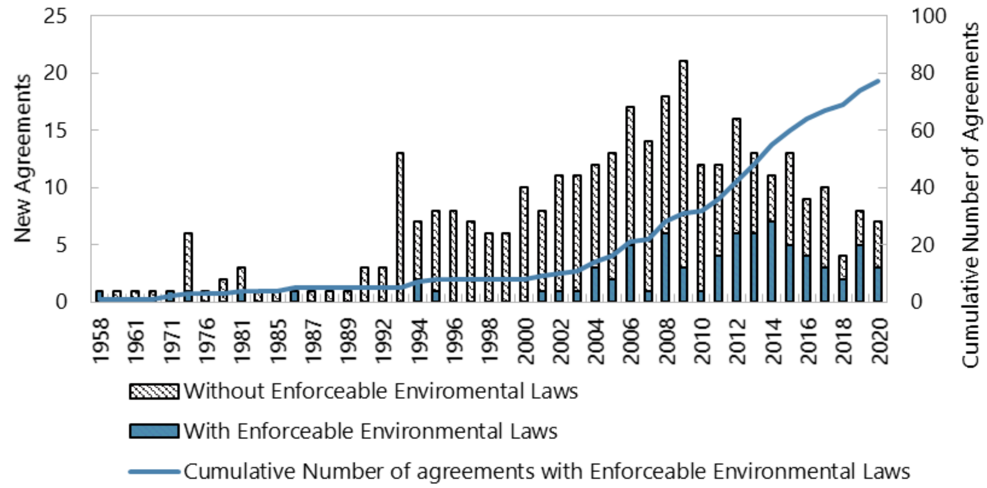
- The 2016 Report for the United States calls for negative effects of trade on workers to be mitigated through training, temporary income support, and job search assistance, including deployment of the existing trade adjustment assistance program (IMF, 2016).
- The 2017 Report for Korea calls for "flexicurity" to adapt to the demands of technological and structural change, encompassing flexible hiring and firing, active labor market policies, and unemployment insurance (IMF, 2018a).
- The 2017 Report for the UK calls for active labor market policies (ALMP) to help Brexit-affected workers to change sectors, since reductions in trade will likewise generate adjustment pressures (IMF, 2018b).
- Going forward, staff can explore ways to bring out more regularly advice on policies to help share the gains from trade and technological progress more widely, linking this into countries' wider structural reform agenda.

Challenge 2: Trade is Increasingly Intertwined with Non-Trade Areas, such as the Environment, Inequality and Inclusion, Food Security, and Public Health

45. Keeping trade open and predictable remains critical to addressing pressing global challenges from poverty to climate change and food and health security. Open trade and the rules-based trading system have been an engine of growth, particularly in EMDEs, and allowed millions of people to raise their living standard and exit poverty (see Background Paper, Section 4.C; WB and WTO, 2015). The need to follow through with the unfinished agenda of securing and further liberalizing trade, for instance in medical goods, agriculture, and environmental goods, has become increasingly evident: (i) unimpeded global supply chains were necessary to produce vaccines to tackle the COVID-19 pandemic; (ii) food imports are critical for the livelihood of many, especially in low income and fragile countries; and (iii) global value chains are indispensable in manufacturing the environmental goods necessary for the energy transition, such as solar panels, wind turbines, and batteries.

46. At the same time, trade policies are increasingly motivated by and harnessed to accomplish non-trade objectives. This trend is evidenced for instance by the proliferation of environmental and labor standard clauses in RTAs (Figure 28) and the adoption of a border carbon adjustment mechanism in the EU to complement domestic carbon pricing. These measures can address negative externalities associated with open trade, but their design poses challenges to policymakers and requires international cooperation. Moreover, recent export restrictions by some countries have been motivated by food security and national security concerns. Import restrictions also have a long history of being motivated as means of protecting workers in certain industries. Even when these concerns are legitimate, addressing them through trade measures can adversely affect other countries. In other cases, the concerns may mask protectionist intent.

Figure 28. The Number of Environmental Provisions in RTAs



Source: World Bank Deep Trade Agreements database (Mattoo, Rocha, and Ruta, 2020) based on Hofmann, Osnago, and Ruta (2017).

47. Trade policy actions in response to currency tensions have raised particularly important issues for the Fund (Box 7). The use of trade agreements to promote public reporting of foreign exchange intervention and other policy information can be constructive, although the threat of punitive trade measure to enforce such provisions could be of concern. Of most concern, however, would be the threat of punitive trade measures in response to currency undervaluation; in its bilateral surveillance, the Fund should continue to speak out against the use of trade measures to address perceived currency issues. The importance of these issues has receded in the past two years, but could rise again in the event of a widening of external imbalances or currency tensions that arise for other reasons.

Box 7. Currency Issues in Trade

Some governments have turned to trade agreements and trade measures in the hope of addressing currency disagreements, including most prominently actions by the United States during 2017–21. While pressures have ebbed since early 2021, they may intensify in the event of a widening of external imbalances. Some actions present important risks to trade, monetary policy independence, and to the Fund's surveillance over members' exchange rate policies and oversight of the international monetary system (IMS) and can complicate Fund surveillance. Other forms may be benign or even constructive.

- *Using trade agreements to promote transparency and dialogue*. This includes a 2015 Joint Declaration by the macroeconomic policy authorities of TPP countries reaffirming their obligation under the IMF Articles of Agreement to avoid manipulating exchanges rates or the IMS for certain purposes, detailing their intention to publicly report foreign exchange intervention and foreign reserves data, and to consult regularly to address macroeconomic issues. The Joint Declaration was not retained by CPTPP participants following U.S. withdrawal from the TPP. In 2018, Canada, Mexico, and the United States brought similar provisions inside the USMCA, Chapter 33, "Macroeconomic Policies and Exchange Rate Matters" and provided that compliance with transparency and data provision requirements can be challenged through formal USMCA dispute settlement. To the extent that provisions in trade agreements are limited to transparency, and especially when they are alongside (rather than a part of) the trade agreement and clearly under the control of the exchange rate authorities, these provisions can be constructive.

Box 7. Currency Issues in Trade (concluded)

- *Using countervailing duties (CVDs) to address currency misalignment*. This concerns treating undervaluation of the currency of another country as a foreign subsidy and placing additional tariffs (CVDs) on imports from that country. Many countries allow a domestic firm or industry to seek protection from subsidized imports that have injured the industry, consistent with provisions of the WTO Agreement on Subsidies and Countervailing Measures (ASCM). A 2019 domestic U.S. rule change explicitly allows the U.S. investigating authorities to consider currency undervaluation as a subsidy for these purposes and at least two investigations (concerning China and Vietnam) proceeded. The currency component of CVDs actually applied under the investigations appears to be limited.

- *Other unilateral tools*. In 2020, the U.S. Trade Representative (USTR) opened a separate investigation into Vietnam's currency valuation and currency practices under Section 301 of U.S. trade law—the first time Section 301 was used to investigate currency issues. Section 301 authorizes USTR to restrict trade when a foreign action "is unjustifiable and burdens or restricts U.S. commerce." USTR found on January 15, 2021, that "Vietnam's acts, policies, and practices with respect to currency valuation, including excessive foreign exchange market intervention … are unreasonable and burden U.S. commerce, and are thus actionable under section 301." This finding authorized USTR to restrict imports of Vietnamese products. Under the new U.S. Administration that took office on January 21, 2021, the Treasury Department reached an agreement with the State Bank of Vietnam; in July 2021, USTR indicated that "no action under the Section 301 investigation is warranted at this time because Vietnam's agreement with Treasury provides a satisfactory resolution of the matter…."

The mixing of currency and trade can raise several important issues. It has not triggered significant trade restrictions, but a renewed period of currency or trade tensions could trigger them and perhaps lead to retaliatory measures. Individual governments could use varied tools and exchange rate assessment methodologies, detracting from a core role of the Fund, politicizing assessments, and weakening the Fund's oversight of the international monetary system. Independent monetary policymakers could be pressured to adjust monetary policy to avoid having their country's exporters subject to additional trade restrictions. Moreover, although there may be legitimate issues of currency undervaluation or manipulation, punitive actions by other countries are unlikely to be a constructive way to address them. Such concerns have been expressed by the IMF Executive Board, including when concluding the 2021 Article IV consultation with the United States and in discussing the Fund's 2021 External Sector Report.

The use of CVDs or other unilateral actions can also give rise to formal WTO dispute settlement cases, in which the Fund could be requested by the WTO to participate. These could test, for example, whether currency undervaluation could be considered a "subsidy" that can be countervailed under the WTO ASCM, in which the Fund may be consulted on its exchange rate assessment.

The issues here require the Fund to exercise its full roles in exercising surveillance over members' exchange rate policies, overseeing the international monetary system, helping members to maintain economic stability, and promoting the balanced growth of international trade. Excessive external imbalances can drive currency and trade tensions, and the Fund will need to vigorously identify emerging issues and advise on policies to avoid excessive imbalances. While fact-based analysis, surveillance, and dialogue among macroeconomic policy authorities can be effective, unilateral trade actions seem more likely to prove counterproductive. With this in mind, Fund bilateral surveillance should speak out vocally against the use of trade measures to address perceived currency issues.

48. **The use of trade policy to achieve climate adaptation and mitigation goals illustrates the challenges faced by governments.** Mitigation measures to reduce emissions include carbon pricing. Concerns over carbon leakage may prompt governments to consider complementary trade

measures, such as border carbon adjustments (BCAs) (Parry and others, 2021). Subsidies on environmentally friendly products are another mitigation tool but may require trade policy cooperation to avoid distorting competition and negatively affecting trading partners. Facilitating the adoption of environmental goods and services, for example by lowering tariffs and non-tariff barriers through WTO negotiations on an Environmental Goods Agreement (EGA), would also contribute to mitigation efforts (WTO, 2022). Adaptation measures assist countries to adjust to the impacts of climate change and include diversifying toward sectors less sensitive to climate change. Section 4.D of the Background Paper includes further discussion on the interaction between trade and climate change.

49. Governments will need to cooperate to keep trade open and carefully assess the impact of their measures on economic and non-economic outcomes, at home and abroad. A careful examination of the possible costs and benefits of using trade restrictions to achieve non-trade objectives is warranted, particularly when other policy options are available. The Ministerial Declaration on the Emergency Response to Food Insecurity (WT/MIN(22)/28) issued at MC-12 was a promising step in this direction, as it stressed the need to limit export restrictions on food, and requiring emergency measures to minimize trade distortions, in particular on vulnerable countries, and be temporary, targeted, and transparent. Greater international cooperation can help to ensure that measures such as "green subsidies" are designed to effectively address climate goals without unduly distorting trade and investment as when they are accompanied by discriminatory requirements (IMF, OECD, WBG, and WTO, 2022).

Challenge 3: The Rise of Geopolitical Tensions Threatens the Multilateral Trade System

50. The increasing use of trade measures and industrial policies may destabilize the multilateral trade system. Since 2018, trade uncertainty has risen to unprecedented levels, weighing down investment and growth in affected countries (Figure 14). This uncertainty captures a growing risk of geo-economic fragmentation (GEF) driven by unilateral measures that are increasingly introduced for strategic reasons, such as national strategic objectives, security considerations, strengthening sovereignty, enhancing autonomy by reducing reliance on others, or strategic economic rivalry among nations or groups of nations. Unilateral trade measures such as export restrictions on critical raw materials or technology have negative spillover effects. Subsidies may help to address market failures, but a disorderly subsidy race (among those that can afford it) and discriminatory trade provisions would promote costly countermeasures. Fragmentation and frictions tend to reduce economic efficiency and put upward pressures on prices as they drive a wedge between demand and supply; while some countries may derive strategic advantages in selected sectors, significant economic costs are very likely incurred on aggregate (see Box 8 and Background Paper, Section 4.E).

Box 8. The Macroeconomic Consequences of Geo-Economic Fragmentation

The adverse consequences of geo-economic fragmentation (GEF) could transmit through multiple channels to the global economy. A long period of increasing global integration in the second half of the 20th century came with many benefits through multiple channels, not least for EMs and LICs. A reversal of these benefits would entail sizeable costs (Aiyar and others, 2023):

- The unraveling of **trade links** and introduction of new trade barriers would most adversely impact low-income countries and less well-off consumers in advanced economies.
- Restrictions on **cross-border migration** would deprive host economies of valuable skills while reducing remittances in migrant-sending economies.
- Reduced **capital flows** would hinder financial deepening in destination countries, especially through foreign direct investment as a source of **technological diffusion** across national borders.
- A decline in international cooperation would put at risk the provision of vital **global public goods**, such as action on climate change and pandemic preparedness.
- The **uncertainty** associated with fragmentation can itself take a toll on investment and productivity.

Recent studies provide preliminary quantification exercises of the costs of fragmentation in trade and technology. Since fragmentation is a recent phenomenon, work on estimating its costs is limited. Four recent studies model domestic and global GDP losses primarily due to trade and technology barriers under a variety of assumptions on restrictions, bloc formation, trade substitution, and countries considered:

- **IMF 2022 REO: Asia and Pacific** examines the cost of eliminating trade in the high-tech manufacturing and energy sectors across rival blocs that form according to the voting pattern on the motion to condemn Russia's invasion of Ukraine at the United Nations General Assembly (UNGA) in March 2022.
- **Bolhuis, Chen, and Kett (2023)** put a particular emphasis on the role of commodities, comparing a mild scenario of partial trade restrictions between different blocs with a more severe scenario of zero inter-bloc trade, using a new dataset of production and trade in a large number of sectors.
- **Cerdeiro and others (2021)** study the costs of three cumulative layers of fragmentation, including a trade layer, a sectoral misallocation layer, and a layer of reduced foreign knowledge diffusion under a range of fragmentation scenarios featuring loser and stricter ties of countries to specific blocs.
- **Góes and Bekkers (2022)** zoom into the effect of lower knowledge diffusion across countries on productivity and domestic output when the global economy is divided into an Eastern bloc and a Western bloc based on UNGA voting records.

Estimates from these studies vary widely depending on modeling assumptions but suggest substantial costs under most scenarios. The cost to global output from trade fragmentation could range from 0.2 percent (in a limited fragmentation/low-cost adjustment scenario) to up to 7 percent of GDP (in a severe fragmentation/high-cost adjustment scenario); adding technological decoupling could push the loss in output to 8 to 12 percent in some countries. These uncertainties aside, the papers collectively suggest:

- The costs are greater the deeper the fragmentation.
- Technological decoupling would significantly amplify losses from trade restrictions.
- Transition costs are likely to be large since it takes time and effort to reconfigure supply chains.
- EMs and LICs are likely to be most at risk when they lose access to knowledge spillovers.
- Existing estimates likely do not represent an upper bound since they abstract from additional GEF transmission channels, including through labor flows, capital flows, global public goods, and uncertainty.

51. The multilateral trading system is ill-equipped to resist these pressures. Global rules of conduct on unilateral measures could help reduce the risk of fragmentation, preventing miscalculation and tit-for-tat retaliation. However, negotiations to address emerging and long-standing sources of tensions have all but stalled at the WTO (Chapter 2.B.). Collective action is needed to revive discussions in key areas, such as subsidies disciplines. Moreover, the WTO's potential for generating transparency and predictability is hampered by severe delays in members' notifications. Finally, the WTO dispute settlement system has been reasonably successful at helping members navigate sensitive issues arising from non-trade concerns in the past such as restrictions on biotechnology (GMOs) and hormones. However, at present, without a quorum at the Appellate Body, the system is unlikely to produce durable solutions to the increasing number of disputes, including in controversial areas such as national security.

