digital square

Digital Square Strategy

2023

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Introduction

In this document, Digital Square outlines the vision, theory of change, and role of the initiative to increase understanding of *why* Digital Square exists and *how* Digital Square works. This strategy is for partners within the digital health community, both those who are already working with Digital Square and those who are interested in further understanding the initiative's role within the sector. The strategy is designed to build a common framework for Digital Square and its partners and to provide transparency into the motivation and goals of the initiative.

Digital Square was created in 2016 to help improve alignment and reduce barriers to digital transformation by being a neutral convener of actors across the digital health landscape. In our six years of operation, Digital Square has supported donor alignment, directed funding to global goods, and supported country leaders as they worked toward digital transformation in their country.

In 2022, the Digital Square team reflected our implementation experience and embarked on an exploratory qualitative research process (March to May 2022) that solicited information from key Digital Square stakeholders on the initiative's assets, roles, and growth opportunities. After six years of operation, our goal was to understand how the ecosystem of digital health had changed and how Digital Square could continue to support the community. After interviewing 73 individuals, the following recommendations emerged about existing needs in the global digital health ecosystem:

- Local ownership is critical to ensure appropriate and equitable digital transformation; new partnerships and capacity strengthening is necessary to support local ownership and long-term sustainability.

- Building an ecosystem of choice will support the localization of digital health.

- Extending Digital Square's technical expertise to advise on software, content, and services will further promote a global commitment to open standards and open architecture as country decision-makers utilize global technical guidance to inform their choices.

These key needs were incorporated into our yearly strategy revision process. To continue our commitment to serving our wider community, the 2023 Digital Square Strategy pivoted our efforts toward increased localization, and this focus is reflected throughout this document.

Digital Square's vision

Building a more equitable world

DIGITAL SQUARE ENVISIONS A WORLD WHERE THE APPROPRIATE USE OF DIGITALLY ENABLED HEALTH SERVICES CLOSES THE HEALTH EQUITY GAP.

Digital Square is working to create a world where individuals have the information they need to manage their health and know when and where to seek professional care. Where health worker shortages and medical stockouts no longer plague health systems. Where governments and private health care providers deliver efficient, high-quality health services, affordably extending coverage to everyone. Where governments have the information needed and are empowered to better allocate their resources, both financial and otherwise, ensuring health systems meet the needs of communities. Where families are not mired in poverty from their health bills and where health innovations no longer take 20 or more years to cascade from the earliest adopters to widespread use.

Digital health innovations are increasingly disrupting the health sector in high-resource countries by delivering services that transform the quality and length of life. In some communities today, individuals manage their wellness via smartphones and wearables that track critical health metrics and provide insights that strengthen nutrition, mental well-being, and care-seeking decisions. Health care providers use robust, individual-level information captured in electronic health records to customize care. Groundbreaking medical innovations—like cancer treatments that are tailored to specific genomic profiles by machine learning and cloud processing—are transforming the way diseases are treated. Digital health is an amplifier, but these innovations risk widening the gap in health equity if access is not universal. It is up to us—the global community—to ensure that the power of digital health moves health equity forward.

Taking stock of where we are

Despite extraordinary gains in health equity since the 1990s, disparities caused by social, economic, and geographic forces remain.[i] Digitally enabled health services have the potential to close this gap by overcoming these equity barriers.

While digital technology can improve health outcomes, particularly in low-resource settings, a fragmented landscape of actors and interests working to implement digital health solutions can lead to a lack of coordination, waste, and unrealized benefits.

– National Academies of Sciences, Engineering, and Medicine:
Using Technology to Advance Global Health[ii]

Country and regional leaders face barriers to the digital transformation of health systems

In 2018, the World Health Organization (WHO) member states unanimously passed the [Resolution on Digital Health](), demonstrating interest in and commitment to the digital transformation of health systems. **Digital transformation** refers to the strategic architecture and integration of digital technologies and associated change management capabilities to strengthen systems, increase their efficiency, and improve the quality of and access to services.

However, countries with fewer resources face a particular set of challenges in this transformation—some have inadequate infrastructure and capacity to use and maintain digital health interventions, or they lack policies and governing bodies to protect populations from misuse of digital health interventions.

Even when these foundational building blocks are in place, providers of health services struggle to identify and pay for high-quality digital health products and services that meet local needs and are affordable at scale. On the implementation side, many investors and service providers look for opportunities to "leapfrog" existing processes, but these opportunities tend to be risky and rarely appropriate for resource-constrained contexts. On the software side, investors have shied away from funding core software product development. Without a deep technical knowledge of computer science or the ability to rapidly evaluate early successes, traditional global health investors are uncomfortable with the high up-front expenditure and level of risk. The digital health community has struggled to articulate why digital health software, content, and service development is a key enabler for health impact, particularly to those investors with a more traditional health focus. Additionally, the cross-sectoral benefits of investing in digital health, from supporting economic livelihood through timely digital payments to the health workforce to generating information to inform infrastructure investments, are rarely acknowledged, much less quantified.

Digital health must be an integral part of health priorities and benefit people in a way that is ethical, safe, reliable, equitable and sustainable… with transparency, accessibility, scalability, replicability, interoperability, privacy security, and confidentiality.

– World Health Organization Global Strategy on Digital Health 2020-2025[iii]

To unlock the full value of digital technologies, increased attention to and investments in the human, institutional, and policy and regulatory enabling ecosystems are required.

– USAID: Fighting Ebola with Information[iv]

Many pilots are not followed by full-scale implementation due to a lack of sustainable financing, high risks for individual stakeholders and long time-to-market for commercial solutions.

– GSMA: Scaling Digital Health in Developing Markets[v]

As a result, the story of digital health continues to contain failed pilots, unscalable solutions, privacy violations, and short-lived ideas, which have created skepticism and resistance to digital health interventions.

DIGITAL SQUARE HAS IDENTIFIED FOUR BARRIERS WHERE IT CAN HAVE THE MOST INFLUENCE:

1. Inadequate alignment of actors pursuing the digital transformation of health around country priorities and needs, which leads to large inefficiencies in digital health investments and an unclear financial model of what is affordable and sustainable for countries, populations in low-resource settings, and the global development community.
2. Insufficient investment to scale digital health innovations beyond the initial stage to mature them into global goods and adapt them to emerging standards, resulting in loss of trust from countries when tools are unable to replicate small-scale successes at scale.
3. Country health leaders' demands for information, knowledge, and skills not being met, especially as they relate to technical information asymmetries, leading to misalignment around national digital health strategies.
4. Inadequate government and community authority over the digital transformation of public health systems, from roadmap development to implementation, resulting in weak political, technical, and financial support.

There are many barriers to the equitable use of digitally enabled health services. From access at the individual level, to domestic financing at the national level, to fragmentation and misalignment at all levels—these barriers collectively hinder efforts to improve health in marginalized communities. Fundamentally, communities and the governing bodies that represent them have not historically had adequate decision-making authority over the digital transformation of their health systems—as financial drivers, epidemic challenges, and donor priorities continue to sway these decisions. This has resulted in misalignment between product offerings, needs, and long-term willingness to support transformation efforts politically, technically, and financially.

These barriers prevent the long-term success of strong digital health systems and the effective use of data for national and subnational decision-making. By addressing these barriers, Digital Square contributes to global efforts to strengthen health services to achieve health equity, universal health coverage, and the Sustainable Development Goals. Digital Square partners with WHO, United Nations Children's Fund (UNICEF), United Nations Development Programme (UNDP), Digital Public Goods Alliance (DPGA), International Telecommunication Union, and other interested multilateral agencies to address key strategies identified in fundamental global digital health agendas, such as the WHO Global Strategy on Digital Health and the USAID Digital Health Vision.

