T20 Policy Brief

G20 BRASIL 2024

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Task Force 04

TRADE AND INVESTMENT FOR SUSTAINABLE AND INCLUSIVE GROWTH

Two Sides of a Token: How to Grow Investment into Digital Technologies, and Use Digital Technologies to Grow Investment

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Abstract

There is a need to enable foreign direct investment in the digital economy (known as 'digital FDI') to grow digital capacity and competitiveness. At the same time, new technology tools can help facilitate investment decision-making by both governments and firms (known as 'InvesTech'). Survey data of investors from Canada, China, India, Japan, the US, UK (all members of the G20), Azerbaijan, Estonia, Pakistan, and Rwanda has started to shed light on what enablers are most important to their decision to carry out digital FDI, and what InvesTech tools are currently seen as already useful, and which InvesTech tools may require additional support for their successful deployment and adoption. G20 policymakers may wish to ensure that priority enablers are present in their economies as well as those in important trading partners to facilitate digital commerce.

Keywords: Digital FDI, Digital Economy, Digital Commerce, Investment, Technology, Investech, Decision-Making.

Diagnosis of the issue

Growing foreign direct in the digital economy (digital FDI) is essential to help drive growth, competitiveness, and sustainable development, as digital FDI brings not only capital but also embedded knowledge and technology (Stephenson, 2020).

However, given rapidly evolving digital technologies, policy frameworks have not kept up with new opportunities and changing business models. There is a need to ensure that policies, regulations, and measures are up-to-date and fit-for-purpose to properly address and enable digital ecosystems and grow digital investment (Brende and Al Yahya, 2023).

Policies, regulations and measures to enable digital investment can take place across four pillars: (1) investment in digital infrastructure (e.g. data centers), (2) investment in new digital activities (e.g. start-ups); (3) investment in digital adoption by existing firms (e.g. edtech or medtech); as well as (4) investment that helps with internationalization, either through digital services exports or outward digital FDI (see Figure 1) (Stephenson et al., 2021).

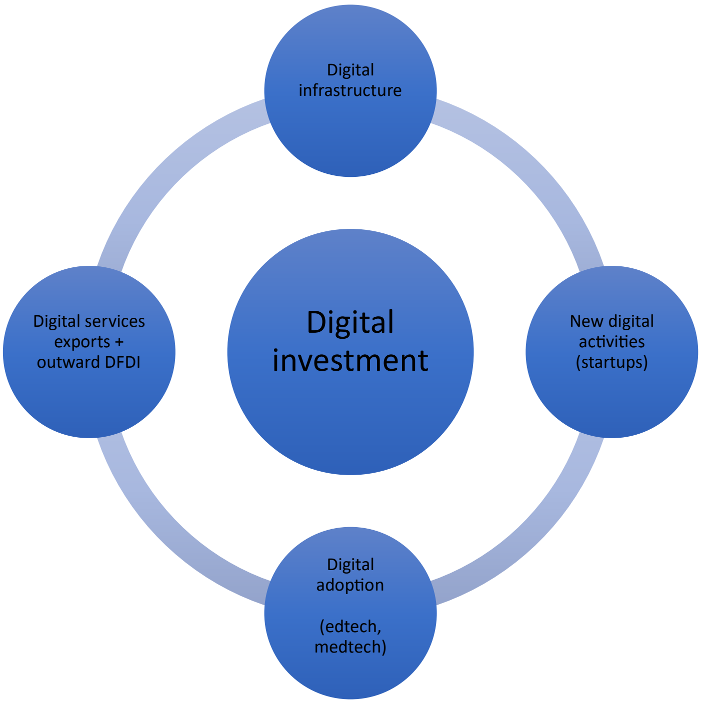

FIGURE 1. Four pillars to enable digital FDI

Source: Stephenson (2020), updated.

In each of these pillars, there are specific enabling policies, regulations and measures that can help create 'digital-friendly' investment climates and facilitate digital FDI.

Importantly, new survey data gathered between 2020 and 2023 has found convergence across different economies in what investors say are the top enabling policies, regulations and measures in each of these pillars. The data includes 614 observations across Canada, China, India, Japan, the US, UK (all members of the G20), Azerbaijan, Estonia, Pakistan, and Rwanda.[1]

[1] Survey data for all economies except Estonia was collected through a specialized survey firm using a questionnaire developed by the World Economic Forum and peer reviewed; in contrast, survey data for Estonia was collected through the Estonian Association of Information Technology and Telecommunications (ITL). Additional survey evidence is

These survey findings can help create a short-list of actions that G20 policymakers may wish to take create 'digital friendly' investment climates and in so doing grow investment in the digital economy, as these actions are most likely to increase investor interest and positive decision-making. The findings and short-list of actions are presented below (see Recommendations).