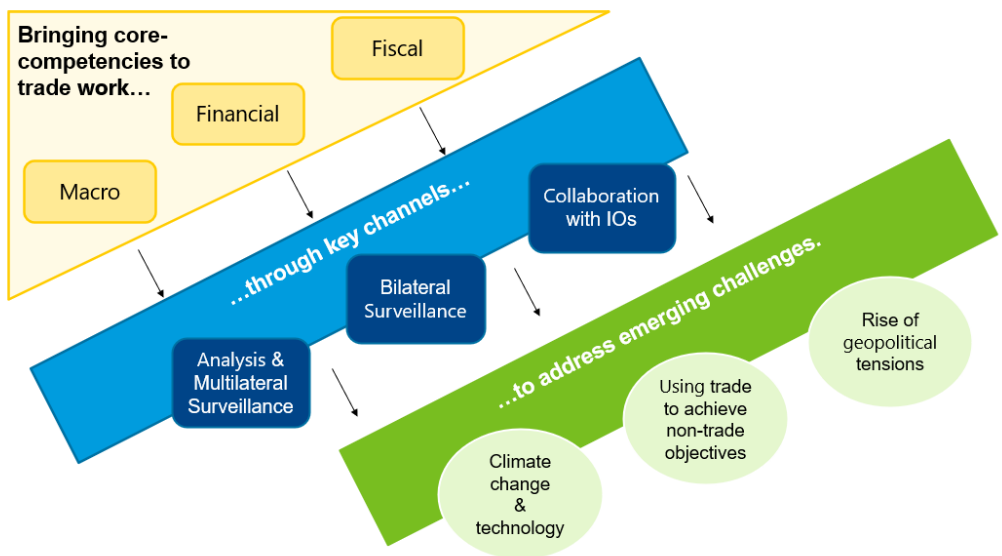
52. Governments should collectively aim to preserve an open, transparent, and stable trade system, which is crucial for the effective functioning of the global economy. Geopolitical realities suggest two important principles for policymaking. First, with respect to measures taken for national security reasons, close involvement of economic policy officials in the design and use of certain national security measures (such as investment screening) seems to play a positive role. Second, any trade restrictions should be applied judiciously and as narrowly as possible to minimize efficiency losses, while reducing the risk of tit-for-tat responses by trading partners and dampening the risk of runaway geo-economic fragmentation.

B. Reinvigorating Fund Work on Trade to Meet Current Challenges

This section outlines a Fund strategy on trade that can help governments address key trade-related challenges in coming years. Given the scale of the challenges, the proposed strategy would boost the profile of the Fund's trade work in line with its institutional mandate, while leveraging collaboration with the WTO and other international organizations.

53. A reinvigorated trade strategy should bring macroeconomic, fiscal, and financial perspectives to the challenges identified above (Figure 29). Guided by economic principles and practical experience, the Fund should continue to advocate for and support more open, stable, and transparent trade policies, whether through unilateral, regional, or multilateral means. A strong multilateral trading system is central to these goals and the Fund will bring a more active voice to major global trade policy debates, including on strengthening the WTO. The Fund should also maintain its preference for non-discrimination in trade policies and should emphasize the development impact of trade-related policies of advanced economies and of emerging market and developing economies, including low-income countries.

Figure 29. A Fund Agenda to Meet Emerging Challenges



Source: IMF staff.

54. To best meet the Fund's broad mandate on trade, the proposed strategy sets out a Fund role that aims to be both selective and effective. Across multilateral surveillance, bilateral surveillance, capacity building, and the use of fund resources (UFR), this means:

- ***Selectivity***. Fund work on trade will focus on trade topics of macroeconomic, fiscal, and financial relevance—and, in turn, bring macroeconomic, fiscal, and financial perspectives to these topics. With considerable high quality analytical and policy research outside the Fund, staff will build on and complement the work of academics, think tanks, and other international organizations wherever possible.

- ***Effectiveness***. Fund work on trade will continue to respond with agility to provide timely intellectual leadership on important global, regional, and national trade policy issues. To further bolster bilateral surveillance of trade issues, staff will invest in developing practical guidance for area department country teams and others that will, in turn, underpin timely, consistent, and evenhanded policy advice.

55. Staff see the need to scale up its internal trade policy expertise. The decline in Fund resources dedicated to work on trade since the mid-2000s is visible in the decline of trade policy coverage in Article IV discussions and staff reports, identified in Chapter 3. A lack of adequate resources in this area may effectively impede the Fund from properly fulfilling its mandate at a time when the complexity and number of trade policy measures is ramping up, and new trade challenges are emerging (Chapter 4.A). The importance of a critical mass of Fund expertise in this area was also emphasized by the IMF Independent Evaluation Office in 2009 (IEO, 2009) and the 2015 Trade Review (IMF, 2015).

56. This scale up will be achieved through reprioritization within the existing budget envelope, focusing on providing analytical trade tools to country teams and strengthening the network of trade expertise within the Fund. The scale up of the Fund's trade expertise will be attained primarily by increasing the number of staff devoted to trade in the Strategy, Policy, and Review Department, achieved via internal reprioritization. The expanded trade team within SPR will enhance support of the country teams by providing the needed tools such as trade policy databases, studies on key trade issues, and notes on policy advice. This will help country teams to provide quality and evenhanded advice when trade policy is a relevant issue. Since the trade work is decentralized across Fund departments, staff will also strengthen the internal mechanisms for channeling tools to country teams and, more broadly, exchanging information on trade with area and other functional departments.

57. A failure to act could carry important enterprise risks for the Fund. The Fund could be seen as losing agility and not delivering on its mandate if it does not respond to key emerging challenges relevant to today's global economy and its membership across all income levels. Not tackling the identified gaps in the coverage of trade policy issues could also raise concerns about the lack of evenhandedness in Fund advice. At the same time, staff recognize that the proposed trade strategy could risk over-reach and duplication with the work of other IOs. This risk, however, can be effectively mitigated by collaborating with other IOs, most notably the WTO, as discussed below.

58. Fund work on trade should continue to be carried out through three main channels: (i) multilateral surveillance, analysis, and advocacy; (ii) bilateral surveillance; (iii) and trade-related collaboration with other international organizations**.**

- ***Analysis and multilateral surveillance*** will continue identifying major trade-related developments and risks and provide intellectual leadership and the analytical underpinnings for Fund policy positions. These efforts should give particular attention to macroeconomic, fiscal, and financial perspectives of key trade issues. For example, the Fund can contribute data and analysis on fiscal and quasi-fiscal subsidies that would also be useful in informing the important global debate over the trade implications and the design of subsidies to meet legitimate domestic policy goals with minimal impacts on trading partners. Scaled-up *advocacy* will inject Fund analysis and policy positions into global and regional policy debates. This would often concern the WTO and related global policy debates, but it would also extend to major regional issues.

- The Fund should also redouble efforts to **translate analysis and multilateral surveillance into *bilateral surveillance*** in light of the increasing use of trade measures and new industrial policies (Chapter 2.B). This will involve enhancing support for area department country teams, so that the depth of coverage of trade policy issues is determined primarily by Fund-wide surveillance criteria rather than by constraints on in-house trade policy expertise. Examples of enhanced support could include developing practical trade policy guidance in selected areas, with additional tools; developing databases that could be easily accessed by country teams to obtain relevant information, such as on trade policy developments; and, where needed, assistance for country teams to support trade policy discussions with national authorities. Where regional initiatives are an important driver of reforms at the national level, such as under the African Continental Free Trade Agreement (AfCFTA), the Fund can help national authorities to adjust their macroeconomic, fiscal, and financial frameworks to get the best results from their implementation of the regional initiative.

- ***Trade-related collaboration*** will blend the Fund's core responsibilities on macroeconomic, fiscal, and financial issues with the specific competencies of other IOs and bring these to bear on policy issues that cut across the responsibilities of multiple IOs, including by following through on the built-in agenda presented in the recent paper on subsidies. While respecting institutional mandates, staff will also increase advocacy for the WTO and support the G-20's call for WTO reform, including by exercising the Fund's role as a WTO observer organization to build a more vocal and regular presence in WTO discussions (for further discussion of IMF–WTO cooperation see Background Paper, Section 1). Through its collaboration with other IOs, the Fund can also support improved data and information for trade policy analysis. In critical areas, such as on the risks of geo-economic fragmentation, the Fund could partner with the WTO to create a multilateral platform for sharing information on cross-border restrictions motivated by strategic considerations and their rationale, providing analysis of cross-border spillovers, and supporting deliberations among key players on ways to address them.[19] Staff will also work to improve cooperation and coherence in regard to individual countries, including in areas like surveillance, trade policy monitoring, and WTO accessions.

[19] In some cases, strategic trade policies may be introduced for national or international security reasons. In the case of security motivated policies, the Fund work would be limited to economic considerations and would avoid discussion of the political or military considerations leading to the measures. The Fund had previously acknowledged in other policy areas (in particular with respect to exchange restrictions over which the Fund has a unique mandate), that the Fund does not provide a suitable forum for discussion of the political and military considerations leading to policy actions. A similar approach was recently endorsed by the Executive Board for capital flow management measures (CFM). It was agreed, with respect to CFMs, that while the macroeconomic implications of security-based measures that are CFMs will be discussed in Article IV consultation reports in line with the Integrated Surveillance Decision where macro-critical or if they generate significant outward spillovers, their appropriateness under the Institutional View will not be assessed, and staff will not advise on their removal or recommend alternative policies. The Fund's engagement on strategic trade policies introduced for security reasons will, similarly, avoid discussion of the political or military considerations that underlie these policies and will focus solely on analysis of the economic impacts and spillovers. The Fund will not recommend alternative policies or opine on the effectiveness of the trade measures to achieve the underlying security objectives.

Box 9. Cooperation with the WTO and Other International Organizations (IOs)

Robust cooperation with other IOs is central to fulfilling the Fund's mandates to facilitate expanding trade and conduct effective surveillance. In the past few years, staff have stepped up certain aspects of cooperation, with positive results: high-profile joint policy papers have visibly contributed to the global policy debates, and cooperation around WTO accessions has been very constructive. Yet an earlier broad decline in the Fund's trade work "came at the cost of constructive roles in trade issues central to financial and systemic stability" and the "relationship with the WTO… declined substantially from the mid-2000s" (IEO, 2019). The 2019 IEO report also identified "a generalized concern at the WTO that the Fund's overall interaction with the institution has decreased, notwithstanding the recent period of intensified cooperation and despite the greater role of trade in the global economy and increased linkages between trade and other policies".

Into the 2000s, the IMF engaged very actively in the GATT and (later) the WTO to voice a macroeconomic perspective in global trade debates, to advocate for open trade, and to promote coherence in the policies of the two institutions vis-à-vis their common members. Before modern communications technologies, the IMF Geneva Office, with several professional staff, represented Fund views and perspectives in formal meetings of WTO members (as an "official observer"), in frequent informal meetings with Geneva-based ambassadors and other national delegates, and with the ILO and other Geneva-based IOs. This was supported by dedicated trade staff in IMF headquarters (with broader trade functions) and by engagement of Washington-based senior staff and Management, particularly during periods of WTO negotiations. Staff regularly prepared Executive Board papers on WTO developments and sought guidance on Fund positions; through this channel, staff also encouraged finance ministries to bring a macroeconomic perspective to their own government's trade policy positions.

Reduced cooperation broadly followed contraction in other IMF trade work. Fund trade positions did not exceed 1 percent of total staff in the early 2000s and are around 0.1 percent today. This trend may have reflected the major trade reforms in the late 1980s and 1990s, and a belief that the WTO and a "built-in" negotiating agenda would deliver new agreements to exploit new opportunities and address new challenges as trade and the global economy evolved. Some believed that the WTO would play a trade policy role like that of the Fund in international finance. In fact, however, WTO members designed the institution with active monitoring and transparency functions but, unlike the IMF surveillance function, with no mandate to provide policy advice. WTO staff and management have a limited ability to initiate proposals and work with members to develop support for them.

The Fund's re-engagement in certain areas has been enthusiastically welcomed, but the previous level of overall WTO engagement has been missed, particularly as trade tensions mounted and the multilateral trading system came under threat. The creation of the WTO has not eliminated the need for an IMF role in trade policy; according to IEO (2009), "without a strong IMF presence on [systemic] issues, the global debate misses a critical player." Several senior trade diplomats expressed similar sentiment to IMF staff during recent visits to the WTO.

Recent improvements in some areas of joint work, strong personal relationships, and the formal structure under the IMF–WTO Cooperation Agreement provide the foundation to further strengthen cooperation.

- With the April 2022 joint paper (with OECD, WB, and WTO) on *Subsidies, Trade, and International Cooperation* staff have continued the new tradition of joint work on major issues in global trade, to communicate a joint view on issues that cut across the competences of several IOs. The paper followed a joint paper (with the WB and WTO) for discussion by G-20 Sherpas in 2017, *Making Trade an Engine of Growth for All: The Case for Trade and for Policies to Facilitate Adjustment*, and *Reinvigorating Trade and Inclusive Growth*, for discussion at the IMF/World Bank 2018 Annual Meetings. Heads of institutions jointly launched these reports.

Box 9. Cooperation with the WTO and Other International Organizations (IOs) (concluded)

- IMF and WTO staffs have worked closely together to enhance the role of IMF country teams in facilitating the country's WTO accession. This included a joint IMF, WB, and WTO conference at the 2019 Annual Meetings, chaired by the WTO Deputy Director-General, and intensified information sharing and staff collaboration.
- IMF staff have worked effectively with staffs of other IOs on urgent international priorities, including recent initiatives on vaccines and food security.
- As needed, Fund and WTO staff work to ensure that Fund policy advice is consistent with WTO rules.
- Staff are again making occasional presentations to WTO members, a practice that had fallen off sharply.
- Annual joint trade research conferences (with WB and WTO) build awareness of ongoing analytical work.

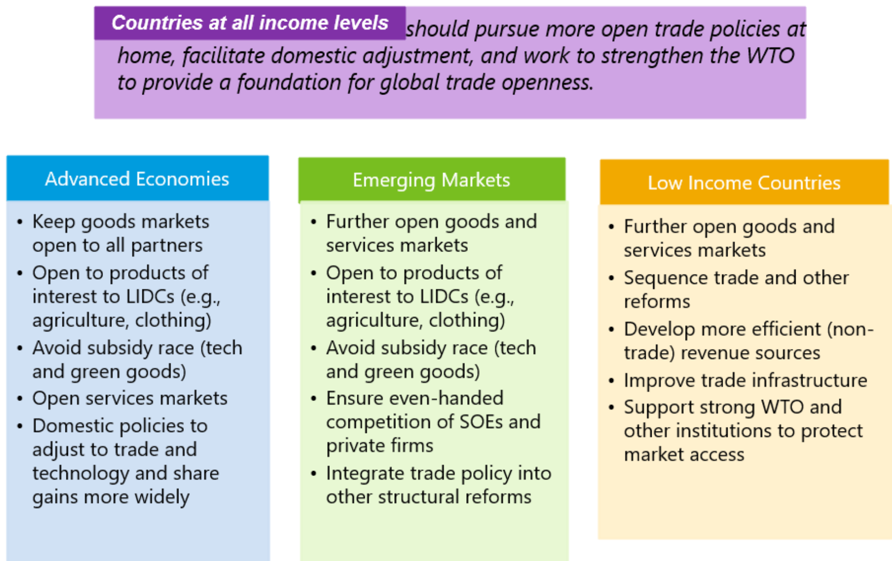
59. These channels will continue to be supported by:

- ***Use of Fund resources***. Fund arrangements include continuous performance criteria that call for members to avoid imposing or intensifying import restrictions for balance of payments reasons. Close operational collaboration with WTO staff and the WTO Balance of Payments Committee, as envisioned in the IMF–WTO Cooperation Agreement, will continue to ensure policy coherence. While trade policy conditionality would remain limited, staff will pay increased attention to avoiding or correcting tariff increases and other trade policy reversals that frustrate balance of payments adjustment and create policy uncertainty.