Digital Square's theory of change

The Digital Square theory of change (Figure 1) explains the core activities of the initiative and how these activities contribute to improved health systems and health outcomes. The theory of change illustrates the value proposition of digitally enhanced health care and Digital Square's contribution to that value proposition.

Digital Square brings partners together to improve how the global community designs, uses, and pays for digital health tools and approaches. In response to the critical barriers (explained in the previous section), Digital Square's work focuses on three key areas: alignment and co-investment, the global goods ecosystem, and country digital transformation.

Alignment and co-investment

Better alignment and co-investment in the digital health sector supports a healthy marketplace of digital health tools and approaches that can be sustained while maximizing the impact of every dollar spent to improve health equity.

To improve alignment and co-investment, Digital Square:

- Cultivates partnerships to work toward a shared digital health vision aligned to country needs and priorities.

- Aligns and co-creates investments by identifying promising investment opportunities, providing operational support to streamline procurement, and using coordination and pooling mechanisms to defragment investments and to catalyze new investors and investments in global digital health.

- Generates a common evidence base to remove information asymmetries and improve the ecosystem's understanding of the value of digital transformation.

- Advances advocacy and communications on digital health to reach all actors in the ecosystem in support of country-led investments.

- Disseminates market analyses and benchmarking tools that support country-directed planning to finance digital transformation efforts.

Global goods ecosystem

Global goods are adaptable, interoperable, open source software, content, or services designed to meet the data and management needs of country health systems. Digital Square promotes the development, adoption, and reuse of digital public goods for health, with a particular focus on mature open source global goods and supporting an ecosystem of interoperable, standards-based technologies.

To strengthen the global goods ecosystem, Digital Square:

- Diversifies the ecosystem by engaging and supporting local digital health entrepreneurs to provide localized digital solutions.

- Administers a transparent, inclusive procurement process to allocate global goods investments with community input and provides technical oversight on those investments.

- Connects and manages the global goods community to support learning and sharing and to improve connections with country efforts.

- Advises on standards development and technical ecosystem design which provide the foundation for mature global goods.

Country digital transformation

Governments are leading digital transformation of public health systems at regional, national, and subnational levels. Long-term sustainability requires new approaches, skillsets, and resources within health systems, which requires countries to support strategic, technical, and operational capacity.

Digital Square helps elevate country priorities and strengthen regional and national capacity.

To support country digital transformation, Digital Square:

- Provides technical assistance to regional and country digital health leaders to lead digital health transformation.

- Supports the maturation of local markets and health systems to sustain global goods for localized adoption, adaptation, and use.

- Diversifies the ecosystem to offer more locally relevant and sustainable technologies, services, and support, including mobilizing partnerships with local software development organizations.

- Strengthens the capacity of health leaders and local software development, implementation, and support organizations through technical assistance, training, guidance, and organizational development.

Collectively, these key areas address barriers to the equitable use of digitally enabled health systems and services. Figure 1 shows them in a circle because they are synergistic and mutually reinforcing.

Principles

Surrounding the circle in Figure 1 are a core set of principles that underlie and drive Digital Square's work. These are:

- *Ecosystem of Choice* – supplying decision-makers with the information needed to make informed choices about products, tools, capabilities, and services.

- *Open Standards* – promoting a commitment to open standards and open architecture.

- *Community and Country Sovereignty* – supporting local ownership and decision-making to facilitate long-term sustainability of digital transformation.

- *Agile and Iterative* – adapting our implementation approaches based on learning what works (or doesn't work) and being responsive to the changing ecosystem.

- *Inclusive and Transparent* – diversifying our governance structures to redistribute decision-making power and creating more inclusive, transparent processes.
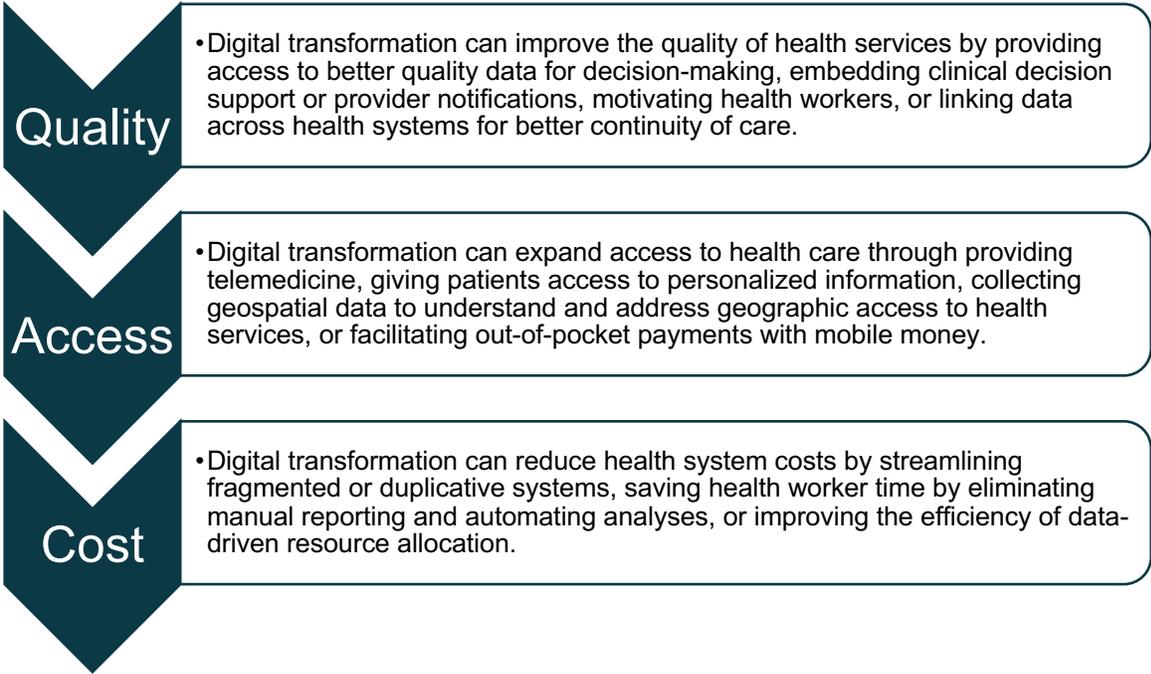
These principles uniquely distinguish Digital Square within the digital health ecosystem. In addition to these, Digital Square supports and adheres to our community's principles, including the Principles for Digital Development and the Health Data Governance Principles.