In addition, it is also important to reverse perspectives and consider how to use new technologies to facilitate investment, or 'InvesTech'.

InvesTech is the sibling of digital FDI. While digital FDI is about growing investment *in technologies* and the digital economy, InvesTech is about *using technologies* to grow investment.

Take AI, as an illustration. There is an opportunity to increase investment into AI, but there is also an opportunity to use AI to help make investment decisions, and thus increase investment. For example, AI could help with finding the right match between capital and project, or to carry out due diligence.

InvesTech – technologies to make investment decisions easier – is relevant across each stage of the investment lifecycle (see Figure 2). This includes initially (1) raising capital, then (2) investment attraction, (3) investment entry and operations, (4) investment aftercare, (5) investment linkages and spillovers, and finally (6) firm internationalization (either through exports or through outward investment, as in the fourth digital FDI pillar above).

In other words, InvesTech tools can be used by governments and firms across each stage of the investment lifecycle to facilitate investment decision-making.

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currently being collected of investors in Cyprus and Oman through a specialized survey firm.

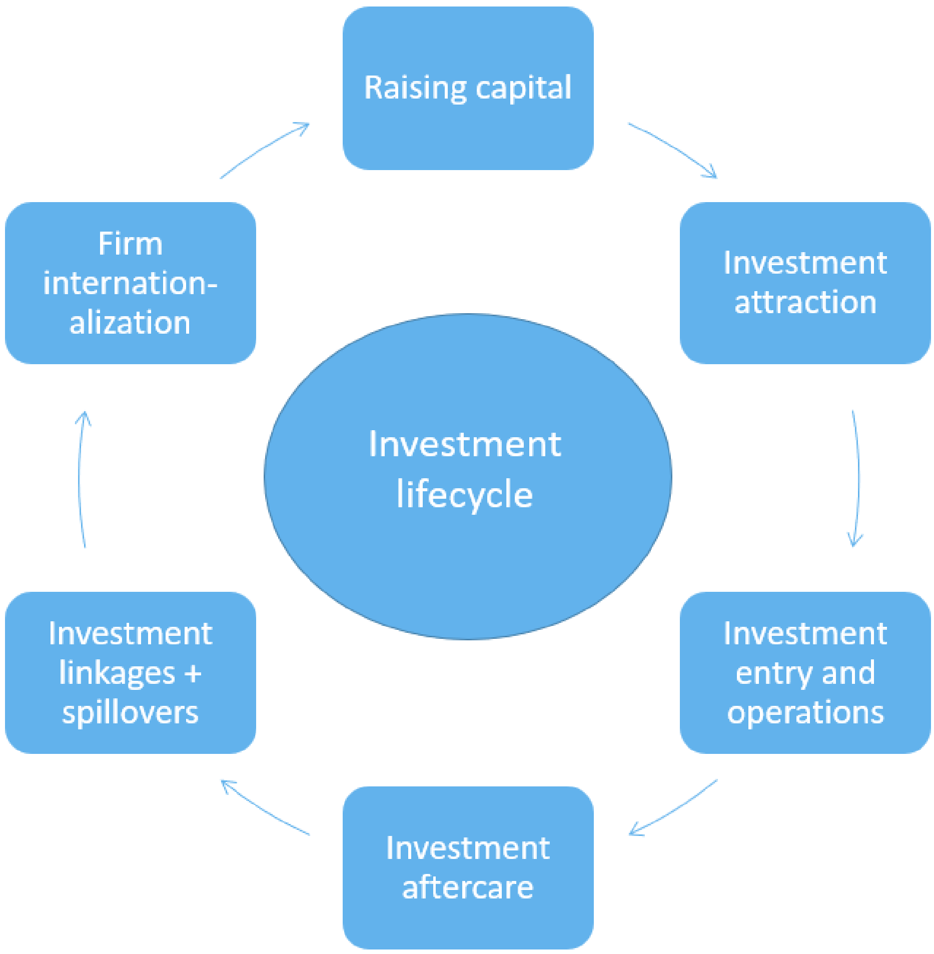

FIGURE 2. Investment lifecycle: six stages to use InvesTech tools

Source: Li and Stephenson (2024).