- ***Capacity building***. Fund capacity development related to trade has been focused on customs administration, complementing the assistance by other international organizations on trade facilitation and implementation of the WTO Trade Facilitation Agreement (TFA) (see Background Paper, Section 2). Capacity development in this area is critical and will continue to focus on helping customs authorities to improve compliance with the domestic law and import / export regulations. In this context, future work will place greater emphasis on digital transformations of customs operations. In addition, the IMF Legal Department will continue to provide assistance in tax law design and drafting in trade and trade-related areas like corporate income tax (e.g., cross-border incentives), and excise, trade, and value-added taxation.

60. Trade priorities will reflect the level of development, tailored to country circumstances (Figure 30). Regardless of their development level, it is important for the economic growth and stability of all countries that trade takes place under an open, stable, and transparent rules-based trading system, including mechanisms for the prompt and effective resolution of trade-related disputes so as to promote policy certainty. Fund policy advice will regularly remind members of the practical importance of their constructive engagement in the WTO and abiding by their WTO obligations.

Figure 30. Trade Priorities and Level of Development



Source: IMF staff.

- ***For advanced economies***, a key priority is to reduce the risks of trade fragmentation by avoiding new trade and investment restrictions and other discriminatory policies wherever feasible—these actions can create damaging policy uncertainty and destabilize the rules-based international trading system. In particular, authorities should strike a careful balance between efficiency and national security considerations, including in the context of new industrial policies. The Fund will continue to raise these important issues with national authorities and in public, with an exclusive focus on the economic considerations and without discussing or assessing the political or military considerations leading to such measures. Other priorities include to further reduce barriers to imports of agriculture, textiles and clothing, and other goods and services of export interest to developing economies; and to reduce barriers to digitally enabled and other services trade. Many advanced economies also need improved policies to facilitate adjustment to, and better share the benefits from, technological changes and increased import competition. This can include passive and active labor market policies as well as investments in trade-related infrastructure.

- ***Many emerging markets*** would benefit greatly from further traditional liberalization of goods and services markets and completing the move away from import-substitution policies. Trade policy should be better integrated into the Fund work on structural reforms, which is especially relevant for emerging markets stuck in the so-called middle-income trap. Where state-owned enterprises (SOEs) are important in international trade, for example, Fund policy advice should help governments to ensure that these operate on a commercial basis that promotes even-handed competition with private foreign and domestic firms. This is especially important as the increasing role in international trade of SOEs that receive significant public support risks distorting trade and investment patterns and stoking trade tensions.

- ***Low-income countries*** can least afford the distortions and costs that result from restrictive trade and investment policies, but for them it is especially important to complement this openness by improved trade facilitation (e.g., trade infrastructure and economic institutions), and increased access to regional and global markets. The Fund can help by building and maintaining macroeconomic stability, supporting key successful structural reforms, taking into account a country's implementation capacity, and with related technical assistance, such as promoting more efficient domestic revenue sources and further reducing reliance on trade taxes. The Fund can also advise on the pace of reforms and their sequencing with other aspects of the overall reform packages. The Fund's advocacy for a strong, rules-based trading system is especially important for LICs, whose export development prospects depend on an open, stable, and transparent global trading environment.

61. Staff see several ways how Fund work on trade could address critical trade challenges in the next several years, often by working across multiple channels (Table 1). Action to build trade openness and resist trade fragmentation, for example, would cut across multilateral surveillance and advocacy, bilateral surveillance, and inter-institutional cooperation. Another aspect would highlight the domestic economic effects and international spillovers from export restrictions and other critical industrial policy and national security measures to better inform the unintended consequences of many such measures. This, too, cuts across the competencies and mandates of various international organizations where carefully defined cooperation to address gaps, avoid duplication, and promote policy coherence and analytically based dialogue among national governments could help to develop more common perspectives on the appropriate use and design of such measures.

ISSUES FOR DISCUSSION

- In Directors' view, what key factors will shape global trade policy in the coming years?

- Do Directors agree with the three key challenges identified by staff: (i) structural forces reshaping trade; (ii) interplay between trade and non-trade objectives; (iii) and risks and spillovers from geo-economic fragmentation?

- Do Directors support the main elements of the staff's reinvigorated trade agenda? Does the proposed strategy address the identified challenges, and does the strategy meet the specific needs of Fund members across regions and stages of development?

Table 1. Examples of Priorities in a Proposed IMF Trade Strategy

	Multilateral surveillance, analysis, and advocacy	**Bilateral surveillance**	**Collaboration with WTO & other IOs**
Structural forces Examples: digitalization, new technologies, services, climate change	• Assess impact of structural forces (e.g., digitalization; climate change) on trade, and identify broad policy lessons; • Assess benefits and risks (e.g., on labor markets) of greater services trade.	• Promote greater services openness; • Provide tailored advice on domestic policies to help share the gains from trade and technology more widely.	• Joint policy advocacy on open services trade; • Improve data on services trade and policy.
Non-trade objectives Examples: climate, labor adjustment, food security, health	• Develop policy positions on key trade-related issues (e.g., border carbon adjustments); • Highlight economic costs of food trade restrictions, and the impact of other trade policies with non-trade objectives; • Explore effects of trade policies on non-trade outcomes.	• Provide tailored policy advice on trade-related climate issues (e.g., tax design) • Provide tailored policy advice on alternative paths to food security • Highlight impact of other trade policies motivated by non-trade objectives; consider policy alternatives.	• Promote dialogue and policy coherence on use of trade measures for non-trade objectives; • Support development of best practices around use of trade measures for non-trade objectives.
Risks and spillovers from fragmentation; building openness Examples: subsidies, new industrial policies, national security measures	• Highlight broad effects of restrictive trade regimes and trade fragmentation, including on development; • Assess cross-border spillovers from subsidies and other policies; assess cooperative solutions when appropriate.	• Actively promote open, stable, and transparent trade policies; • Provide policy advice on key new industrial policies; explore alternative designs; • Note the macroeconomic effects of trade-related national security measures.	• Monitoring, analysis, and advocacy in key areas; • Seek coherence of policy advice across institutions, exploit synergies; • Build dialogue on economic spillovers from trade policies; • Improve data, analysis, and dialogue on the use of subsidies.

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INTERNATIONAL MONETARY FUND

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REVIEW OF THE ROLE OF TRADE IN THE WORK OF THE FUND—BACKGROUND PAPER

This Background Paper provides technical information and in-depth analysis of several key trade issues to accompany the main paper, Review of the Role of Trade in the Work of the Fund. This material covers the following issues:

- Legal aspects of the Fund's involvement in trade matters;
- The Fund's role in providing capacity development on customs administration;
- The methodology used in the Review of the Role of Trade in the Work of the Fund;
- Digital currencies and the implications for international trade;
- Payments and trade finance;
- Trade and growth;
- Trade, environment, and climate; and
- Globalization and inflation.

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CONTENTS

TABLE

LEGAL ASPECTS OF THE FUND'S INVOLVEMENT IN TRADE MATTERS[1]

This section provides an overview of the legal basis for the Fund's involvement in trade matters. From the Fund's inception, trade matters have played an important role in all of the Fund's three main areas of activities—surveillance, use of Fund resources, and technical assistance. The Fund has a broad scope to undertake work on trade matters in the context of such activities. The question is often not whether the Fund has the legal authority to engage in trade matters, but whether and how it should engage, taking into account its core areas of expertise, resource implications and the role of other international organizations. This section also describes the framework of cooperation between the WTO and the Fund.

A. Background

1. The Fund has focused on trade issues either directly as part of its core macroeconomic agenda or because trade policy influenced the environment for that agenda. In this regard, the Fund's work on trade aims to facilitate the expansion and balanced growth of international trade thus promoting economic stability and growth at national and global level. Regarding economic stability, trade regimes that are distortionary or allow excessive discretion to create a poor environment for economic performance, external viability, aid effectiveness and good governance. Trade policy reforms can be a crucial ingredient of growth strategies and can be instrumental for the success of reforms in other areas—such as locking in regulatory reforms through external commitments, strengthening market disciplines on enterprises and banks or reducing the scope for corruption. Further, trade policies and the global trade policy environment can give rise to balance of payments effects. Other links between trade and the macroeconomic framework include the effect of trade policies on government revenue and on financial sector stability.

B. Fund's Purposes and Powers

2. The Fund's Articles of Agreement provide in broad terms its mandates related to international trade. Article I (ii) provides as a purpose of the Fund: "To facilitate the expansion and balanced growth of international trade, and to contribute thereby to the promotion and maintenance of high levels of employment and real income and to the development of the productive resources of all members as primary objectives of economic policy." Unlike the purposes dealing with exchange rate issues and use of Fund resources, it provides no specification regarding the nature of the role that the Fund should play in facilitating the expansion and balanced growth of international trade. In order to achieve its purposes, the Fund has been granted certain powers under the Articles. While not specifically spelled out in the Articles, the Fund's legal authority to work on trade matters in the context of surveillance, use of Fund resources and technical assistance stems, respectively, from Article IV, Article V, Section 3, and Article V, Section 2(b). Article I (iv) also

[1] Prepared by the Legal Department.

refers to trade: "To assist in the establishment of a multilateral system of payments in respect of current transactions between members and in the elimination of foreign exchange restrictions which hamper the growth of world trade." The Fund assists in the elimination of exchange restrictions by exercising its jurisdiction under Article VIII, Section 2(a) and 3.

C. Surveillance

3. Article IV is the basis for the Fund's surveillance mandate, which is further elaborated in the Integrated Surveillance Decision (ISD). The Fund's surveillance consists of both bilateral and multilateral surveillance, and the standard for coverage of policies under each differs.

4. The ISD provides: "In its bilateral surveillance, the Fund will focus on those policies of members that can significantly influence present or prospective balance of payments and domestic stability."[2] In this regard, exchange rate, monetary, fiscal and financial sector polices will always be the subject of the Fund's bilateral surveillance, and other policies will be examined "only to the extent that they significantly influence present or prospective balance of payments or domestic stability."[3] Accordingly, whether to include a discussion on trade policy as part of bilateral surveillance in a particular Article IV consultation requires a judgment as to whether a specific trade measure falls under one of the named policies (e.g., fiscal) or otherwise "significantly" influences balance of payments or domestic stability. The Guidance Note for Surveillance Under Article IV Consultations provides guidance on when trade policy would typically be covered.[4]

5. In this context, surveillance may examine how domestic policies may promote growth within the context of the promotion of domestic stability.[5] The obligation of members under Article IV, Section 1(i) is to endeavor to promote orderly economic growth, and not economic growth per se. As performance relative to capacity is always a key ingredient of domestic stability and crucial for balance of payments stability, the ISD requires the Fund to always examine whether domestic policies are directed toward keeping the member's economy operating broadly at capacity; and in assessing whether members fulfill their obligation to seek to promote orderly economic growth, the Fund should pay due regard to members' circumstances. It is for this reason that the decision requires the Fund to examine whether domestic policies are directed toward fostering a high rate of potential growth only in those cases where such high potential growth significantly influences prospects for domestic and, thereby, balance of payments stability. Therefore, to the extent that growth significantly influences prospects for domestic and balance of

[2] Decision on Bilateral and Multilateral Surveillance, Decision No. 15203-(12/72), adopted July 18, 2012, paragraph 6.

[3] Decision on Bilateral and Multilateral Surveillance, Decision No. 15203-(12/72), adopted July 18, 2012, paragraph 6.

[4] Guidance Note for Surveillance Under Article IV Consultations, SM/22/121, June 2, 2022, paragraphs 94−96.

[5] For discussion on growth, see Jobs and Growth – Analytical and Operational Considerations for the Fund, SM/13/73, March 15, 2013, Annex 7—The Legal Framework for the Jobs and Growth Agenda in the Fund.

payments stability and trade issues are important for such growth, such trade issues should be discussed in the context of bilateral surveillance.

6. **Domestic trade laws or trade agreements sometimes have provisions that cross into other areas of Fund surveillance, such as exchange rate policies**. For example, some trade instruments allow for one member to designate another as a "currency manipulator."[6] This language echoes that used in Article IV, which obligates members to "avoid manipulating exchange rates or the international monetary system in order to prevent effective balance of payments adjustment or to gain an unfair competitive advantage over other members."[7] As part of bilateral surveillance, the Fund oversees the compliance of each member with its obligations under Article IV; the Fund's assessment is independent and entirely distinct from any assessments that may be made under other instruments by individual members. The Fund's assessment is guided by the ISD, which lays out the specific circumstances under which the Fund will consider a member to be acting inconsistently with Article IV.[8]

7. **The Fund also conducts multilateral surveillance, which focuses on issues that may affect the effective operation of the international monetary system.** There are different vehicles for multilateral surveillance, including flagship publications such as the World Economic Outlook and the Global Financial Stability Report, as well as Article IV consultations with individual members. Multilateral surveillance focuses on (a) global economic and financial developments and the outlook for the global economy, including risks to global economic and financial stability, and (b) the spillovers arising from policies of individual members that may significantly influence the effective operation of the international monetary system, for example, by undermining global economic and financial stability.[9] Thus, trade policies and developments could be covered in the context of assessing global economic developments as in (a) above and/or in the context of assessing spillovers as in (b) above.[10] The former type of coverage is generally reserved for the flagship publications, while the latter may be in the flagships or individual Article IV consultations. Whether to cover trade policies and developments in the Fund's multilateral surveillance requires the exercise of judgment.

8. **Even if important issues respecting trade fall outside the scope of mandatory coverage under bilateral or multilateral surveillance, it is legally possible to discuss them in an Article IV consultation with the agreement of the relevant member.** While the surveillance framework defines the scope of issues that members are required to discuss with the Fund under Article IV, it is

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[6] The Fund has discouraged the entanglement of exchange rate and trade policies..

[7] Articles of Agreement, Article IV, Section 1(iii).

[8] Decision on Bilateral and Multilateral Surveillance, Decision No. 15203-(12/72), adopted July 18, 2012, Annex paragraph 2(a).

[9] Decision on Bilateral and Multilateral Surveillance, Decision No. 15203-(12/72), adopted July 18, 2012, paragraph 12.

[10] Such spillovers may be from policies implemented by countries that are systemically important or by countries that suffer from large vulnerabilities, which could trigger a systemic crisis in certain broader circumstances, either directly through trade and financial linkages with other countries or indirectly through market contagion.

also possible for members to voluntarily agree to discuss other issues. The Fund's policy advice on these issues would be technical assistance under Article V, Section 2(b) and not surveillance, but could be included in the member's Article IV consultation.

D. Use of Fund Resources

9. Article V, Section 3 authorizes the Fund to use its general resources to assist members to solve their balance of payments problems in a manner that establishes adequate safeguards for the temporary use of those resources. As discussed above, trade policies can have a balance of payments impact. Accordingly, Fund-supported programs have encompassed trade measures designed to resolve balance of payments problems. The criteria for whether to establish trade related conditionality are the same as those that apply to any conditionality. In this regard, the Conditionality Guidelines require measures to be established as conditionality where, in particular, they are of critical importance for achieving the goals of the program, provided that such measures must be reasonably within the direct or indirect control of the member.