Outcomes and impact

By addressing critical barriers in the digital health ecosystem, Digital Square is improving alignment and co-investment, strengthening the global goods ecosystem, and advancing country digital transformation.
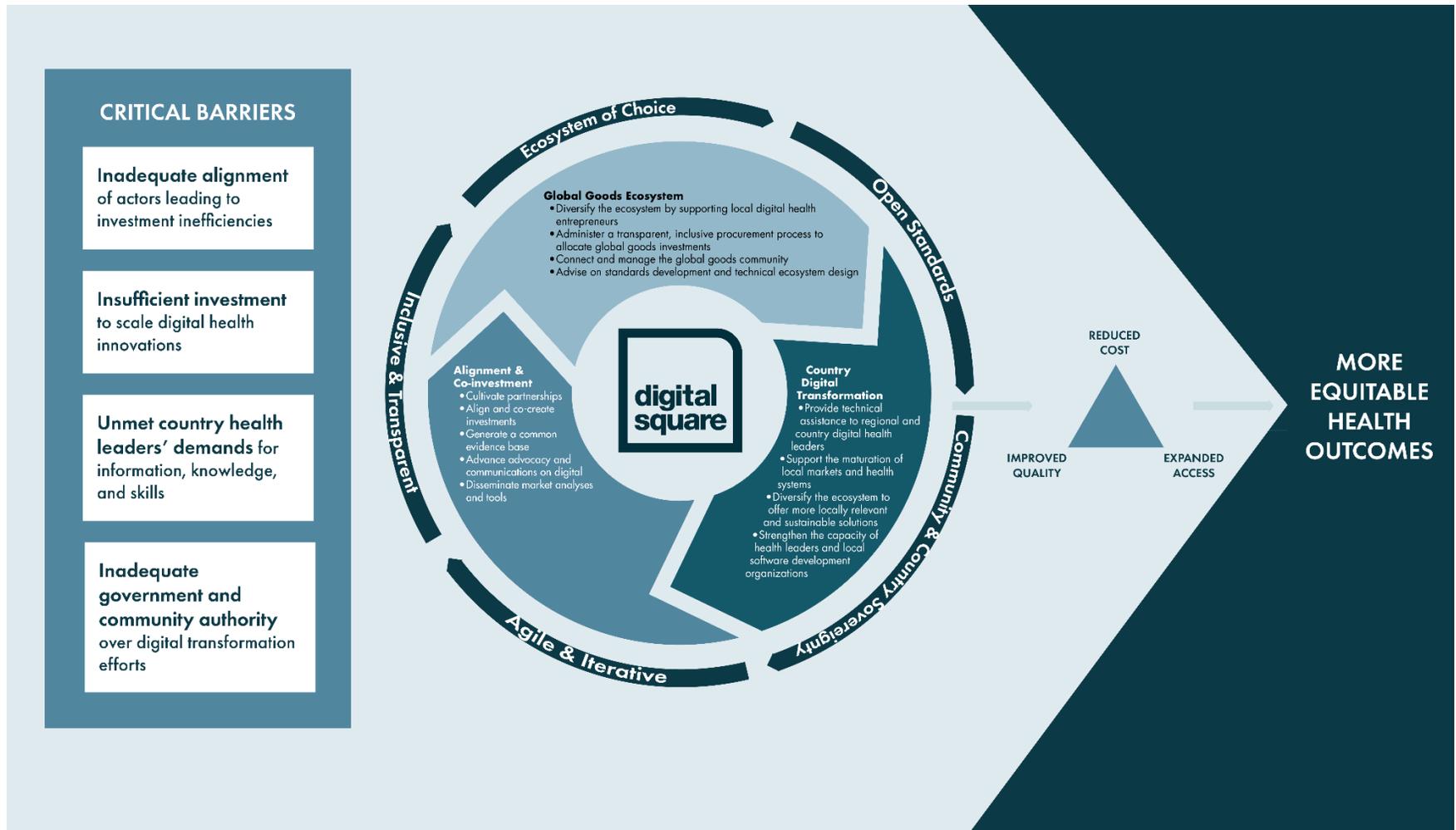
If country health leaders have the resources necessary for digital transformation, and can successfully execute and sustain digital transformation, we expect to see improvements in health systems results.

We can think about health systems results related to cost, quality, and access. This triad of quality, access, and cost, is known as the "Iron Triangle" of health care, a phrase coined by William Kissick in 1994. Kissick asserts that quality, access, and cost, quality, and access are interconnected and competing legs of a triangle. There are tradeoffs in improving any one leg of the triangle, and hence it is an "iron" triangle where all three legs cannot be improved simultaneously. However, digital transformation has the potential to break the iron triangle.

Quality
- Digital transformation can improve the quality of health services by providing access to better quality data for decision-making, embedding clinical decision support or provider notifications, motivating health workers, or linking data across health systems for better continuity of care.

Access
- Digital transformation can expand access to health care through providing telemedicine, giving patients access to personalized information, collecting geospatial data to understand and address geographic access to health services, or facilitating out-of-pocket payments with mobile money.

Cost
- Digital transformation can reduce health system costs by streamlining fragmented or duplicative systems, saving health worker time by eliminating manual reporting and automating analyses, or improving the efficiency of data-driven resource allocation.

If there are improvements in health system results and service delivery, then we expect to see corresponding improvements in population health. By focusing on countries and communities with lower digital health maturity, Digital Square is contributing to more equitable health outcomes.

Figure 1: Digital Square's theory of change

CRITICAL BARRIERS

Inadequate alignment of actors leading to investment inefficiencies

Insufficient investment to scale digital health innovations

Unmet country health leaders' demands for information, knowledge, and skills

Inadequate government and community authority over digital transformation efforts

Ecosystem of Choice

Open Standards

Inclusive & Transparent

Agile & Iterative

Community & Country Sovereignty

Global Goods Ecosystem
• Diversify the ecosystem by supporting local digital health entrepreneurs
• Administer a transparent, inclusive procurement process to allocate global goods investments
• Connect and manage the global goods community
• Advise on standards development and technical ecosystem design

Alignment & Co-investment
• Cultivate partnerships
• Align and co-create investments
• Generate a common evidence base
• Advance advocacy and communications on digital
• Disseminate market analyses and tools

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Country Digital Transformation
• Provide technical assistance to regional and country digital health leaders
• Support the maturation of local markets and health systems
• Diversify the ecosystem to offer more locally relevant and sustainable solutions
• Strengthen the capacity of health leaders and local software development organizations

REDUCED COST

IMPROVED QUALITY

EXPANDED ACCESS

MORE EQUITABLE HEALTH OUTCOMES

Digital Square's role in the digital health sector

Digital Square is a digital health marketplace where supply and demand come together to accelerate health equity through the development, adoption, scale, and delivery of digital health innovations and the advancement of globally recognized performance, implementation, and policy standards for use in low-resource settings.

Vision

A world where the appropriate use of digitally enabled health services closes the health equity gap

Mission

Connect health leaders with the resources necessary for digital transformation

Digital Square plays a unique role: creating a platform where *all* voices in the digital health sector can be heard and where investment, innovation, and impact can be better aligned. The initiative helps government leaders, investors, decision-makers, and innovators learn about high-quality, open standards and open architecture–based, trustworthy digital health tools that are appropriate for low-resource settings. Government leaders and other decision-makers can access opportunities to grow their digital skills and strengthen their digital procurement processes through professional networks, workshops, and certification programs. Innovators can design solutions using open standards and clearly documented business and technical requirements specific to low-resource settings, ensuring the adoption and use of globally recognized standards for policy, data privacy and security, and secure the financing needed to meet those requirements. Finally, Digital Square's investors achieve a double bottom line on their investment—they give communities faster access to digitally enhanced health care and open new markets for existing digital health software, content and services.

Our increased emphasis on localization means working as one entity with local experts and networks as regional hubs across continents to expand on proven best practices and standards to improve population health in low- and middle-income countries worldwide (see Figure 2 below). Strengthening capacity and engaging experts in knowledge sharing practices between hubs will expand an ecosystem of choice that elevates country sovereignty and sustainability by design, empowering local entrepreneurs and implementers.