To provide one example, at the investment attraction stage, Invest Estonia's website has an electronic investment advisor named 'Suve' that provides semi-automatic replies to simple and complex investor queries, including tailor-made value propositions. To provide another example, this time at the investment entry and operations stage, Invest in Israel's website provides a short questionnaire that creates an investing manual tailored to the specific needs of the investor according to the company profile. The tailored investment manual provides the necessary information on registering the company, land tenure, building permits, business licensing, and operations as well as information on grants and benefits. The manual details the necessary steps and documents as well as the costs and time frame for each aspect of the investment process.

Importantly, digital FDI and InvesTech can be thought of together, as complementary efforts (see Figure 3). One pilot project to carry out both together is currently underway through the 'Investing in the Digital Economy of Azerbaijan' or IDEA project, so named with the hope that the project can lead to good ideas. Similar projects bringing together digital FDI and InvesTech could be considered by G20 policymakers in their own economies, or in those of important commercial partners to create enabling digital economies and thus drive two-way digital commerce.

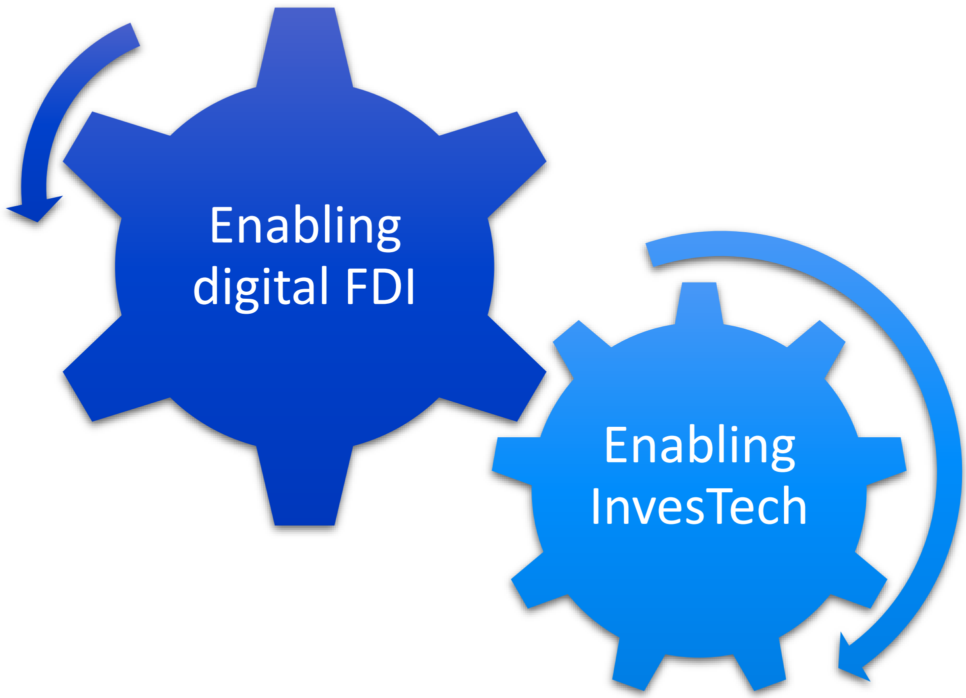

FIGURE 3. Growing digital commerce: interaction between digital FDI and InvesTech

Recommendations

This policy brief suggests recommendations in two subsections: enabling digital FDI and supporting InvesTech tools.

In terms of the former, G20 policymakers may wish to create 'digital friendly' investment climates by ensuring top enablers are present in their economies, while also supporting them in developing countries, important for G20 developing countries, among other.

In terms of the latter, G20 policymakers may wish to support the wider adoption and use of InvesTech tools that are relatively 'ripe', while at the same time encouraging the further development and deployment of InvesTech tools whose potential may yet to be fully realized.

I. Create 'Digital-Friendly' Investment Climates

A. Adopt priority enablers to grow investment in digital infrastructure

Policymakers may wish to consider adopting a number of priority enablers to grow investment in digital infrastructure, including, the level of connectivity (international, national, and urban), energy and power infrastructure, and 4G (or higher) mobile network coverage.[2]

[2] Digital infrastructure often requires public private partnerships and development banks to provide the significant capital needed for telecommunication and other forms of infrastructure.

These have been identified by what investors say is most important to them in terms of policies, regulations, and measures to enable digital FDI in infrastructure.

In Figure 4, within the green rectangle the red bars are those measures that are shared as priorities across different economies. These commonalities can potentially serve as emerging good practices to enable digital FDI into digital infrastructure.