10. In addition, the Fund has adopted a policy to include in Fund arrangements a standard continuous performance criterion on not imposing import restrictions for balance of payments reasons. A key purpose of Fund financing is to provide members with means to facilitate balance of payments adjustment "without resorting to measures destructive of national or international prosperity" (Articles of Agreement, Article 1(v)), such as imposing trade restrictions. Reflecting this purpose, Fund arrangements include a standard performance criterion that the member will not impose or intensify import restrictions for balance of payments purposes. The underlying rationale is that the Fund has judged that the imposition of import restrictions to resolve balance of payments problems is more likely to aggravate economic maladjustments than to correct them, thus increasing the likelihood that the use of Fund resources will not be temporary. Examples of import restrictions include the impositions of import prohibitions, the imposition of quotas, import license requirements, import surcharges and advance import duties.

E. Technical Assistance

11. Pursuant to Article V, Section 2(b), upon request, the Fund may provide technical assistance, so long as such assistance is consistent with the purposes of the Fund. Accordingly, technical assistance on trade issues can be provided so long as it is consistent with the purposes of the Fund and, in particular, with Article I (ii).[11] It should be noted that technical assistance may provide more flexibility to engage relative to engagement under surveillance or use of Fund resources which are subject to more limited criteria as discussed above.

[11] Examples of such technical assistance include work in the areas of tariff policy reform and modernization of customs administration, and policy advice in the context of surveillance.

F. Cooperation with the World Trade Organization

12. Article X of the Articles of Agreement enables the Fund to cooperate with international organizations having specialized responsibilities in related fields and accordingly the Fund cooperates with the World Trade Organization (WTO) on trade matters. The Fund and WTO both seek to foster international trade, with the WTO focusing on a rule-based approach to liberalization and transparency, while the Fund focuses on the overall policy framework.[12] This section discusses the Fund's cooperation with the WTO in three key contexts: (i) cooperation on balance of payments consultations; (ii) cooperation on matters of mutual interest; and (iii) cooperation relating to the WTO dispute resolution process. Cooperation is important to avoid imposing conflicting requirements upon a common membership,[13] with the Agreement between the International Monetary Fund and the World Trade Organization (the "Cooperation Agreement") having been entered into in order to regulate the constructive cooperation between the two institutions and foster greater coherence in global economic policymaking.[14]

Cooperation on Balance of Payments Consultations

13. The Fund participates in the consultations carried out by the WTO Committee on Balance of Payments Restrictions (the "WTO BOP Committee") when a WTO member applies restrictions on trade in goods and/or services to safeguard its balance of payments. Following the notification by a WTO member to the WTO of the application of import restrictions to safeguard its balance of payments,[15] the WTO BOP Committee consults with the member to determine whether the WTO may approve the restrictions. The WTO may allow a member to impose import restrictions in prescribed circumstances.[16] Consistent with the General Agreement on Tariffs and Trade (GATT) Article XV, upon the initiation of a WTO BOP consultation, the WTO requests the Fund to provide an assessment of the member's statistics and macroeconomic situation. The Fund's assessment takes the form of a formal statement approved by the Fund Executive Board, normally

[12] See generally "Review of Fund Work on Trade", SM/05/47, 2/7/2005.

[13] This could arise, for example, where overlapping jurisdiction exists on certain policy measures (e.g., that have both exchange and trade attributes), or when certain provisions in the WTO Agreements specifically cover international current payments and transactions, which are also the subject of Article VIII, Section 2(a) of the Fund's Articles.

[14] Relations with World Trade Organization (WTO) - Fund-WTO Cooperation Agreement, Decision No. 11381−(96/105), adopted on November 25, 1996. See also Guidelines/Framework for Fund Staff Collaboration with the New World Trade Organization, Decision No. 10968−(95/43), April 21, 1995.

[15] In the case of trade in goods, such import restrictions can be taken in accordance with GATT Article XII, or, in the case of developing countries, under GATT Article XVIII(b). For trade in services, import restrictions for BOP purposes may be taken under GATS Article XII.

[16] The WTO may allow a member to impose import restrictions that shall not exceed those necessary to "forestall the imminent threat of, or to stop, a serious decline in its monetary reserves" or, in the case of a member with "very low" reserves, "to achieve a reasonable rate of increase in its reserves", GATT Article XII:2. In the case of developing country WTO members, import restrictions shall not exceed those necessary to "forestall the threat of, or to stop, a serious decline in its monetary reserves" or, in the case of a member with "inadequate" reserves, "to achieve a reasonable rate of increase in its reserves." GATT Article XVIII:9. For import restrictions in trade in services, see GATS Article XII:1.

on a lapse-of-time basis.[17] In reaching its decision as to whether the trade restrictions are justified on balance of payments grounds, the WTO BOP Committee must accept the Fund's findings of statistical and other facts relating to foreign exchange, monetary reserves, and balance of payments, and its determination as to the seriousness of the member's international reserve situation.[18]

Cooperation on Matters of Mutual Interest

14. The Cooperation Agreement (paragraph 8) allows the Fund and the WTO to communicate their respective views in writing on matters of mutual interest to the other organization or any of its organs or bodies (excluding the WTO's dispute settlement panels).[19] While these communications may cover all matters, in practice, they are expected to be used only for purposes of communicating views on important matters of policy and/or jurisdiction. The views communicated are pre-approved by the appropriate institutional body and included in the official record of the relevant body or organ but are not binding on the other party.[20]

15. The Cooperation Agreement also provides for general cooperation (paragraph 9) and specific reciprocal cooperation between the Fund and WTO staff (paragraph 10). The specific reciprocal cooperation requires the Fund's staff and the WTO Secretariat to consult with each other about matters that one organization is discussing with a common member that could raise issues of possible inconsistencies regarding that member's obligations under the charter of the other organization. These consultations take place on an informal basis, and the feedback provided during those informal consultations does not constitute an authoritative or binding statement of the views of each organization.[21]

Fund Involvement in the WTO Dispute Settlement Process

16. Various provisions in the WTO Agreements and the Fund's Articles require the WTO and the Fund to work together to address overlapping jurisdictions on trade and exchange matters and to avoid imposing conflicting obligations upon a common membership. The GATT provides that the WTO shall consult the Fund on specified matters concerning the Fund's jurisdiction, as well as on assessments of balance of payments, and requires the WTO to accept the Fund's determination in these areas.[22] The GATT also sets out the role of the Fund with respect to

[17] The Fund's assessment covers the following: the member's macroeconomic situation; the Fund's findings of statistical and other facts relating to foreign exchange; monetary reserves and BOP; and its determination as to the seriousness of the member's international reserve situation.

[18] See GATT Article XV and Guidelines/Framework for Fund Staff Collaboration with the New World Trade Organization, Decision No. 10968-(95/43), adopted on April 21, 1995.

[19] Fund/WTO Agreement−Commentary, EBD/96/85, July 5, 1996, p. 7.

[20] Fund/WTO Agreement−Commentary, EBD/96/85, July 5, 1996, p. 8.

[21] Examples of general cooperation include visits by senior Fund staff to the WTO, and vice versa, to make presentations and attend discussions on issues of common interest. Examples of specific cooperation include staff consultations on individual country measures (e.g., tax subsidy measures) arising from country specific discussions which raise inconsistency questions under WTO rules.

[22] See, e.g., WTO charter, Article III.5; GATT Articles XV, XII, and XVIII; and GATS Articles XI, XII, XXVI.

exchange matters vis-à-vis the WTO,[23] the effect of which ensures that the exercise by a common WTO/Fund member of its rights under the Articles of Agreement to impose or maintain exchange controls or exchange restrictions will be automatically consistent with the member's obligations under the GATT. Further, if a restriction under the General Agreement on Trade in Services (GATS) involves an exchange measure, for instance, the GATS' balance-of-payments safeguard requires that the measures imposed thereunder be consistent with the Fund's Articles.[24]

17. The Cooperation Agreement (paragraph 8) sets out the requirement for the Fund to inform a WTO body including a WTO dispute settlement panel considering exchange measures within the Fund's jurisdiction whether such measures are consistent with the Fund's Articles. This can arise whenever a WTO proceeding is considering the application of the provisions of the WTO Agreements (e.g., GATT Article XV and GATS Article XI), however, the scope of this communication is limited to jurisdictional matters and would not include views on policy matters.[25] Any such communications have an official status in the proceedings, which could mean that they will be recorded, for instance, in the reports of the panels to the Dispute Settlement Body.[26] In this regard, consistent with WTO Agreements and the Cooperation Agreement, the Fund could become involved in a WTO dispute settlement proceeding. The Fund has previously engaged in WTO dispute settlement proceedings on two occasions on issues concerning the Fund's role in the BOP consultations and on the consistency of an exchange measure.[27] [28]

[23] Under GATT Article XV:2, the parties must "accept all findings of statistical and other facts presented by the Fund relating to foreign exchange… and *shall accept the determination of the Fund* as to whether action by a contracting party in exchange matters is in accordance with the Articles of Agreement of the International Monetary Fund". GATT Article XV:9 also states that "Nothing in this Agreement shall preclude: (a) the use by a contracting party of exchange controls or exchange restrictions in accordance with the Articles of Agreement of the International Monetary Fund".

[24] GATS Article XII:2(b).

[25] Fund/WTO Agreement – Commentary, EBD/96/85, July 5, 1996, p. 8.

[26] Fund/WTO Agreement – Commentary, EBD/96/85, July 5, 1996, p. 8.

[27] In 1997, a WTO dispute panel was established to adjudicate the complaint of the United States against India's quantitative import restrictions. The Chairman of the WTO panel wrote to the Fund's Managing Director requesting that the Fund respond to a list of questions on India's reserves and balance of payments. The request was made under Article 13 of the WTO Dispute Settlement Understanding and GATT Article XV:2. The Fund provided responses to the WTO's request. See India—Request for Information from the World Trade Organization Dispute Settlement Panel on India, EBD/98/76, 7/13/1998.

[28] In another WTO dispute between Honduras and the Dominican Republic, a Panel requested information from the Fund on consistency of an exchange measure with the Fund's Articles of Agreement. In 2004, the Chairman of the WTO Panel requested that the Fund provide information on a "foreign exchange commission" imposed by the Dominican Republic. The request was made pursuant to paragraph 8 of the Cooperation Agreement. This was the first case in which a WTO dispute settlement panel requested information from the Fund on the consistency of an exchange measure with the Fund's Articles of Agreement. The Fund provided its responses to the WTO. See Dominican Republic—Request by WTO Dispute Settlement Panel, EBD/04/68, 6/22/2004.

THE FUND'S ROLE IN PROVIDING CAPACITY DEVELOPMENT ON CUSTOMS ADMINISTRATION[29]

18. Customs administrations play a critical role. They carry out functions that support revenue mobilization, the business environment, and the security and resilience of international supply chains. They achieve those objectives by ensuring that products entering a country's territory are reported properly at authorized points of entry; are safe and imported according to required standards, and that all applicable duties and taxes are paid upon clearance. In the case of goods declared for export, customs administrations ensure that they leave the territory free of indirect taxation and are not deviated back to the domestic market. Well-functioning customs administrations promote:

- **Increased revenue mobilization.** Particularly in developing countries, customs continue to play a crucial role to collect revenues. While the economic distortions generated by border taxation (i.e., import/export duties) have been recognized over the past decades and many countries have reduced their dependency on tariff collection, customs still play a relevant revenue role, for example, collecting VAT on imports (which represents more than 50 percent of total VAT collected in some countries). Overall, a typical customs revenue breakdown in a low-income country is 50 percent from VAT, 25 percent from excise duties, 15 percent from customs tariffs, and the rest from various fees. Customs is keen to promote trade as trade is its revenue base.

- **Improved business environment and trade facilitation.** Regarding their economic role, customs administrations must address the trade community's needs to simplify and speed up trade operations. They are crucial to help reduce supply chain bottlenecks in the support of the economy, without putting revenue, national security, and citizens' safety at risk. Customs also deals with fiscal and trade policies (e.g., suspensive regimes, exemptions, economic processing zones, and preferential trade agreements) that are often difficult to administer.

- **Greater safety in international trade.** Customs administrations also perform other important roles that may be less visible for the international community, including the Fund. As many goods are subject to non-tariff regulations or restrictions, customs agency is in charge of ensuring that goods comply with such requirements before they enter or exit the country. These regulations include sanitary and phytosanitary licenses and controls, health and pharmaceutical permits, standards imposed on an array of consumption and technological goods, and export-control regulations on dual-use and sensitive goods and waste and hazardous materials—increasingly important for the protection of the environment. Customs is also a key agency in the fight against global trafficking of illegal goods connected to organized crime, terrorism, trade-based money laundering, and mis-invoicing.

[29] Prepared by Andrea Lemgruber, Tadatsugu Matsudaira, Gilles Montagnat-Rentier, and Azael Perez Azcarraga.

19. The demand for IMF capacity development (CD) on customs administrations doubled between 2000 and 2019, providing support to around 80 countries over the past seven years, especially for the benefit of low-income and fragile countries.[30] In 2019, these missions were complemented by more than 150 hands-on missions delivered by the IMF's regional capacity development centers (RCDCs). Since new standards and procedures have been agreed at international fora and new technologies have been developed, customs administrations, particularly those of low-income countries (LICs) have sought additional technical support and finance. This has been the driving force behind the increase in CD demand in customs.

20. IMF CD in the area of customs has been led by FAD which has been providing CD activities to strengthen customs administrations, particularly in developing countries. CD is delivered both by our headquarters-based staff and the Fund's network of highly qualified customs experts. Headquarters missions typically involve diagnostic reviews which guide the authorities on the design of comprehensive and prioritized reform strategies. In contrast, implementation is mainly carried out through follow-up visits by short-term customs experts, as well as customized support programs through the IMF's RCDCs which have long-term customs experts.

21. FAD CD focuses on how to strengthen the foundations of customs administrations to improve voluntary compliance with customs law and other import and export regulations, and to help facilitate trade. LICs often request support to improve revenue mobilization, which usually implies institutional strengthening through better governance, management arrangements, and political commitment. In specific cases, FAD also provides CD on customs trade facilitation measures and on aspects of multilateral and regional integration (i.e., consistency with WTO rules). In practice, it is impossible to isolate the functions of a customs administration (i.e., revenue, trade, and security are intertwined functions). IMF CD could potentially contribute more to the areas of trade and security and make these more prominent. This would help leverage synergies among the three functions. FAD customs CD is regarded as trade-related and reported to Aid-for-Trade (OECD/DAC, WTO).

22. In comparison to other international organizations' CD work, FAD customs administration CD has the following priorities:

- **High synergy with macro-fiscal policy recommendations.** FAD CD takes place in the context of high integration with Area Department work, providing synergies with surveillance and lending work, and helps link CD in customs administration to macro-critical topics. It also frames the customs work in connection with a country's Medium-Term Fiscal Framework and Revenue Strategy. It is noteworthy that the WB's customs reform projects focus mainly on trade and transport facilitation, while improving compliance is not considered the primary objective.

[30] In addition to CD efforts, in June 2022 FAD published a book titled, *"Customs Matters: Strengthening Customs Administrations in a Changing World"*. The book offers a cross-sectional view of the main aspects that policy makers and customs officials should consider when evaluating the current state of their customs system. It intends to help them develop, reinforce, or relaunch their own roadmap for customs modernization reforms.

- **High synergy with tax policy, tax administration, and fiscal law reform program.** In light of the integrated nature of FAD's workstreams, work on customs is well-coordinated with other fiscal areas within FAD, and also cross-departmental with LEG. In particular, it is well-integrated with CD in tax administration (as both workstreams are combined under one division) but also with tax policy, and with LEG's fiscal law design and drafting function, ensuring a consistent and coherent set of recommendations that are supportive of medium-term transformational reforms. Good examples are the participation of customs specialists in governance missions and their contribution to the Medium-Term Revenue Strategy (MTRS) approach, in which policy, administration, and legislative frameworks come together.