Figure 2: Global Digital Square
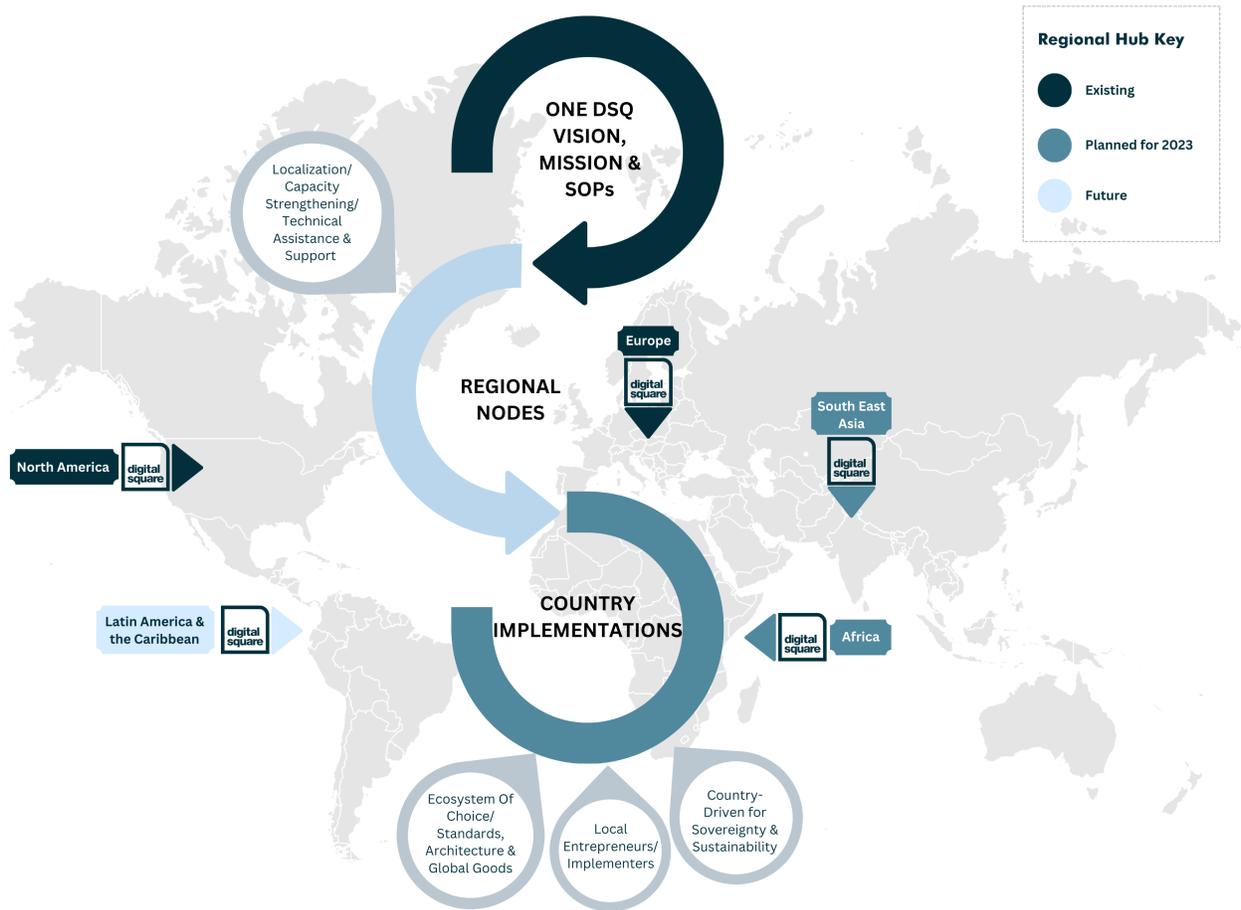
This new globalized Digital Square will be reflected in Digital Square's three primary result areas —Alignment and Co-investment, Global Goods Ecosystem, and Country Digital Transformation. Our new strategy encompasses what success looks like for each result area, places where Digital Square provides a unique value add, activities Digital Square does not carry out directly and instead leverages partnerships or supports work of our partners to carry out, priorities of the initiative for 2023, and learning questions that will continue to shape these priorities. Though our successes are outlined by result areas, this strategy at its core aims to illustrate the importance of working together, both within Digital Square and in the ecosystem. Internally, Digital Square plans to build linkages across the organization to enable a feedback loop that supports country governments. Collectively, our efforts will pivot our ecosystem toward responsive listening to communities and country governments as they define their own digital health needs.

Alignment and co-investment

DIGITAL SQUARE HELPS TO IDENTIFY PROMISING INVESTMENT OPPORTUNITIES AND PROVIDES OPERATIONAL SUPPORT TO STREAMLINE PROCUREMENT.

Successful alignment includes:

• Donors aligning and allocating funds in line with countries' articulated needs and priorities.

• Partners working toward a shared digital health vision and a shared approach to developing and executing technical scopes of work that respond to country priorities and needs.

• Country governments and donors coordinating investments that will facilitate accessible, sustainable implementation in digital tools and approaches to improve health.

• Investors working directly with countries to prioritize country-led approaches and country-based entrepreneurs, developers, and implementers.

• Investors using coordination and pooling mechanisms to defragment investments intended to scale digital health interventions.

• Investors supporting national digital health strategies, as stated in the Principles of Donor Alignment for Digital Health.

To achieve this alignment, Digital Square will continue to:

• **Generate a common evidence base.** The initiative leverages our more than 140 active stakeholder relationships to identify information asymmetries that prevent alignment or erode trust. We inform the knowledge base by building on existing ecosystem information and filling gaps that can quickly influence how information is used to inform and scale digital implementation. We collate evidence—including evidence generated through our own work—to improve the ecosystem's understanding of the link between digital transformation and health impact.

• Convene country leaders, donors, and ecosystem stakeholders **to advocate** for **direct funds according to countries' articulated needs and priorities**. As a trusted, neutral convener of these groups, we amplify country leadership by providing a forum to define their needs and priorities and therefore help donors and partners meaningfully direct funding in the digital health space, whether that be digital health investment decisions or line items in national budgets. We also facilitate connections for learning through cross-donor engagement on technical topics aligned with country needs; learning among technical partners to enable interoperable, robust digital tool functionality; and network learning to facilitate regional and global knowledge exchange.

• **Accelerate digital advocacy.** Digital Square tracks and aligns our work with global policies, guidance, and frameworks and advocates for our investors, implementing partners, country counterparts, and the broader community to do the same. We align funding around sustainable, accessible technologies that will support countries today and in the future. Digital Square works with nontraditional partners to increase the available digital

technologies and approaches in low-resource contexts. Digital Square engages in targeted advocacy efforts to encourage new investors to support digital health.

- **Align and co-create investments.** Above all, Digital Square leads coordination and alignment efforts in response to articulated country choice and leadership. We coordinate with investors to align investments to best practices—such as investments in technologies adhering to open standards. We work with countries to align implementation of activities across donors, reducing duplication and fragmentation to facilitate faster scale of digital technologies. We convene donors and partners to co-create investments, emphasizing how co-investment enables efficiencies in spending, and leverage financing—including in-kind investments—that will accelerate country digital transformation.

- **Execute with operational excellence.** Digital Square has invested in a strong technical team and the infrastructure within our initiative to facilitate robust procurement processes that yield high-quality investment opportunities. In particular, the Open Application Process (OAP) has incorporated significant transparency, technical expert review, and agility in both the application and implementation phases. Digital Square now utilizes an external automated application management system, which further improves the agility—as well as transparency and flexibility—of the solicitation and evaluation processes. The initiative balances this approach with the rules, regulations, and requirements of a variety of investors, using more than 42 years of operational experience and infrastructure from our host organization, PATH. Digital Square offers multiple ways of coordinating investments to make coordination easier for investors—spanning from pooled procurements to discrete investments against a common work plan. This investment process also applies at the country level as we support country governments in their own procurement processes.