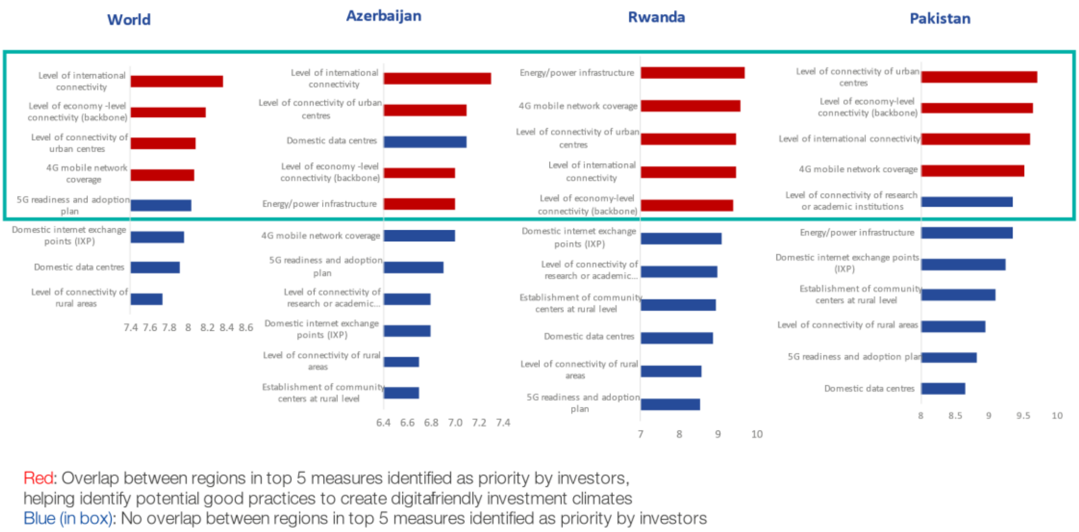

FIGURE 4. Importance for investing in digital infrastructure

Source: Stephenson and Li (2023)

B. Adopt priority enablers to grow investment in new digital activities

Similarly, policymakers may wish to consider adopting a number of priority enablers to grow investment in new digital activities, including, data and cyber security regulations, innovation policy and national security, effective IP protection and contract law, and ease of receiving licenses for digital activities (see Figure 5).

These have been identified by what investors say is most important to them in terms of policies, regulations, and measures to enable digital FDI in new digital activities, such as start-ups, and increasing capital for startups is a priority for G20 emerging and developing economies.[3]

FIGURE 5. Importance for Investing in New Digital Activities

Source: Stephenson and Li (2023)

[3] As with digital infrastructure, this may also benefit from public private partnerships and development bank support. One example from Brazil is BNDES's 'More Innovation' program (see https://agenciadenoticias.bndes.gov.br/detalhe/noticia/Programa-de-inovacao-e-digitalizacao-tem-aprovado-R$-5-bi-por-ano-do-BNDES/).

C. Adopt priority enablers to grow investment in digital adoption of incumbent firms

Similarly, policymakers may wish to consider adopting a number of priority enablers to grow investment in the digital adoption of incumbent firms, including the availability of e-payment services and digital ID, local digital skills development and IT solutions, the prevalence of e-government services, and low taxes on digital goods and services (see Figure 6).

These have been identified by what investors say is most important to them in terms of policies, regulations, and measures to enable digital FDI into the digital transformation of existing firms. Addressing these enablers will be important to support the digital transformation and catchup of lagging firms, both within and between G20 emerging and developing economies.

FIGURE 6. Importance for Investing in Digital Adoption of Incumbent Firms

Source: Stephenson and Li (2023)

In short, in the figures above within the green rectangle the red bars represent measures that are shared as priorities by investors across different economies. These commonalities can potentially serve as emerging good practices for G20 policymakers to create digital-friendly investment climates both within their economies and to support these enablers in other economies with which they wish to create stronger economic relations in terms of two-way digital commerce.

II. Support The Adoption Of Investech Tools

Moving to InvesTech, or technology tools that can be used to facilitate investment, results so far only exist for Azerbaijan, and so G20 policymakers may wish to run similar surveys in their own economies to understand where 'ripe' InvesTech tools may be ready to be further deployed, or where InvesTech tools may require further support and development for their potential to be fully maximized.

What is interesting is that across different sectors in Azerbaijan, the same technologies were found to be 'ripe', or those already being used relatively to other technologies to facilitate investment decision making.