23. FAD CD is delivered through a structured, pragmatic, and sustainable program that is fully managed by IMF staff (i.e., not outsourced) to ensure quality. FAD CD process starts with a diagnostic review of a country's multi-year strategic plan (which differs from more targeted or theme-centric approach by other organizations). The delivery process includes HQ-led work (focusing on strategic aspects on customs environment, legislation, organization and management structures, operations, ICT, and other support functions) and is complemented by hands-on support and by the IMF's ample network of RCDCs (see bullet below).

24. CD also is delivered through the provision of long-term resident advisors or peripatetic advisors. Permanent presence of long-term customs experts in the field, including at our network of RCDCs, allows the ability to gather in-depth knowledge of the context and the real needs of customs administrations in their regions, as well as the possibility of meeting any request in a timely manner.

Strengthening the Fund's Role to Provide Better CD to Customs Administrations

25. Looking forward, there are two aspects that the Fund should consider to meet the needs of its members:

- **Expand or make more flexible the use of funds for the provision of CD for customs administrations.** Currently, the CD provided by headquarters in the customs workstream is mainly funded by Fund internal financing (IMF01) and Japan.[31] Compared to CD on tax administration, where the eligible countries can benefit from the multi-donor Revenue Mobilization Trust Fund (RMTF) and other sources of financing, funding for customs CD projects is thus much more limited, which significantly constrains FAD's ability to meet the growing demand for technical support by our members. Given this context, it would be desirable to identify new funds to finance FAD CD on customs, including by broadening the scope of the RMTF to include specific customs work. FAD and ICD are working on such a proposal. Moreover, external financing sources may be available to be tapped by the Fund, such as the UN's Enhanced Integrated Framework (EIF) trust fund and the WTO's Trade Facilitation Agreement Facility (TFAF). However, benefiting from these sources would require internal work to better link

[31] Japan Subaccount under the IMF framework administered account for selected Fund activities (JSA).

FAD's CD on customs administration to trade issues and to broaden the scope of the customs areas the Fund would cover.

- **Put greater emphasis on digital transformation of customs administrations.** GovTech efforts should be one of the key cornerstones in articulating customs modernization reforms. These should go hand in hand with digitalization of supply chains and logistics, which may transform trade operations. In addition, automation and the adoption of new technologies for cargo processing are allowing customs to collect an impressive volume of data and are changing the way customs traditionally operated. Gradually, customs administrations are becoming more data-driven organizations and this transformation will require a change in their mindset to rethink customs processes and adapt them to the new context of international trade and business.

26. This evolution will also require new profiles and training of customs officials. Technology should also be leveraged to address governance and managerial issues, for example, by implementing (with safeguards) automated decision-making systems that will restrict or guide human intervention and reduce opportunities for discretion and corruption. In the coming years, we will see less customs officers interacting face-to-face at ports of entry, as customs controls will focus on functions prior to and after the goods are cleared. Another key aspect is the capacity of customs administrations to produce (verified) data that are essential to other administrations and the government to achieve their objectives. A typical example is provided by the extractive industries sectors where the role of customs is much less to collect duty than to make available verified data on imports and exports to be exploited for revenue risk analysis, transparency, policy-decision making, and enforcement of foreign exchange rules, improvement of trade statistics. Other important areas are mis-invoicing and its impact on trade and BOP due to weak customs and the coordination of customs with other relevant agencies (e.g., central banks for impact on reserves and financial intelligence units on trade-based money laundering).

METHODOLOGY USED IN THE TRADE REVIEW[32]

This section summarizes the methodology employed in the Trade Review.

Overview

27. The analysis is based on three complementary methodologies to systematically review the Fund's bilateral and multilateral work on the main trade issues during 2014–2022. The first approach relies on a review of multilateral surveillance and research work by external experts (Professors Douglas Irwin and Nina Pavcnik at Dartmouth College and Professor Amit Khandelwal at Yale University) who assessed the coverage of key themes in the overall Fund output and examined in greater depth the quality and relevance of a subset of outputs. The second approach involves

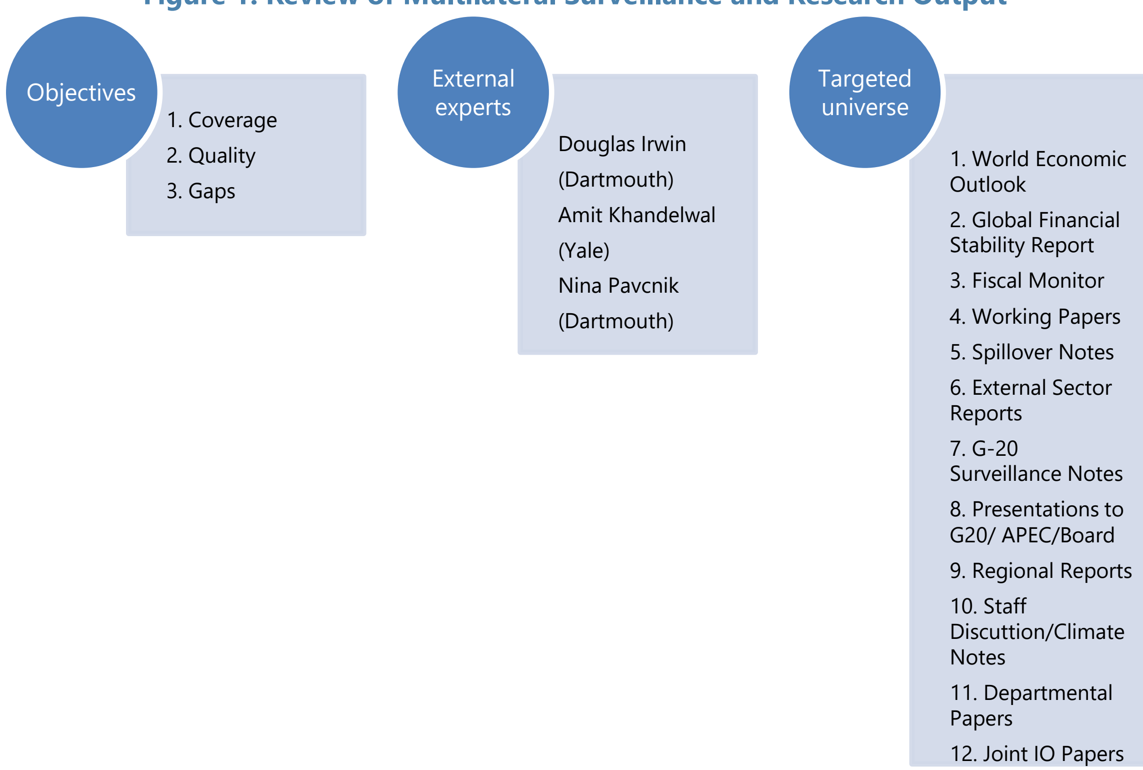
[32] Prepared by Adam Jakubik, Parisa Kamali, and Elizabeth Van Heuvelen.

textual analysis to estimate trade and trade policy coverage in bilateral surveillance and program reviews, and multilateral surveillance, by searching for trade-related words and key phrases and covering the 2002–2022 period so as to allow for comparison with the period of review (2014–2022). The third pillar entails a country team survey of Article IV staff reports, and program review staff reports.[33]

Approach 1: Review of Multilateral Surveillance and Research Output

28. The multilateral and research work was reviewed in consultation with external experts (see Figure 1 below). The review had two stages. The first stage focused on the universe of Fund multilateral products that relate to international trade and trade policy. The goal of this panoramic view was to assess the coverage of the issues and identify potential gaps in the analysis of the past five years. The second stage consisted of an in-depth review of a representative subset of multilateral and research work to assess the quality of Fund trade analysis. The reviewers were also asked to specifically comment on the coverage and quality of work in key areas of interest.

Figure 1. Review of Multilateral Surveillance and Research Output



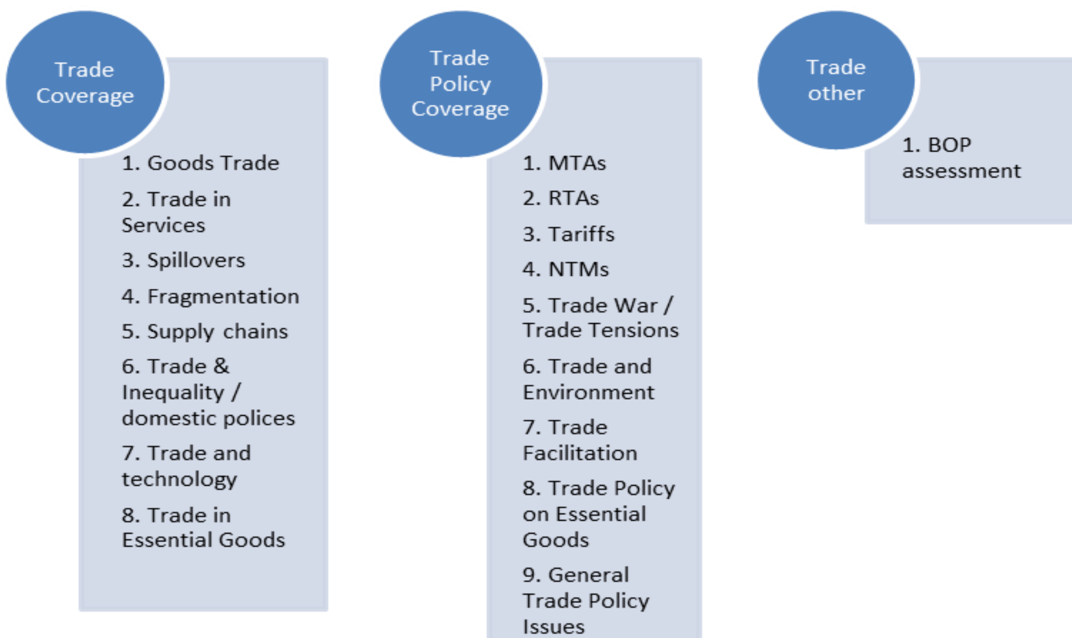
Source: IMF staff.

[33] Over 120 responses, representing all regions and income levels.

Approach 2: Textual Analysis

29. The textual analysis relied on the Python programing language to extract the number of times trade-related words and key phrases have been used in a particular country document or flagship in order to estimate the overall coverage of trade, trade policy issues, and specific issues (Figure 2 and Table 1). The search was performed on all bilateral surveillance and program review staff reports during the 2002–2022 period, and all flagships covering the same period[34] and was conducted using Boolean queries in Python to combine keywords with logical operators like AND/OR to produce the relevant results. The Python code was also written to eliminate non-relevant occurrences (e.g., words such as "important" or "importance" instead of "import") and to eliminate double counting (e.g., not counting "trade" when it appears in the phrase "trade reform"). The keywords and key phrases were carefully chosen both to reflect the priorities and themes of the Review, but also to extract maximum information with the highest degree of contextual accuracy.

Figure 2. Textual Analysis



Source: IMF staff.

[34] This includes the External Sector Report, Fiscal Monitor, Global Financial Stability Report, Regional Economic Outlook, and World Economic Outlook.

Table 1. Trade Review: Key Phrases and Words for Textual Analysis

Broad Search Areas	Category	Keywords and key phrases
Trade other	BOP assessment	continuous pc on import restrictions; export; exports; import; imports; trade; trade balance; wto balance of payments committee; wto bop committee
Specific Trade Issues	Goods Trade	export unit values; export value; export values; export volume; export volumes; flow of goods; goods flow; goods trade; import flow; import flows; import unit values; import value; import values; import volume; import volumes; merchandise exports; merchandise imports; merchandise trade; trade in goods
	Trade in Services	customs duties on electronic transmissions; digital services tax; digital services taxes; dst; export of services; moratorium on electronic transmissions; services export; services exports; services flows; services import; services imports; services trade; tourism; trade in services;
	Spillovers	border spillover; border spillovers; cross border spillover; cross border spillovers; inward spillover; inward spillovers; macro impact of tariffs; outward spillover; outward spillovers; sectoral spillovers*; spillover from tariff; tariff spillovers; through trade; trade channel; trade channels; trade externality; trade spillover; trade spillovers
	Fragmentation	fragmentation*, de globalization; deglobalization; decoupling*; fragmentation*; fragmentation of trade; friend shoring; friendshoring; geo economic tensions; geoeconomic tensions; geopolitical tensions; near shoring; nearshoring; reshoring; trade fragmentation; trade uncertainty
	Supply chains	attracting foreign investment; backward linkages; effective protection; export diversification; forward linkages; gscs; gvc;gvcs; intermediate export; intermediate exports; intermediate import; intermediate imports; intermediate trade; services value added; supply bottlenecks; suply chain; supply chain bottlenecks; supply chain disruption; supply chain resilience; supply chains; supply resilience; trade in components; trade in components and parts; trade in intermediate goods; trade in parts; trade in parts and components; trade in task; trade in tasks; value added chain; value added in services; value chain; value-chain;
	Trade and Inequality/Domestic Policies	active labor market policies*; adjusting to trade; domestic policies to mitigate trade adjustment costs; gender*; inequalities*; inequality*; trade adjustment; trade adjustments; trade and adjustment
	Trade and Technology	cross border data flow; cross border data flows; cyber security*; data flows*; data localization; e-commerce; forced technology transfer; knowledge spillover; knowledge spillovers; technology*; technology spillover; technology spillovers; technology transfer; technology transfer policies and practices; technology transfer through trade;
	Trade in Essential Goods	agricultural export; agricultural exports; agricultural import; agricultural imports; agricultural trade; fertilizer exports; fertilizer imports; fertilizer trade; food trade; masks*; medical goods*; rice exports; rice imports; rice trade; trade in agriculture; trade in fertilizer; trade in food; vaccine*; vaccine exports; vaccine imports; vaccines*; wheat exports; wheat imports; wheat trade;
	General	collapse in trade; comparative advantage; cross border trade; crossborder trade; export flow; export flows; exporter; exporters; flow of exports; importer; importers; trade center; trade collapse; trade crises; trade crisis; trade environment; trade flow; trade flows; trade integration; trade ministries; trade ministry; trade officials; trade openness; trading environment; transit trade

Table 1. Trade Review: Key Phrases and Words for Textual Analysis (concluded)