- **Govern with an ethos of inclusion and transparency.** Digital Square's governing processes are transparent. Its governing bodies are representative of the ecosystem's diverse stakeholders. And, every year, it progresses toward decision transparency. Digital Square serves as the secretariat for multi-stakeholder coalitions and serves as a neutral, trusted partner with no vested interest in a specific aspect of the market.

- **Provide technical assistance and advocacy support to community-supported open standards and policies.** Digital Square works with normative bodies, such as WHO, Open Health Information Exchange (OpenHIE), Health Level Seven International (HL7), and International Organization for Standardization's Technical Committee on health informatics (ISO TC215) that create policies, principles, guidance, and technical and data standards. We provide technical assistance to support the development and adoption of these important resources, including conducting technical reviews, providing templates on standard and internationally recognized policies for digital health, and supporting costed roadmaps to enable adoption. For resources that have community support, Digital Square advocates for aligning and adopting these resources across actors in the ecosystem.

- **Prioritize the supply of unrestricted funding to institutionalize global goods,** where our resources allow**.** Our strategy research and our observations illuminated the need for funding to maintain and implement the ongoing evaluation of global goods as well as continuing to align our processes with the broader digital public goods ecosystem. To respond to market demands, the supply of global goods needs continued support, ensuring the core components of software, content, and service global goods are robust and interoperable and able to align with country digital health architectures. Digital Square also aims to support the global goods community through creation and institutionalization of a global goods innovators summit.

Building on these core activities, Digital Square will place increased focus on the sustainability of digital health ecosystems and country-led engagement and therefore will:

- Advance **advocacy and communications.** Accelerate advocacy with donors and partners to position country needs and priorities first and facilitate improved processes and systems to support country-driven investments. Elevate communications to create more content specifically including country voices and the global goods ecosystem. Explore innovative avenues and creative mediums to improve how we share messages and advocate for country needs. Expand communications to develop more content for all actors in the digital marketplace and enabling policy environment including materials in multiple languages.

- Disseminate **market analyses** and benchmarking tools to support more open, transparent, country-led planning around the financing of digital transformation efforts. Prioritize increasing the evidence base for digital health. Integrate robust monitoring, evaluation, and learning approaches into our work to generate evidence of the impact of digital interventions. Foster more cross-learning and sharing across stakeholders with an emphasis on learning from local implementation experience. Ensure we are adapting our work based on our learnings, and document and share what works (or doesn't work) to support country digital transformation with the digital health community.

These efforts will be further augmented by the sustainability and localization of global goods (see Global Goods Ecosystem) and the expansion of donor funding pools into regional hubs and expansion of learning-sharing networks (see Country Digital Transformation). Understanding what Digital Square does not do is just as important as understanding what Digital Square does. Digital Square does not:

- **Ratify policies, guidance, or principles.** Digital Square may support normative agencies, serve as the secretariat, participate in multi-stakeholder coalitions, or develop content, but *Digital Square is not a normative agency and we do not ratify policies, guidance, or principles.*

- **Conduct organization-specific fundraising.** Digital Square does not exclusively or inequitably fundraise for a specific partner or singular/specific digital product, as that would compromise the initiative's neutrality, which is one of its core tenets. Digital Square *will* work with our partners to identify the closest "match" between investor strategies and funding needs within the Digital Square portfolio, as well as advocate for investments that have been approved by the Digital Square Board.

- **Engage in misaligned work.** Digital Square does not engage in work that is misaligned with country health or digital health priorities, or misaligned with global principles, strategies, and approaches, such as the Principles for Digital Development and the Principles of Donor Alignment for Digital Health.

Digital Square priorities

Digital Square has identified measurements that indicate progress toward increased alignment and co-investment in the digital health sector, as outlined below.

Alignment around high-priority themes
High-priority themes for improved alignment and coordination in the digital health community via evidence generation and dissemination.

2018-2020 (achieved)	2021 (achieved)	2022 (achieved/in progress)	2023 (target)
• Principles for Digital Development • Principles of Donor Alignment for Digital Health. • SDG3 Global Action Plan—digital and data accelerator. • UN report on digital cooperation • *Value of Co-Financing.* • Value of global goods, interoperability, standardized data models in the COVID-19 response. • *Digital Square Strategy* • Industry-level market analysis for digital health	• Coordination with WHO Clearinghouse and DPGA on global good "vetting" • Expansion of market analytics: Return on investment and total cost of ownership • Technical roadmap for global goods investments • Success stories/impact narratives • Digital investments in COVID-19 response	• Alignment of global goods and digital public goods language • Total cost of ownership tool to support country digital health planning. • Expanded cost outcome research evidence to support go/no-go investment decisions • Communications to connect our work with insights and impact • Digital Square theory of change more directly linked to our learning agenda. • Unique Digital Square mechanism for co-investment elevated among donors focusing on global goods, regional/country support, and/or capacity building activities for countries and regions	• Sustainability and localization of global goods (see Global Goods Ecosystem) • Expansion of donor funding pools into regional hubs and expansion of learning-sharing networks (see Support for Country Leaders) • Enabled by donor alignment, countries operate in a supportive environment that enables their digital priorities be supported and promoted • Healthy digital health markets including open source and proprietary tools are supported by the private sector and donor communities • A growing evidence base for the impact of digital health systems helps to inform and shape the accessibility of tools for countries at different levels of the health system

Long-term target
• Alignment on how to create a self-sustaining market for digital health products in low-resource settings.

Outgoing investment disbursements for Alignment and Co-Investment in US dollars
Funds disbursed to partners for *Alignment & Co-Investment* since 2016.

Since 2016 *(achieved)*

$2,024,679 disbursed out of
$2,569,068 committed

Increased investment

Amount of direct investment into digital health through the Digital Square mechanism.

2018 (achieved)	**2019** (achieved)	**2020** (achieved)	**2021** (achieved)	**2022** (achieved/in-progress)	**2023** (target) $25M-$30M
$11.8M	$20.3M	$20.2M	$25.2M (of $25M–$35M target)	$25.2M (of $25M–$30M target)	**2023** (stretch target) $40M-$50M

Long-term targets *(pending further learning; see learning questions)*
- $2B per year for global, regional, and country initiatives for digital transformation of health systems.
- At least $200M per year invested through Digital Square to support specific aspects of digital transformation where the mechanism adds value.

Active investors

Active investors in Digital Square.

2018-2022
(achieved)

15 unique investors

2023
(target)
- 8 renewed investors
- 3 new investors

2023
(stretch target)
- 2 new private sector investors (in-kind or cash investments)
- Secure $500K USD for annual refresh of global goods and support participation in GGIM event
- Secure $1M for Notice cycle funding
- Establish tracking for in-kind investment from donors

Long-term targets
- 75% of signatories (~25 donors) of the Principles of Donor Alignment for Digital Health invest in Digital Square, *assuming Digital Square continues to add value to specific aspects (but not all aspects) of digital transformation efforts.*
- 100% of Digital Square investors actively coordinate together on digital transformation investments and continue routing funding through a shared mechanism.

Active partners
Active Digital Square partners.