In Azerbaijan, the technologies that investors think are already important to help with their investment decision-making are big data analytics, cloud computing, and digital payments, which are coloured red in Figure 7. Again, G20 policymakers may wish to ensure these tools are available and deployed in their economies, and also support their use in other countries if welcome and desired by these other countries, as the incipient evidence indicates that these are the current technologies that could potentially make a difference to investment decision making.

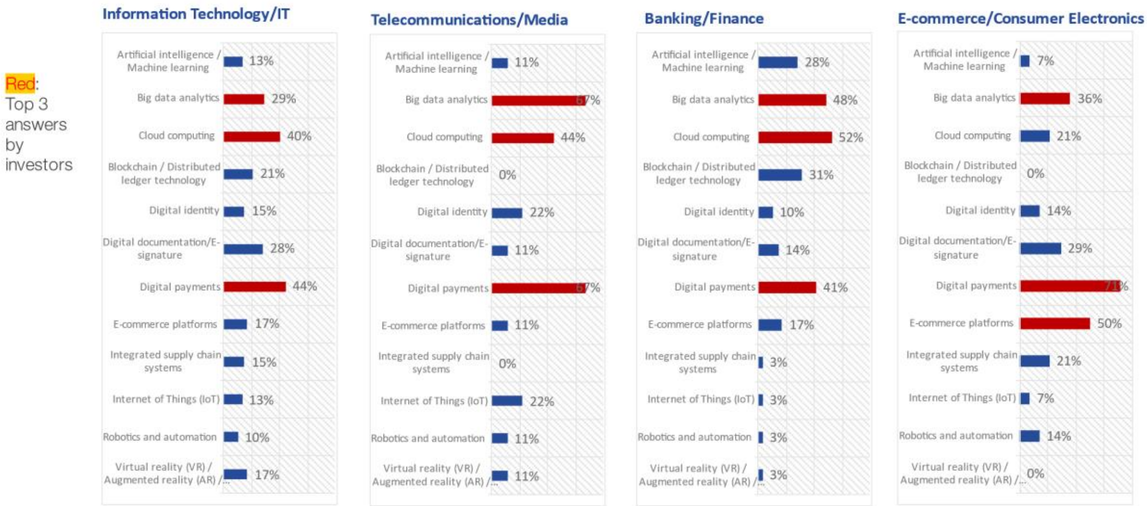

FIGURE 7. InvesTech tools being used to facilitate investment in Azerbaijan

Source: Stephenson and Li (2023)

These results are not surprising, as you need data to make good decisions, and you want to be able to move money around and get paid.

But what is interesting is that certain technologies, such as AI, are not yet viewed at the same level of importance. It shows where more work may be needed by G20 policymakers to support and enable the use of these technologies, such as AI, digital IDs, or blockchain.

As a result, a complementary research project is currently under way entitled ‘AI4AI’ or ‘Using Artificial Intelligence to Accelerate Investment’, which aims to be better understand exactly how AI can be deployed as an InvesTech tool across the investment lifecycle, and thus how AI can help to grow FDI.[4]

[4] The research project was commissioned by the World Economic Forum from the Geneva Graduate Institute, with results expected to be available towards the end of 2024, and could be shared with G20 policymakers thereafter.

Scenario of outcomes

Two scenarios illustrate the importance of taking the actions recommended above: a pessimistic scenario where the challenges are not addressed, and an optimistic scenario where the challenges are successfully addressed.

In the pessimistic scenario, policymakers do not put in place the right enablers in their economies to attract, facilitate, grow, and retain digital FDI, and thus fall relatively behind in their digital capacity and competitiveness. Similarly, they do not support the development and deployment of InvesTech tools, and thus fall relatively behind compared to economies that do so.

In the optimistic scenario, the full potential of digital FDI and InvesTech are realized through creating digital-friendly investment climates and through support for ripe and nascent InvesTech tools. This creates additional mechanisms to grow FDI flows, especially those that bring embedded digital knowledge and technology. New digital-related jobs are created, and new sources of growth and dynamism are uncovered.

In the optimistic scenario, the interaction and positive reinforcement of the twin-approaches of digital FDI and InvesTech are integrated, for instance through specific pilot projects in G20 economies to bring the two together. This generates additional benefits beyond the individual benefits of the separate approaches.

G20 policymakers may therefore with launch projects to grow digital commerce in their economies and those of important emerging market economic partners, through understanding – and deploying – findings on how to grow digital FDI and leverage InvesTech tools in each economy.

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