Trade Policy	**Multilateral Trade Agreements**	accede to the wto; agreement on services domestic regulation; agreement on subsidies and countervailing duties; ascm; association agreement; benefits of trade; doha round; e commerce agreement; eu white paper; gats; gatt; general agreement on tariffs and trade; general agreement on trade in services; governance of trade; government procurement agreement; intellectual property agreement; investment facilitation agreement; multilateral agreement; multilateral trade; multilateral trading system; ottawa group; rules based trade; rules based trading system; services agreement; services agreements; services domestic regulation agreement; tessd; tfa; trade and sustainability; trade benefits; trade facilitation agreement; trade governance; trade policy review mechanism; uruguay round; white paper on foreign subsidies; world trade organization; wto; wto accession; wto accessions; wto agreement on climate change; wto appellate body; wto challenge; wto concerns; wto dispute settlement; wto environmental goods agreement; wto membership; wto obligations; wto observer; wto observers; wto procurement agreement; wto reform; wto requirement; wto requirements; wto rules
	Regional Trade Agreements	afcfta; african continental free trade agreement; cacm; cai; canada eu agreement; caribbean community and common market; caricom; cefta; central american common market; central european free trade agreement; ceta; china eu agreement on investment; china eu investement agreement; comesa; common economic space; common market for eastern and southern africa; comprehensive and economic trade agreement; comprehensive and progressive agreement for trans pacific partnership; cptpp; eaec; east african community; economic cooperation of west african states; ecowas; eea; efta; eu japan; eu japan economic partnership agreement; eurasian economic community; european economic area; european free trade association; free trade agreement; free trade agreements; fta; ftas; generalized system of preferences; global system of trade preferences among developing countries; gsp; gstp; japan eu economic partnership; japan uk comprehensive economic partnership; japan us; japan us trade agreement; mercosur; nafta; north american free trade agreement; pacific partnership; preferential market; preferential markets; preferential trade; rcep; regional comprehensive economic partnership; regional trade; sacu; single market; south african customs union; tpp; trade agreement; trade agreements; trade and investment agreements; trade and technology council; trade partnership; trade preferences; transatlantic trade; transatlantic trade and investment partnership; trilateral trade agreement; ttip; uk japan; uk japan comprehensive economic partnership; us japan; us japan trade agreement; us mexico canada agreement; usjta; usmca
	Tariffs	ad valorem tariff; ad valorem tariffs; applied tariff; applied tariffs; bound tariff; bound tariffs; compound tariff; compound tariffs; customs duty; customs tariff; customs tariffs; decreasing tariff; decreasing tariffs; duty drawback system; duty free; duty-free; export tax; export taxes; external tariff; external tariffs; import duties; import duty; import tariff; import tariffs; increasing tariff; increasing tariffs; mfn tariff; mfn tariffs; preferential tariff; preferential tariff and bound tariff; preferential tariffs; specific tariff; specific tariffs; tariff escalation; tariff on imports; tariff regime; tariffs and trade; tariffs on imports; trade tariff; trade tariffs; trade tax; trade taxes
	Non-tariff Measures	anti dumping; antidumping; ccvd; countervailable subsidies; countervailable subsidy; currency based countervailing duty; embargo; export ban; export bans; export control; export controls; export curb; export curbs; export measure; export measures; export subsidies; export subsidy; fdi policies; fdi regime; fdi restrictions; foreign direct investment regime; foreign investment regime; import quota; import quotas; import subsidies; import subsidy; imposition of quota; imposition of quotas; intellectual property trade; investment restriction; investment restrictions; investment sanction; investment sanctions; investment screening; ip trade; non tariff; nontariff; quota system; restrictive fdi; rules of origin; section 232; section 232 tariff; section 232 tariffs; section 301 vietnam; services liberalization; steel and aluminum tariff; trade in intellectual property; trade in ip; trade in intellectual property; trade sanction; trade sanctions
	Trade War/Trade Tensions	brexit withdrawal agreement; cost of tariffs; dispute resolution; economic and trade agreement between the us and china; escalating trade costs; export restriction; export restrictions; harmful to trade; import restriction; import restrictions; internal market protocol; northern ireland protocol; phase 1 agreement; phase 1 deal; phase one agreement; post brexit trade; protectionism; protectionist policies; protectionist trade; retaliatory measure; retaliatory measures; retaliatory trade; safeguard tariffs; section 201; section 201 tariffs; section 301; section 301 tariff; tariff retaliation; trade conflict; trade differences; trade disagreement; trade dispute; trade distortion; trade distortions; trade diversion; trade frictions; trade restrictions; trade retaliation; trade stand-off; trade tensions; trade war; withdrawal agreement
	Trade and Environment	bca; bcas; border carbon adjustment; carborn border adjustment mechanism; cbam; climate*, climate change*; fisheries subsidies; fossil fuel subsidies
	Trade Facilitation	border procedures; customs procedures; export cost; export costs; import cost; import costs; logistics performance; trade facilitation
	Trade Policy on Essential Goods	export ban on food; export restrictions on food; food crisis**; vaccine restrictions; vaccine**; vaccines**
	General policy	free trade; open trade; regulatory cooperation**; tariff and nontariff barriers; trade barrier; trade barriers; trade freedom; trade liberalization; trade policies; trade policy; trade protection; trade reform; trade regime

*in proximity to "trade"; **in proximity to "trade policy"

Source: IMF staff.

Approach 3: Country Survey

30. To complement the textual analysis, a country survey was sent to all country teams and focused on the coverage of trade and trade policy issues in staff reports (see below). To minimize the burden on country teams, the survey was limited to the past three years or reports, and included five questions that asked about: (i) coverage of trade issues, including changing patterns of goods and services trade, cross border spillovers through trade, FDI, trade diversification, trade and growth; (ii) coverage of trade policy issues such as tariff and non-tariff measures, regional trade agreements, protectionism; (iii) gaps in trade and trade policy coverage; (iv) coverage of three specific topics (the impact of the trade war/trade tensions, trade and the pandemic, and trade and the war in Ukraine), and (v) trade concerns in the program context (for program countries only).

Box 1. Trade and Trade Policy Survey

October 2022

This survey is an integral part of the review of the role of trade in the work of the Fund during 2014–2022, scheduled to be discussed at the Board in March 2023. The aim of this survey is to evaluate the extent to which trade and trade policy issues were covered in country staff reports.

Country	
Contact person	
Extension	

This survey will focus on *the coverage of trade and trade policy issues in staff reports (SR)*. There are five questions which ask about:

- Coverage of *trade issues*, including changing patterns of goods and services trade, cross-border spillovers through trade, FDI, trade diversification, trade and growth.
- Coverage of *trade policy issues* such as tariff and non-tariff measures, regional trade agreements, protectionism;
- Gaps in trade and trade policy coverage;
- Coverage of *three specific topics*: (i) the impact of the trade war/trade tensions, (ii) trade and the pandemic, and (iii) trade and the war in Ukraine, and
- Trade concerns in the program context (*for program countries only).*

Box 1. Trade and Trade Policy Survey (continued)

Question 1. Coverage of trade issues. To what extent was trade covered in the last three staff reports (e.g., trade in goods and services, spillovers through trade, global value chains, diversification, trade integration)? **Scale: 1–4.**[1]

Scale:

Question 2. Coverage of trade policy issues. To what extent was trade policy covered in the last three staff reports (e.g., tariffs, non-tariff measures, Bilateral/Regional/Multilateral Trade Agreements, trade facilitation/simplification of customs procedures)? **Scale: 1–4**.

Scale:

Question 3. Gaps in Trade and Trade Policy Coverage. In the last three staff reports, were there any gaps in coverage of trade and trade policy issues? For example, were relevant issues not covered adequately (e.g., trade and supply chain disruptions during the pandemic; spillover effects through trade of large macroeconomic shocks; trade effects of commodity price shocks; use of protectionist measures, spillovers from the trade war, impact of free trade agreements such as AfCFTA or CPTPP)? If so, please provide reasons in the comment box (e.g., space constraints, lack of resources/expertise). **Scale: 1–4**, with 1= inadequate coverage (major gaps), 2= less than adequate coverage, 3= adequate coverage, 4= fully appropriate coverage.

Scale:

Question 4. Coverage of specific trade and trade policy issues.

A. ***Trade war/trade tensions***. Trade tensions accelerated and intensified following the China-U.S. trade war that began in 2018. While many countries may not have been directly impacted by tariffs and other measures, the spillover effects of such measures to individual countries and the global economy was significant; global GDP in 2021, for example, was estimated to be 0.4 percent lower as a result of the tariffs raised since 2017 according to calculations based on work for the October 2019 WEO.

Was the trade war/trade tensions covered in country staff reports in <u>2017–2022</u>? Scale: 1–4.

Scale:

[1] **Scaling system**: Unless otherwise specified, 1= minimal trade coverage (e.g. one or two sentences as part of required BOP assessment), 2= somewhat covered (e.g. either dedicated paragraph in SR, or required BOP assessment plus a box in SR or in a SIP), 3= well covered (e.g., dedicated paragraph in SR plus a box in SR or in a SIP), 4 =very well covered (e.g., more than one dedicated paragraph plus a box in SR or a dedicated SIP / coverage in staff appraisal).

Box 1. Trade and Trade Policy Survey (concluded)

B. ***Trade and the pandemic.*** Was the impact of the pandemic on trade covered in country staff reports in 2020–22? This could include coverage of disruptions in global value chains, trade restrictive measures and their impact on trade of medical goods, the impact of pandemic on trade of services (specifically travel and IT), and the pandemic's impact on transport, logistics and travel costs. **Scale: 1–4.**

Scale:

C. ***Trade and the war in Ukraine.*** Was the impact of the war in Ukraine on trade covered in country staff reports in 2022? This could include coverage of sanctions and other trade restrictive measures and their impact on trade of goods, disruptions to commodity markets and impact on trade, as well as logistics and supply chain disruptions related to the war. It could also include discussion of export restrictions and other trade-related measures in response to the accompanying food-security crisis (e.g., food export bans and consequences for food importing countries). **Scale: 1–4.** ***If your team has not held an Article IV consultation since the onset of the war, please reply N/A.***

Scale:

Question 5. Trade concerns in the program context—*only respond if your country was part of a Fund-supported program at any point during the 2014–2022 period?*

Were trade and trade policy issues taken into account in the teams' policy discussion under Fund-supported programs, including the setting of program objectives and program conditionality (e.g., quantitative performance criterion, indicative targets, prior actions, and structural benchmarks)? For example, countries in regions such as the Asia-Pacific and Africa have been joining major regional initiatives (e.g., CPTPP, RCEP, AfCFTA) that could have important implications for matters like tax revenues, the regulation of the financial and other service sectors, and physical infrastructure. How, and to what extent, have these implications been taken into account? **Scale: 1–4**.

Scale:

(Optional) Other comments:

TRADE ISSUES IN FOCUS

A. Digital Currencies: Implications for International Trade[35]

31. From precious metals to paper money, currencies have historically been crucial for shaping global trade and commerce (Prasad, 2021). As society enters the digital age and more forms of digital currencies are adopted as means of payment, what do these advances mean for international trade? There are several potential ways in which digital currencies may impact international trade (see also Xiao and Fan, 2022):

- **The growth in digital currencies could make cross-border payments more efficient.** Recent decades have witnessed rapid growth in global economic integration but the system of cross border payments underpinning this integration has not kept pace. Cross-border payments are typically made through a global network of correspondent banks involving multiple intermediaries that are fragmented across different time zones and operating hours. While correspondent banks play a critical role in cross-border payments, due to duplicated processes and steps in the correspondent banking chain, cross-border payments exhibit high costs, low speed, operational complexities, limited access, and low transparency. These inefficiencies also introduce settlement risk into the system, to the detriment of both financial intermediaries and end users. Settlement in central bank money, the safest settlement asset, eliminates this risk; however, it is typically restricted to interbank domestic payments on access-controlled central bank real-time gross settlement (RTGS) systems. For digital currencies that rely on decentralized ledgers (i.e., a record of transactions stored on a network, as opposed to a centralized database), money could be sent and received within seconds and around the clock. Future regulatory compliance requirements on digital currency service providers and foreign exchange control may nonetheless reduce the speed. In this context, so-called m-CBDCs could provide a shared platform on which participants can conduct peer-to-peer payments directly in the safety of central bank money of multiple jurisdictions. Recent Fund analysis highlights the many potential improvements to cross-border payments that could arise from a multi-currency and contracting platform (Adrian and others, 2022). This may have the potential to alleviate many of the aforementioned challenges in cross-border payments, extend protection to currencies beyond those covered by existing systems, and support the use of local currencies in international settlement (BIS, 2021; BISIH, 2022).

- **Digital currencies could help address the global trade financing gap by providing alternative credit information for trade finance.** According to the Asian Development Bank's latest estimates, there was a $1.7 trillion global trade financing gap in 2020, an increase of 15 percent from 2018 (Asian Development Bank, 2021). This growing shortfall was reflected in reduced funding made available by banks and a substantial increase in rejected trade finance applications, which heavily impacted SMEs that often do not have established financial records

[35] Prepared by Robin Koepke and Silvia Sgherri.

with banks. Public ledgers of digital currencies could be used to share payment and financial history to strengthen loan applications for trade finance. This could broaden access to trade finance for SMEs, especially in developing countries where information from credit bureaus is often limited or unavailable. Strong privacy protocols would be an important prerequisite to achieve this goal.

- **Digital currencies also have the potential to allow for more cost-effective anti-money laundering and combating the financing of terrorism (AML/CFT) controls that may help alleviate the impact of de-risking by banks.** De-risking refers to a reduction in business relationships by global financial institutions with countries based on the profitability and risks of banks' business relationships. De-risking often creates obstacles for international payment flows with these countries and tends to increase the transaction costs for buyers and sellers. Digital currencies could reduce AML/CFT costs by facilitating regulatory compliance, which could in turn reduce barriers for international payments and trade for affected countries.

Potential Policy Challenges

32. Despite their promising potential for international trade, digital currencies raise important policy challenges:

- **Physical and legal infrastructures.** Policymakers should focus on building the right physical and legal infrastructures to shape the trade payment system for tomorrow. There are many technical and regulatory challenges to overcome, ranging from issues of interoperability to the issues of AML, CFT, and consumer protection. Regulatory cooperation is needed to facilitate the development of digital currencies in international trade and to address the risks that may come with their use.

- **Digitization of trade.** To achieve the full potential of digital currencies, the advancement of payments technology needs to be accompanied by the digitization of trade. With heavy reliance on paper documents and a lack of legal support for e-documents or e-signature, the benefits of digital currencies will be limited.

- **Digital divide.** Financial inclusion will continue to be a problem for countries or communities that cannot afford the digital devices needed to hold digital currencies or do not have access to basic infrastructures such as electricity, internet, identification services, or outlets to convert cash into digital formats. In the context of global trade, without the basic infrastructure, communities and especially SMEs that are excluded today will face an even greater challenge in a world where money is widely digitized.

- **Uneven benefits.** It is debatable whether digital currencies could encourage all countries to trade more. First, digital money is unlikely to change the comparative advantages of countries. Second, the use of digital currencies can make marginalization in world trade even more of an issue. Countries that are well integrated will receive a boost while countries that are poorly integrated could fall farther behind. Third, the currencies of those countries with limited trade with the outside world would remain undesirable. As a result, even if one type of digital currency gains global presence, converting that into local currency to allow for international trade may still be expensive and difficult if the demand for such local currency is limited internationally.

- **Implications for foreign direct investment (FDI**). Many questions are raised by the intersection of cross-border investments and digital currency, as the current framework, such as the bilateral investment treaty (BIT) and the protections it offers, was built well before the age of digital currencies. Would digital currencies be considered as "covered investments" under BIT? Would BIT protections apply to investments made by and in digital currencies? How would the tokenization of FDI work under the current rules? Both national authorities and foreign investors need guidance on these questions.

Role of the Fund

33. A sound international financial system is needed to support vibrant international trade which, in turn, is critical for enabling economic growth, raising living standards, and reducing poverty around the globe. To reap the full benefits of digital payments on trade while managing related risks, the Fund should help ensure that widespread adoption of digital money fosters domestic and international economic and financial stability.

34. To this aim, the Fund's multilateral surveillance efforts should focus on ensuring that the international monetary system remains stable and efficient. The Fund should monitor, advise on, and help manage this far-reaching and complex transition to digital currencies, so that new forms of money and technologies that are widely used for international trade remain trustworthy. Payment systems must grow increasingly integrated and must work for all countries to avoid a digital divide. Moreover, the Fund's bilateral surveillance function should help protect domestic economic and financial stability by promoting carefully designed public-private partnerships for the provision of digital money, a smooth transition of the role of banks, and fair competition. Finally, the Fund should also step up its collaboration with other International Organizations, including the World Trade Organization, making available takeaways from its policy analysis and monitoring efforts, and pursuing new analysis in areas of joint interest—such as on the impact of digital money on trade flows. Finally, regulatory cooperation will be important to harness the potential of digital currencies in facilitating international trade.