New indicator for 2023

Number of Digital Square partners, by partner type/category

2023
(target)

- Create comprehensive partner mapping and define partner types/categories
- Expand and diversify R2 partner organizations to promote localization
- Coordinated and documented alignment with UN Agencies including WHO, UNICEF, Global Fund, Gavi, DIAL, UNSG, UN Global Pulse, ITU and UNDP
- Strengthen partnerships with global initiatives/coordinating bodies that Digital Square engages with to promote coordination and alignment
- Foster partnerships with cross-sectoral digital partners such as Co-Develop to solidify alignment for digital health
- Engage in strategic partnerships for advocacy

2023
(stretch target)

- Formalize partnership with Co-Develop and/or other partners working in digital public infrastructure

Long-term targets
- Establish formal partnerships with global coalitions to synergize and accelerate respective initiative goals and implementation
- Align investments and implementations across partners for efficient global coordination of digital health transformation in countries, clearly defining Digital Square's role.

Global goods ecosystem

DIGITAL SQUARE PROMOTES THE DEVELOPMENT, ADOPTION, AND REUSE OF GLOBAL GOODS AND HELPS INCREASE THEIR AVAILABILITY, ADAPTABILITY, AND MATURITY.

Digital Square promotes the development, adoption, and reuse of digital public goods for health, with a particular focus on open source global goods and supporting an ecosystem of interoperable, standards-based technologies. Digital Square supports investments and creates a market for these global goods by:

- **Diversifying the ecosystem by supporting local digital health entrepreneurs.** Digital health global goods are available at a high level of maturity to low-resource countries, providing an affordable foundation that in-country entrepreneurs and/or governments can adapt and use. More country governments are demanding localized solutions and local partnerships in their health system digital transformation efforts. Digital Square supports global goods in meeting that demand by supporting easier development of localized versions of the global goods and connecting local entrepreneurs to global goods communities to help them build thriving businesses.

- **Administering a transparent, inclusive digital health procurement process by allocating global goods investments transparently and with community input.** Digital Square makes investments into global goods through three mechanisms: (1) a request for application process, (2) the Open Application Process (OAP), and (3) an open request for application process utilizing the OAP platform. The OAP is an innovative procurement solution that fosters collaboration and agility. Digital Square supports the pairing of complementary concepts and identifies synergies between global goods. Proposals are evaluated by a peer review committee with members whose names are public. This approach allows the global digital health community an opportunity to understand and comment on global goods investments. To promote localization in this area, we will diversify and include more country-level representation in our peer review and investment review committees.

- **Providing rigorous yet pragmatic technical oversight on investments.** Country feedback indicates they want to better understand the group or suite of tools best designed to exchange data to meet their needs. Digital Square defines product suites as a configuration of global good technologies and tools that are aligned to meet a functional domain (such as supply chain or immunization). The product suites package tools together and exchange data through appropriate data exchange patterns to achieve a desired set of functionality and outcomes. Product suites are modular in their conceptual thinking to facilitate adoption by different countries and projects by aligning and leveraging existing infrastructure and tooling, as they meet the required standards and data exchange requirements and have the expected functionality. Product suites aim to leverage international guidance documents, such as the WHO Digital Adaptation Kits, to frame the expected systemwide flows and functionalities. As part of this refresh, Digital Square will engage the global goods community—including those who have worked with countries to develop suites of digital public goods for health as joint products to meet articulated country needs.

- **Participating in and leading in global digital health communities** such as OpenHIE and HL7. The initiative prioritizes the recruitment of a diverse team, so Digital Square's technical team is housed across different countries, is gender-balanced, includes professionals aged

from their mid-20s to their mid-50s, and comprises functional backgrounds in public health, informatics, computer science engineering, mathematics, and technical program management.

- **Serving as a community manager by connecting the global goods community to each other and to country efforts.** Digital Square has an active global goods community that participates in monthly webinars, contributes to quarterly newsletters, co-creates web articles and other publications, and participates in our annual Global Good Innovators Meeting. Digital Square's community-building efforts are overseen by a community engagement manager who ensures that country needs shape global goods conversations, and that global goods products and services are visible and available to country stakeholders who want to use them. Digital Square facilitates connection and learning among partners, in turn improving interoperability of software and support to global goods communities. Global goods are currently used in more than 90* countries, with 83* countries using two or more global goods. To further make these resources more accessible, we will localize content and tools available across global goods, including translation into French, Spanish, and Portuguese.

- **Advising on standards development and technical ecosystem design.** Norms and standards provide global goods with the guidance needed to strengthen their maturity and improve harmonization around interoperability, adaptability, and scalability to better support implementations of these technologies. Digital Square has supported WHO in adapting health guidelines into computable form, chaired the OpenHIE COVID-19 task force, and advocated for widespread adoption of the HL7 Fast Healthcare Interoperability Resources (FHIR) standard in partnership with WHO and USAID. Digital Square further advocates for investment through its theory of change, which articulates a progression from digital health interventions to health impact, as well as its theory of adoptability, which articulates a set of "minimum requirements" for at-scale adoptability. These materials help bring visibility to *why* certain investments are important to achieving scale and, ultimately, impact. We will also focus this year on supporting global goods developers and adopters to implement global architectural patterns and designs into tools and solution offerings as well as advocate with the global goods community to advocate for use and adoption of installation qualification, operational qualification, and performance qualification (IQ/OQ/PQ) principles.

- **Coordinating with stakeholders on digital public goods alignment.** There are ongoing efforts to coordinate approval and vetting of digital public goods through the Digital Public Goods Alliance (DPGA) and use of global goods for specific health vertical use cases through the WHO Clearinghouse. Digital Square is closely coordinating with the DPGA (UNICEF serves as the secretariat) and WHO to streamline approval for digital public goods for health. These efforts will enable countries and investors to increase confidence in the specific digital tools to be prioritized for scale and adaptation in countries. Through this engagement, Digital Square will refresh its prioritization framework and OAP to align more closely with tools formally vetted through the DPGA. Over the past year there have also been additional registries and catalogs created of digital public goods. With our colleagues leading our Alignment and Co-investment workstream, we will collaborate with the authors of these catalogs including the Digital Impact Alliance, DPGA, United Nations Development Programme (Digital X), and WHO (Digital Health and Innovation [DHI] team) to align across these resources on underlying principles, standards, and processes. Digital Square encourages and supports the health sector to be good consumers of, and contributors to, larger cross-sectoral digital initiatives such as digital infrastructure, payments, and identity, leveraging rather than duplicating these efforts for the health sector wherever possible. To enhance usability of our own Global Goods Guidebook, we will pilot a regional hub model for

the next version of the resource. The guidebook will also be available on a more accessible and adaptable website as well as available in additional languages. We will also commit to refreshing data on global goods annually and during each notice cycle.