B. Trade-Finance Nexus: Payments and Trade Finance[36]

35. The global financial system plays a key role in facilitating international trade by enabling cross-border payments and assisting exchange of goods and services via trade finance. The importance of trade finance, on which more than 80 percent of international trade relies, particularly increases in crisis times. Some long-term trends and emerging risks—such as a global trade finance gap, digitalization, sanctions, and fragmentation—pose challenges and

[36] Prepared by Russell Green and Svitlana Maslova.

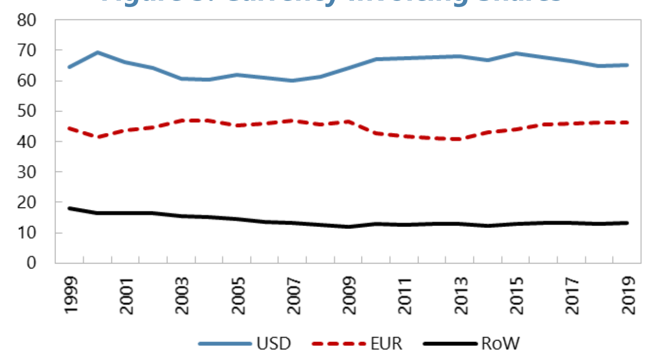
opportunities for development of trade finance. International agreements at different levels support the trade-finance nexus. The IMF supports its members on these issues through various venues.

36. International trade necessarily requires cross-border payments, most often between jurisdictions with different currencies, typically facilitated by FX markets and payments systems. Goods trade also requires transportation time, during which both importer and exporter may require trade finance instruments to cover payments and mitigate risk. Global value chains are particularly intense users of this type of finance. Exchange rate risk hedging may require wholesale cross-border bank financing.

Cross-Border Payments

37. International trade payments are clustered in a few major currencies, routing payments through a limited set of jurisdictions. Relative to their economies' trade shares, the U.S. dollar and to a lesser extent the euro and a few other currencies dominate both imports and exports. Trade invoices indicate the U.S. dollar and euro shares have risen through 2019 (Boz and others, 2022). Most international payments are made through correspondent bank networks. The importer's bank requests a correspondent bank in the jurisdiction of the invoice currency to transfer money from its account to the account of the exporter's bank in the same jurisdiction. The exporter's bank can then place the funds with the exporter (Financial Stability Board, 2020). Therefore, a high and growing share of trade payments pass through correspondent banks in the United States and a few other jurisdictions.

Figure 3. Currency Invoicing Shares



Source: Boz and others (2022).

38. Correspondent bank networks are becoming more concentrated, potentially raising costs for trade payments. Between 2012 and 2018, the number of active correspondent bank relationships (CBRs) fell about 20 percent, and the number of country-pairs that have any active CBRs declined about 10 percent with a simultaneous growth in the number and value of cross-border payments. The problem is widespread, but most acute in small countries or those with governance, profitability and AML/CFT compliance concerns. (IMF 2017, and Rice and others, 2020). This increases the cost of cross-border transactions (Alleyne and others, 2017), acting like a tariff on exports and imports.

Trade Finance

39. Use of trade finance instruments—which mitigate a wide range of risks related to international trade—continues to trend upward. Trade finance instruments include guarantees, trade loans, and letters of credit that allow importers and exporters to offload FX price, timing, and counterparty risks, among others. It is estimated about 80 to 90 percent of international trade rely on trade finance instruments—mostly, short-term (WTO 2009). Trade instrument volume—as proxied by the share of international factoring in total factoring (sales by companies of their accounts receivables at a discount)—has grown steadily in the last decades, with the growth more focused in EMs and Asia. Trade finance is provided via different mechanisms. The banking sector provides a significant share, but interfirm, open account trading and fintech are playing an increasing role (van Wersch, 2019).

40. Trade finance has complex interlinkages with international trade developments. Trade finance both leads and lags international trade. Trade volumes naturally drive demand for trade finance. On the other hand, a trade finance shortage could lead to a decrease in international trade due to rising risks and uncertainty. Likewise, a rise in available trade finance could support a recovery by supporting companies' operations and trade. Wholesale cross-border bank financing provides another interesting twist. In one study based on firm-level data in Mexico, dollar appreciation is found to adversely affect exports from firms reliant on banks with higher dollar funding, particularly firms with long production chains (Bruno and Shin, 2019).

41. The relationship between trade and trade finance deepens during crises. A number of studies of trade developments at the time of the 2008-9 global financial crisis find that credit shocks, including to working capital and trade finance shortage, could explain about 15 to 20 percent of the "great trade collapse" during the crisis (e.g., CGFS, 2014). Tighter financial conditions, increasing risk aversion, and dollar funding pressures have been typically correlated with drops in trade finance. Exports from sectors which are more reliant on external banking finance could be more affected during a banking crisis, based on a data from the 1980–2000 period (Iacovone and others, 2019).

Key Challenges for the Future

42. Both long-term trends and recently emerged risks pose challenges and opportunities for the future developments of payments and trade finance:

- **Persistent trade finance gap.** A trade finance gap represents unmet demand for trade finance and is calculated based on rejected applications for trade finance. In most cases rejected applications reduce trade volumes. The global gap is estimated to have exceeded $2 trillion in 2022 compared with $1.5 billion in 2016 (ADB 2022a). Despite a decline in trade volume during the pandemic, a fall in banks' appetite for risks exacerbated the trade finance gap. Recently, rising risk aversion and inflation have contributed to a further widening of the gap. The trade finance gap hits SMEs harder as they are account for relatively larger share of rejections of applications for trade finance.

- **Digitalization.** Digitalization could benefit international trade through several channels. It could lower transaction costs, shorten transaction chains, and strengthen security. It could also help alleviate some structural challenges for trade finance, including paper-based process inefficiencies, costs of regulatory compliance, premia on SMEs and reducing reliance on correspondent banks (ADB, 2022b, Financial Stability Board, 2020). Currently, digitalization is constrained by lack of standards, especially legal and technological standards. A number of projects (e.g., the BIS Innovation Hub—Digitalizing Trade Finance) are underway to address these constraints (BIS, 2022).

- **Sanctions.** Sanctions could be imposed by different jurisdictions, impacting a wide range of financial and trade operations. Risks to and screening costs for financial intermediaries dealing with specific companies, countries, currencies, or trade operations could become prohibitive. Additionally, the concentration of financial services in a small number of jurisdictions—especially the concentration of payments in dollars and euros—also concentrates sanction enforcement power of unilateral and multilateral (e.g., United Nations Security Council) sanction programs.

- **Fragmentation.** Just as trade policy could cause damaging effects if it reversed global integration and lead to an emergence of different trade blocks (Cerdeiro and others, 2021), the dependence of trade on finance creates another vector of vulnerability. Financial policies that promote fragmentation of dominant currencies and financial intermediation could cause similar effects on trade and economic growth. Fragmenting the international payment system pose risks of reducing its efficiency, undermining reform efforts, and creating trading biases, among others (Aiyar and others, 2023). In addition, gains from digitalization of the global financial system could be limited by fragmentation (Aiyar and others, 2023, and IMF, 2021).

The Financial Backbone is Supported by International Agreements

43. International agreements at various levels support the trade-finance nexus. At the supra-national level, the WTO's GATS includes commitments to allow capital flows related to financial services, including services that facilitate trade like trade finance and interbank currency trading. Some RTAs with investment chapters contain similar commitments. A handful of BITs also contain financial services commitments (Alschner and others, 2021). The GATS is enforceable between participating countries through the currently dysfunctional WTO dispute settlement system, while enforcement of RTAs and BITs are typically accessible to private parties, providing legally binding enforcement discipline outside the WTO.

Role of the Fund

44. The IMF itself was established with purposes that include assisting in the establishment of a multilateral system of payments that facilitates trade. Article I of the IMF Articles of Agreement lists among the purposes of the IMF "to assist in the establishment of a multilateral system of payments in respect of current transactions between members and in the elimination of foreign exchange restrictions which hamper the growth of world trade." Among the tools for the achievement of the Fund purposes, members have assumed obligations, including an obligation not to impose restrictions on the making of payments and transfers for current international transactions without the Fund's prior approval. The IMF identifies and recommends ways to remove such restrictions in the context of both surveillance and program work. The IMF also works to promote stability at the national and global level which in turn helps to facilitate the balanced growth of international trade and to foster orderly economic growth. The IMF's multilateral and bilateral surveillance aims to identify concerns and recommend policies that will achieve these aims. Financing arrangements similarly support stability by helping members more smoothly address balance of payments difficulties. All Fund arrangements feature a continuous performance criteria against exchange restrictions and their intensification, as well as engagement in multiple currency practices. Technical assistance and capacity development helps members improve their economic frameworks, including to address potential risks such as AML/CFT-related causes of CBR pressures and to minimize the risks and impact of sanctions on third countries. The IMF provides advice on the maintaining correspondent banking relationships that underpin trade finance and aims to establish a comprehensive data set on trade finance. In all this work, the IMF closely collaborates with international organizations and partners.

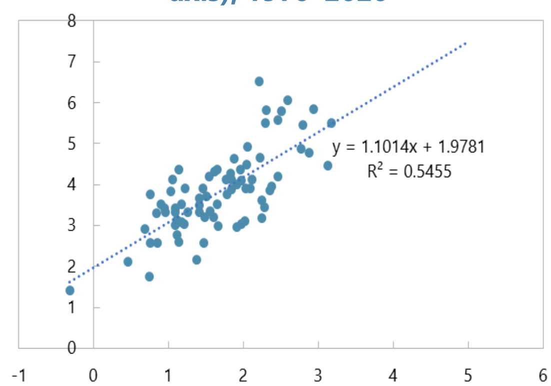
C. Trade and Growth[37]

45. International trade is central to countries' development and growth process (Goldberg and Reed, forthcoming). This section provides an overview of the channels through which trade affects growth and the available empirical evidence and the factors that may shape the trade–growth nexus going forward.

How Trade Affects Growth: Channels and Empirical Evidence

46. The literature tends to find that trade integration raises growth, as supported by the empirical evidence. For example, Frankel and Romer (1999) use gravity models to find a positive effect of trade on growth. While Rodriguez and Rodrik (2001) argue that the results may vary after controlling for additional country features such as institutions, the literature tends to confirm the positive effect of trade (Dollar and Kraay, 2003, Feyrer, 2019, and Irwin, 2019). More recently, Goldberg and Reed (forthcoming) further illustrate that international trade has helped residents of developing countries to experience sustained poverty reduction.

Figure 4. The Association Between Trade and Growth (x-axis) and GDP Growth (y-axis), 1970–2020



Source: WEO October 2022.

47. Trade's beneficial impact operates through a number of channels, in particular by promoting productivity growth. Within sectors, greater competition that results from trade promotes an expansion of the more productive firms and contraction or closure of the less efficient. And trade makes available a wider range of intermediate production inputs, lowering firms' costs. A 138-country study attributed large positive productivity effects to trade openness, finding that a

[37] Prepared by Hui Tong.

1 percentage point increase in openness raised productivity by 1.23 percent in the long run (Alcala and Ciccone, 2004). More recent cross-country evidence backs this up: for instance, Ahn and others (2016) estimate that a 1 percentage point reduction in tariffs on inputs used in a sector improves total factor productivity in that sector by 2 percent.

48. Individual country studies also point to significant sector-level productivity gains. For example, the Canada–U.S. FTA increased Canadian labor productivity in the most impacted export-oriented and import-oriented industries by around 15 percent (Trefler, 2004). The same FTA also led to substantial productivity growth in U.S. manufacturing in the 1990s (Bernard and others, 2006). Brazil's 1988–90 trade reforms brought large and widespread productivity improvements across industries (Ferreira and Rossi, 2003): total labor and factor productivity growth increased by 6 percent.

49. Innovation and technology upgrading are key channels for increasing productivity (Perla, Tonetti, and Waugh, 2021 and Melitz and Redding, 2021). Trade boosts productivity by promoting reallocation of resources, with production shifting toward sectors and firms with comparative advantage and higher efficiency (De Loecker and Goldberg, 2014). Moreover, the ability to sell to a bigger market can encourage firms to invest in innovation; for example, following the elimination of tariffs due to the Canada-U.S. FTA, increased innovation by Canadian plants caused a 14 percent rise in productivity (Lileeva and Trefler, 2010). Argentine firms increased technology spending by 20 to 30 percent in response to Brazil's reduced tariffs under Mercosur (Bustos, 2011). Import competition can also spur technology upgrading. For example, around 15 percent of Europe's technology upgrading over 2000–2007 has been linked to increased competition from China (Bloom and others, 2015).

50. Knowledge spillovers contribute to productivity growth as well. Firms also learn by exporting. In Slovenia, this effect has been found to raise firms' productivity level by 4.1 percent (De Loecker, 2013). Studying 77 developing countries, Coe and others (1997) show that total factor productivity is positively related to knowledge creation in trading partners. And an open trading system contributes to knowledge diffusion through trade-related spillovers: Lumenga-Neso and others (2005) find that the knowledge a country's trading partners have access to indirectly benefits that country as well.

51. Trade enhances productivity indirectly by encouraging institutional reform, improving governance, and contributing to financial deepening. Trade openness can weaken the political power of existing business groups that might otherwise block institutional reforms. Promoting a competitive environment and increasing growth opportunities may raise the needs of entrenched firms for external capital and increase support for reforms that promote a deeper financial system; greater trade openness is associated with a deeper financial sector (Rajan and Zingales, 2004 and WTO, 2013). At the country level, a body of research links greater trade to less corruption, particularly as trade opening reduces rent-seeking behavior (Krueger, 1974 and Gatti, 2004). The ease of doing business is strongly correlated with a country's level of trade integration. At the firm level, trade integration promotes better corporate governance and transparency (Tong and Wei, 2014), management practices (Bloom and Van Reenen, 2010), and product quality (Amiti and Khandelwal, 2013).

New Factors Shaping the Trade-Growth Nexus

52. New technologies, such as automation and digitalization, have created more complex interactions between trade and growth. These new technologies have reduced both the physical and informational costs of transaction and significantly boosted the international trade (WTO, 2018), which could have heterogeneous impacts across the economies. For example, as digital platforms reduce costs of information and logistics, digital trade could facilitate SMEs to overcome the domination of large firms in international trade (Lund and Tyson, 2018). But SMEs in countries with inadequate access to digital infrastructure may be further left behind. The new technologies could also complicate the location of GVCs. On the one hand, technologies such as automation, digitalization, and 3D printing may lower border-crossing costs and facilitate the global allocation of GVC into developing countries. On the other hand, these new technologies could diminish the share of labor costs and disincentivize multinational firms from reallocating factories into economies with lower labor costs. This could then reduce developing countries' abilities to benefit from international trade and move up the production value chain.

53. New technologies are also creating new growth opportunities through service trade. Digital technologies may cause new services to emerge and boost service trade. As services sectors use digital technology more intensively than other sectors, WTO (2018) predicts the share of total services trade to grow to 25 percent by 2030. Trade in intermediate services may increase significantly further, as barriers in those areas have been falling fast from their previous high levels (Baldwin, 2022). All these may benefit emerging and developing economies as there is less capacity constraint in the production and export of services. The heterogeneous impacts of new technologies on various sectors can have asymmetric impacts on countries' overall growth as well. For example, for countries with large shares of service sectors using the inputs from the digitalized trade, their overall productivities may benefit more from the reduction of production costs in services.

54. Countries need to take active approaches to benefit from the trade opportunities created by new technologies. They can invest more in infrastructure, such as broadband networks, and accumulate human capital such as digital literacy. Countries can also reduce the cost of doing business, level the playing field, and promote the competitiveness of digital trade, particularly for SMEs, so that the benefits of digital trade can be more widely shared within the economy. Countries should also provide a regulatory environment that supports digital development and trade while adequately protecting cybersecurity and data privacy.

55. The changing trade policy landscape brings risk and uncertainties to trade and growth. Countries have been slow in advancing critical longstanding issues in global trade, such as services, digital trade, and subsidies (Review of the Role of Trade in the Work of the Fund, Chapter 2). This reform sluggishness has weakened the WTO and has contributed to trade and investment uncertainty which has reduced growth prospects in many countries. Going forward, the risk of trade policy to be driven by geopolitics, strategic, and national security considerations has raised the potential for major trade tensions and increased the risks of runaway geo-economic fragmentation. While different countries and sectors would be affected differently, fragmentation would reduce overall opportunities for global growth through trade (see Box 8).

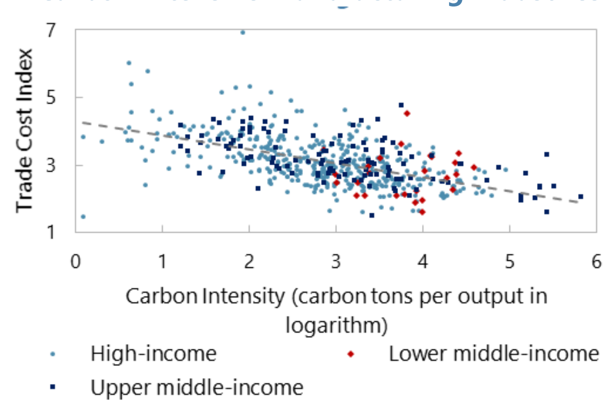
D. Trade, Environment, and Climate[38]

56. Climate change and policies to counter it have significant macroeconomic consequences and interact with trade through several key channels. This includes changes to comparative advantage, disruptions from natural disasters, and climate-related trade policies. Much work remains to be done to understand the expected trade impacts of many of these developments.

57. Climate change and more frequent natural disasters caused by it have the potential to severely disrupt trading patterns. Gassebner, Keck, and Teh (2010) find that while on average disasters reduce trade only minimally, these effects are much greater in small or poorly governed countries. In the agricultural sector, Costinot, Donaldson, and Smith (2016) find that climate change can either improve or reduce different crop yields around the world, meaning patterns of comparative advantage will change.

58. Fund staff have used innovative techniques to study climate-related trade disruptions. Korniyenko, Pinat, and Dew (2017) use network analysis to assess country-level supply chains vulnerabilities to shocks, including natural disasters. In another study, Arslanalp, Koepke, and Verschuur (2021) use data from ships' satellite signals to nowcast trade for small-island economies, known to be highly vulnerable to climate-related disasters. Understanding how climate change and more frequent devastating natural disasters will reconfigure global production, investment, and trade patterns remains a key challenge.

Figure 5. Trade Costs Tend to Be Lower in Carbon Intensive Manufacturing Industries



Source: World Trade Report 2022; WTO Trade Cost Index.

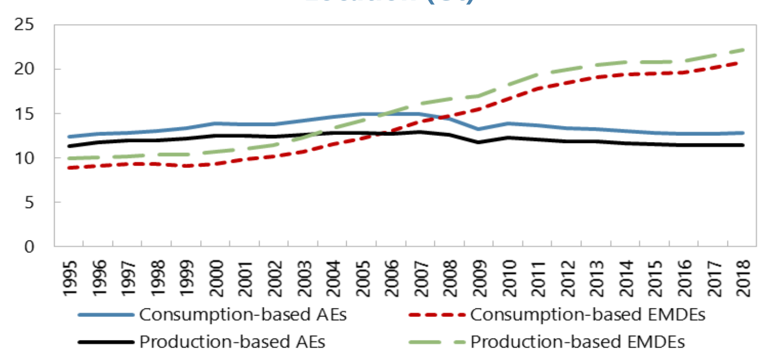
59. Open trade is key to fighting climate change. Open trade enables adaptation to climate change in agriculture through optimal specialization and improved risk sharing (Gouel and Laborde, 2021), while the production of high-tech goods necessary for a green transition, for example wind turbines, solar panels and electric vehicles, depends on global value chains. Current trade policies are biased against the environment, with higher import tariffs and NTBs on "cleaner", less CO2 emitting industries (Shapiro, 2021). This environmental bias in trade policy results from greater protectionist pressures on output relative to input sectors (which comprise energy and energy intensive raw materials) and underscores the importance of reducing trade barriers to achieve

[38] Prepared by Adam Jakubik.

climate goals (WTO, 2022). On the flip side, increased trade and economic activity can spur environmental degradation (e.g., deforestation, pollution) in the absence of adequate safeguards. Environmental provisions in regional trade agreements aimed at addressing these problems have proliferated, with some successes (Abman, Lundberg, and Ruta, 2021).

60. International cooperation is needed to limit trade distortions and trade tensions as countries step up efforts to reduce emissions. Policy measures to address climate concerns often include, among others, the adoption of carbon taxation, more stringent environmental regulations, and the use of green subsidies. In the absence of cooperation, domestic efforts to reign in emissions may shift some production to countries with looser emissions policies, resulting in "carbon leakage." As shown in the figure below, a significant portion of carbon emissions are embedded in goods produced in EMs and consumed in AEs. The EU Carbon Border Adjustment Mechanism (CBAM) would, in principle, equalize the price of imported and domestic carbon and stem leakage in certain energy-intensive sectors, and reactions of trading partners will depend on the details of implementation and WTO consistency. The use of green subsidies also has proliferated, often with the aim of broadening and hastening the adoption of cleaner technologies. This aim is best served if such subsidies do not discriminate between producers or inputs based on origin, promote rather than discourage competition, and are appropriately targeted—trade retaliation in environmental products would be particularly damaging to climate ambitions.

Figure 6. Production and Consumption-based Carbon Emissions by Location (Gt)



Source: OECD.

61. The WTO has been the primary forum for negotiations on issues at the intersection of trade and the environment. The WTO Committee on Trade and Environment hosts regular meetings on trade and environment issues among all the membership. The Trade and Environmental Sustainability Structured Discussions (TESSD), launched in 2020, are a complementary, plurilateral effort currently involving 71 WTO members to host more in-depth discussions on issues such as climate-related trade measures, environmental goods and services, the circular economy, and sustainable supply chains. Since 2014, WTO members have been engaged in plurilateral negotiations on an environmental goods agreement (EGA) that would eliminate tariffs on such products and contribute to mitigation efforts (WTO, 2022). 45 WTO members have also signed on to a Fossil Fuel Subsidy Reform (FFSR) Ministerial Statement proposing to rationalize and phase out inefficient fossil fuel subsidies that hinder the adoption of sustainable alternatives (approximately $500 billion in 2019, by the group's estimates). The Informal Dialogue on Plastics Pollution and Sustainable Plastics Trade (IDP), with 73 WTO members currently participating, aims to explore how the WTO can contribute to reducing plastics pollution. WTO members concluded a multilateral Agreement on Fisheries Subsidies in June 2022.

62. The Fund has been actively advocating on climate issues in its multilateral surveillance and analysis. The Fund supports the imposition of carbon price floors best met through a tax (e.g., a charge on the carbon content of fossil fuels) as the preferred approach and has noted the potential importance of carbon leakage. Existing estimates of leakage are small, due to mechanisms to counter it already embedded in carbon pricing measures (e.g., free allowances) and the limited scope and stringency of policies to date. This might change as countries scale up their mitigation efforts unless emissions rates across countries converge rapidly. Nordstrom, 2023 finds that, since the mid-1990s, sectoral emissions rates in developing economies have converged substantially toward those in advanced economies, but significant differences remain.) On average, a reduction of 100 tons on carbon emissions domestically would be accompanied by an increase of 25 tons abroad (Misch and Wingender, 2021). Border carbon adjustments (BCAs) such as the EU's CBAM are potentially an effective device to counter leakage, but may face practical challenges (Parry and others, 2021). Staff report for the 2021 Article IV consultation with member countries on common Euro Area policies (IMF, 2022) advised that the design of the CBAM be given a careful consideration; its phase-in should be done in close collaboration with trading partners, and it could, over time, increasingly put more weight on actual embodied carbon content rather than relying on benchmark levels. The Fund should continue assessing the domestic effects and spillover of BCAs, green subsidies, and other measures through its multilateral surveillance and explore mechanisms to improve international cooperation.

63. Climate-related trade measures have started to be covered in bilateral surveillance as members have scaled up their climate ambitions and rolled out new policies. Furthermore, recent Article IV Staff Reports have discussed the spillovers of climate-related trade and subsidies policies on other countries. Under the ISD, fiscal measures such as BCAs and subsidies are subject to the Fund's bilateral surveillance (both their macroeconomic aspects and macroeconomically relevant structural aspects). As the climate-trade nexus is expected to be an active area for further policy developments in the coming decade, the IMF is ready to analyze domestic impacts, provide tailored policy advice bilaterally, consider possible spillovers in its multilateral surveillance, and propose policy alternatives.

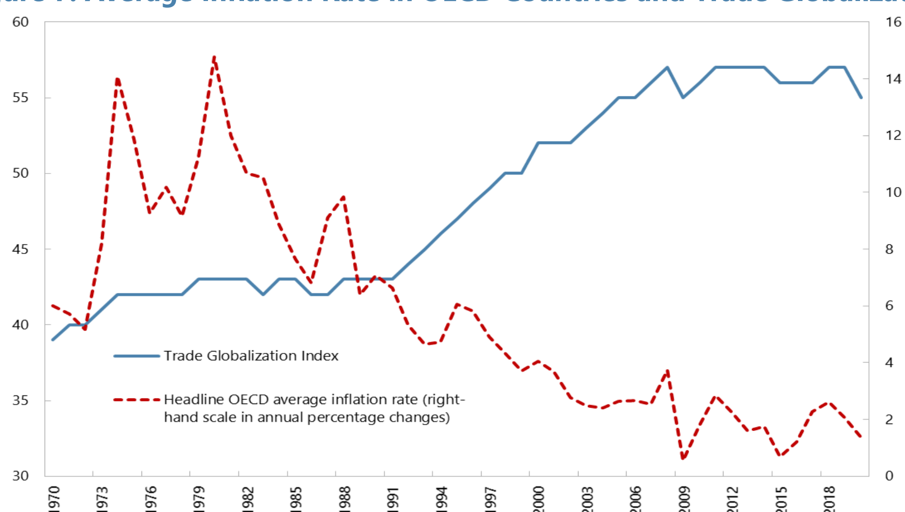
64. The Fund is well placed to contribute its unique expertise and macroeconomic perspective to joint efforts with the WTO and other IOs. Climate policies are multifaceted, and their success depends on international coordination. Methodological, measurement, and data challenges pose significant obstacles to implementation of BCAs, while the design of subsidies and related trade disciplines has clear macroeconomic ramifications. Addressing these data measurement and policy challenges cuts across the mandate of different international organizations and it is a clear area of cooperation between the IMF, WTO, WB, and OECD. In addition, IOs have a key role in using their convening power to facilitate dialogue and policy coherence and preventing and mitigating trade tensions that can emerge from climate policies.

E. Globalization and Inflation[39]

65. Persistent high inflation returned in 2022. Price pressures have largely been a global development with three main drivers: (i) pandemic-related supply chain disruptions, (ii) the extraordinary expansionary fiscal and monetary policy response to the pandemic, and (iii) energy and food price shocks amplified by the Ukraine war. These shocks were consecutive events that increased inflation rates to historical levels worldwide. All these events unfolded in the context of a global economy interconnected through trade and financial linkages, including highly integrated supply chains. This section takes a longer-term perspective on how the expansion of global trade has interacted with price pressures.

66. Over the past three decades, expanding trade and declining inflation have coincided. Achieving low and steady inflation (until recently) was primarily a result of evolution in monetary policy regimes. This said, trade liberalization increased international price competition between exporting firms, and greater participation of countries in global value chains led to a positive shift in the global labor supply (Lodge and others, 2021).

Figure 7. Average Inflation Rate in OECD Countries and Trade Globalization



Source: OECD main economic indicators and KOF Swiss Economic Institute.
Note: The KOF Trade Globalization Index is the average of a world de facto and de jure indexes. The former index is a weighted average of exports and imports of goods and services as a percentage of GDP and a measure of trade partner diversity. The latter index is composed by trade regulations, trade taxes, tariffs, and trade agreements.

- Attinasi and Balatti (2021) point out that trade globalization may have affected inflation in advanced economies by influencing the price and wage-setting mechanism of firms and workers, respectively. Thus, increasing trade integration with greater participation of low-cost

[39] Prepared by David Florián Hoyle.

producers in global production could have had some direct disinflationary effect. This effect works via lower imported inflation, but also through lower average markups of domestic firms in the face of tougher foreign competition. In the same line, Baldwin (2022) indicates the indirect impact of imported goods prices on domestic prices through various economic mechanisms ranging from the impact on price-cost markups, lower prices for imported intermediate inputs, and the impact of import competition on workers' wage bargaining power and thus wage hikes.

- The expansion of global trade integration through GVCs have been a dominant paradigm that have allowed greater efficiency in production. Attinasi and Balatti (2021) emphasize that involvement in GVCs could have further contributed to disinflationary effects. GVC participation could help to reduce inflation by exerting downward pressures on unit labor costs (through higher productivity and lower wage growth), particularly when low-wage countries are embedded in supply chains, and by increasing efficiency in production.

- Globalization also increased the role of international/global factors at the expense of internal determinants for domestic inflation dynamics. Indicators for global economic slack add considerable explanatory power to the performance of observed inflation across several econometric models (Borio and Filardo, 2007). Research points to co-movement of domestic inflation rates across advanced economies (Attinasi and Balatti, 2021). The ability of basic models to explain inflation dynamics is considerably improved by integrating global factors and enabling critical parameters to change over time (see Forbes, 2019). Put differently, globalization may have contributed to the "flattening" of the Phillips curve in many economies.

67. The empirical evidence shows mixed results regarding the contribution of globalization to inflation. Evidence on the impact of globalization over the long-run component of inflation has typically found to be significant but small, in part reflecting difficulties in measuring the various dimensions of globalization and the multiple channels through which globalization interacts with price pressures. However, recent evidence indicates a significant effect of globalization over inflation synchronization and a lower dispersion of inflation rates among advanced economies.

68. If the risks of geo-economic fragmentation materialize, monetary policy could need to maintain a contractionary stance for a longer horizon to help address high inflation. The mitigating effects of globalization on inflation could be somewhat reversed by geo-economic fragmentation. Some inflationary pressures would emerge as supply chains reconfigure, as temporary supply shortages could push up prices (Aiyar and others, 2023). These effects would complicate Central Banks' task of reining in inflationary pressures.

69. A forward-looking IMF trade strategy should acknowledge the potential inflationary consequences of deglobalization. Staff should continuously monitor the developments of GVCs, trade costs, and any major world trade disruptions and assess their spillovers. The Fund also should continue to look for ways of mitigating the effects of macro-critical price shocks—including those related to food and fuel prices—that have important impacts on much of the membership. Finally, the Fund should be clear about the risk of price pressures linked to the process of geopolitical fragmentation.

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