Understanding what Digital Square does not do is just as important as understanding what Digital Square does. Digital Square does not:
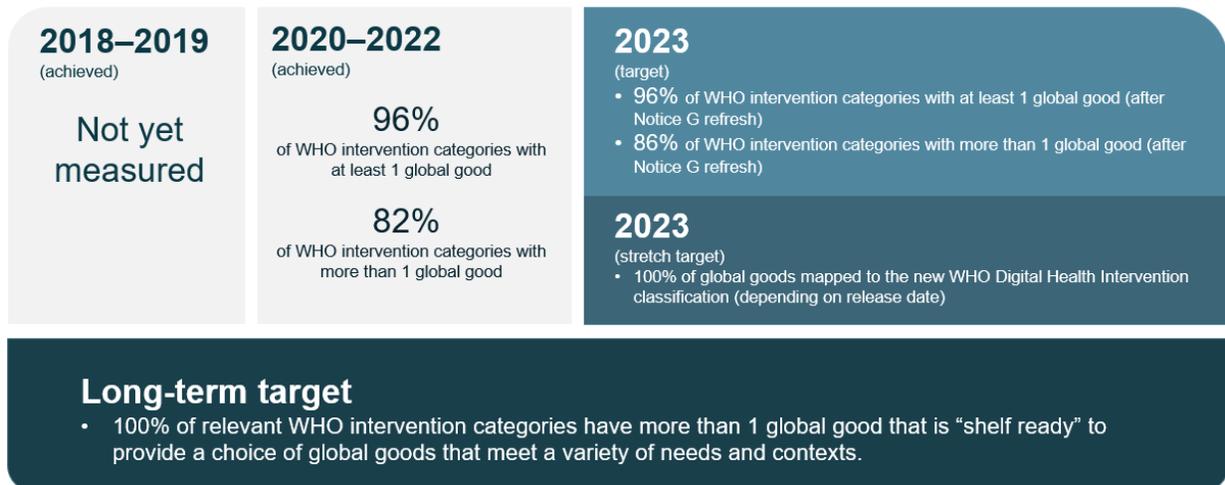
- **Resource global goods that focus outside the health sector.** Unless part of a well-defined business model that benefits low-resource health systems, Digital Square generally refers cross-sectoral investments to the Digital Impact Alliance and other partners, as appropriate.

- **Resource global goods that focus primarily on higher-resource settings.** For global goods that primarily target higher-resource settings, Digital Square does not believe it is needed as a financial intermediary. In these contexts, the initiative encourages market-based approaches to scaling global goods. Digital Square may choose to make targeted investments in existing global goods that have a strong community in cases where they meet a high-priority need in a low-resource context.

Digital Square priorities

Digital Square tracks key performance indicators to understand how our work to strengthen the global goods ecosystem results in increased breadth, maturity, usability, accessibility, and adoption of digital health global goods, as outlined below.

Increased breadth of global goods utility
Percentage of WHO intervention categories with at least one global good.

2018–2019
(achieved)

Not yet measured

2020–2022
(achieved)

96%
of WHO intervention categories with at least 1 global good

82%
of WHO intervention categories with more than 1 global good

2023
(target)
- 96% of WHO intervention categories with at least 1 global good (after Notice G refresh)
- 86% of WHO intervention categories with more than 1 global good (after Notice G refresh)

2023
(stretch target)
- 100% of global goods mapped to the new WHO Digital Health Intervention classification (depending on release date)

Long-term target
- 100% of relevant WHO intervention categories have more than 1 global good that is "shelf ready" to provide a choice of global goods that meet a variety of needs and contexts.

Increased maturity of global goods

Percentage of Digital Square–invested global goods that have increased maturity (disaggregated by software, service, and content global goods).

2018–2019
(achieved)

Not yet measured

2020-2022
(achieved/in progress)

- Tested draft definition of "shelf readiness" in RFA (2020)
- Refined "shelf readiness" definition with corresponding metrics (2021-2022)
- Drafted maturity models for all three global goods types (2022)

2023
(target)
- Maturity models revised, completed and published for all 3 global goods types (software, content and service)
- All Global Goods maturity data refreshed and available in the Global Goods Guidebook v4
- 50% of global goods have submitted a proposal with a component or work package targeted toward increased maturity (based on the type)
- 20% of software Global Goods with increased maturity score (between v3 and v4 of the Guidebook)
- Measure the current (baseline) maturity levels for content and service global goods (Notice G)

2023
(stretch target)
- 66% of global goods have applied for a Notice or RFA

Long-term targets
- 100% of Digital Square–invested global goods are shelf ready for country adoption.
- 100% of relevant WHO intervention categories have shelf-ready global goods.
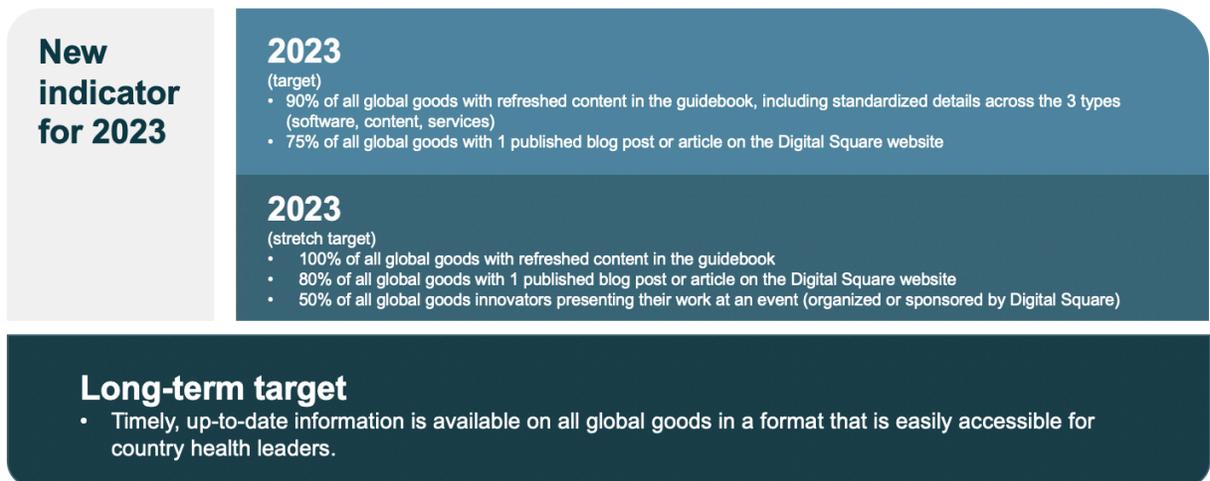
Increased usability of global goods
Number of product suites of global goods developed for use.

2018–2021
(achieved)

Not yet measured

2022
(achieved/in progress)

Immunization product suite under development

2023
(target)
• 1 product suite developed and published
• 1 product suite under development

2023
(stretch target)
• 2 product suites under development
• 1 country starting the implementation of a product suite

Long-term target
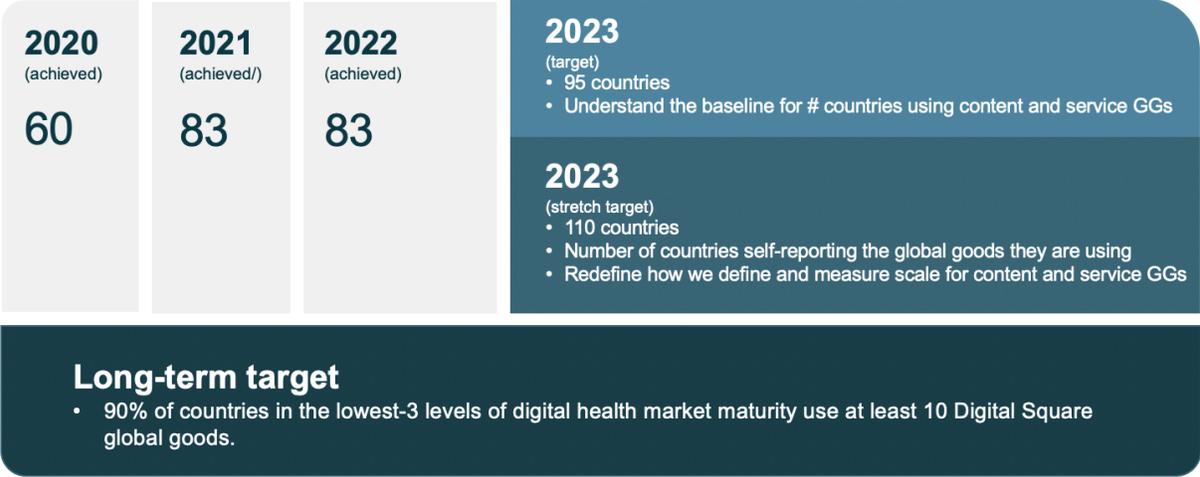• Global goods product suites are available for all focus areas prioritized by country health leaders.

Increased accessibility and timeliness of information on global goods
Percentage of global goods with updated details published and available across the marketplace.

New indicator for 2023

2023
(target)
• 90% of all global goods with refreshed content in the guidebook, including standardized details across the 3 types (software, content, services)
• 75% of all global goods with 1 published blog post or article on the Digital Square website

2023
(stretch target)
• 100% of all global goods with refreshed content in the guidebook
• 80% of all global goods with 1 published blog post or article on the Digital Square website
• 50% of all global goods innovators presenting their work at an event (organized or sponsored by Digital Square)

Long-term target
• Timely, up-to-date information is available on all global goods in a format that is easily accessible for country health leaders.

Increased country adoption

Number of countries in the lowest-three digital health market maturity segments[vi] using at least two global goods.

2020
(achieved)

60

2021
(achieved/)

83

2022
(achieved)

83

2023
(target)
- 95 countries
- Understand the baseline for # countries using content and service GGs

2023
(stretch target)
- 110 countries
- Number of countries self-reporting the global goods they are using
- Redefine how we define and measure scale for content and service GGs

Long-term target
- 90% of countries in the lowest-3 levels of digital health market maturity use at least 10 Digital Square global goods.

Outgoing investment disbursements for Global Goods Ecosystem in USD

Funds disbursed to partners for *Global Goods Ecosystem* since 2016.

Since 2016 *(achieved)*

$34,299,633 disbursed out of
$43,176,113 committed

Country digital transformation

DIGITAL SQUARE ALIGNS DIGITAL TRANSFORMATION EFFORTS TO ELEVATE COUNTRY PRIORITIES AND STRENGTHENS REGIONAL AND NATIONAL CAPACITY.

National and subnational digital health systems rely on partnerships and capacity strengthening that allow country governments to have:

- Coordinated technical, financial, and operational resources to support digital health transformation.

- Easier access to learning, sharing, and capacity strengthening opportunities.

To meet the demand for partnership from regional and country systems and to support the initiative's 2023 focus on increased localization, Digital Square's support of country digitalization efforts will have the most significant shift in strategy. What is working will remain, including:

- **Providing regional and country digital health leaders with technical assistance to successfully lead and execute digital health transformation initiatives to strengthen the health system through policies, standards, and governance.** There are multiple reference guides on the use and selection of appropriate tools for country digital health needs (Global Goods Guide Book, the Digital Health Implementation Investment Guide, the Digital Health Atlas, etc.), but the wealth of information in these resources and selection of the appropriate tool can be daunting for both country leaders and donors, and global tools at times can feel irrelevant to or ignorant of important local, contextual factors. Knowing this, Digital Square supports country leaders with end-to-end digital health implementation strategy development. This includes but is not limited to: providing advice on a landscaping of current digital health tools that are viable for country adoption; advising on the creation of a digital health enterprise architecture; supporting the improvement, design, or uptake of a digital health policy and digital health costed roadmap; curating and publishing country-specific toolkits; contextualizing a country-specific "ideal state" framework in which the system flows through an interoperable enterprise architecture with decision support mechanisms built in; and supporting country-led procurement processes that further foster the broader ecosystem of choice discussed throughout this strategy. Individual health data privacy, security, and governance will be optimized through policy templates and by supporting establishment of an enabling yet protective policy environment focused on trust.

- **Supporting the maturation of local markets and health systems to understand, identify, and sustain global goods for localized adoption and use with operational support and technical advisory services.** The digital health marketplace is filled with knowledge asymmetries, making it challenging for decision-makers to effectively evaluate existing digital health tools and systems. This can lead to a mismatch between needs and tools deployed to meet those needs, making it more difficult to deploy tools at scale. Digital Square supports decision-makers in evaluating digital health tools and adapting them for their context. Digital Square supports country leaders as they undertake requirements gathering processes, document referral flows, and decision-making access points at each level of the health care management system and evaluate those requirements and business processes to clearly define needs and match tools appropriately. We also help identify—through expressions of interest—local digital health entrepreneurs who can contribute to country digital transformation.

- **Mobilizing local digital entrepreneurs to partner with existing global goods developers for software deployment that suits the local context.** Current global goods implementers tend to be centered in the United States and Europe, with few implementers based locally. To allow for more nimble adaptation and the tailored use of global goods as local goods, Digital Square facilitates partnerships between existing global goods implementers and in-country implementers—expanding the network of global goods providers and support. Recognizing these entrepreneurs may be new, Digital Square created an organizational development tool to identify areas of support to ensure these digital entrepreneurs can enter, scale, and sustain a thriving business in global health.

- **Providing training and guidance to equip health leaders with the necessary skills and knowledge to drive country digital transformation of health systems.** Strengthening digital health capacity across all levels of the health workforce is key to the effective implementation, scale-up, and long-term sustainability of digital health systems. Without this strong capacity, the impact of and return on investment in digital health systems will be limited. We will continue to support the Digital Health Applied Leadership Program and the Digital Health: Planning National Systems course to support health leaders and decision-making governing bodies in their journey to establish and lead regional and country efforts that leverage the power and promise of digital health.

- **Supporting the development of new and low-maturity global goods through organizational development processes.** Digital Square will also support organizational development through conducting assessments, developing additional learning frameworks, and providing training plans to support capacity development at all levels—from community health workers to national health leaders and policymakers.

- **Coordinating resources and expertise from multiple investors to support country and regional digital health initiatives.** The Digital Square operations team has developed a series of processes and protocols to enable the coordination of more than five donor investments into a single country- or regional-level initiative. Coordination includes in-depth knowledge of requirements for each donor, alignment of requirements to minimize administrative costs, and aggregation of funds into a single award so that Digital Square does not burden country and regional initiatives with unnecessary administration. These processes and coordination will continue to support the Digital Health Centre of Excellence (DICE) as well as UNICEF. The Digital Square technical team provides oversight of these initiatives. This team has a diverse set of experiences in providing capacity strengthening and technical support to country governments that helps them partner effectively with country and regional initiatives.

While the above areas will remain a part of Digital Square's foundational country support, we will respond to lessons learned around implementation, services offerings, and governance to ensure that governments are using evidence-based and data-driven information to enable their choices. New areas of focus for Digital Square are outlined below.

- **Deeper investment in exemplar countries to drive impact.** Digital Square is currently implementing projects in 22 countries. Although this represents wide geographic diversification and provides an opportunity to get a cross-sectional understanding of many aspects of country digital transformation in multiple settings, the Digital Square team believes that a deeper health impact could be sustained by focusing resources in end-to-end health system and service delivery models in a prioritized set of countries rather than rapid implementations in many. In 2023, we will explore deeper partnerships with five to ten

country governments and their funding partners to provide end-to-end health system and service delivery support that includes:

- o Advising countries on standards-based implementations, but ultimately supporting an ecosystem of choice for countries. This means supplying decision-makers with the information needed to make informed choices about products, tools, capabilities, and services. These informed choices will enable governments, suppliers, developers, and service providers to create improved, equitable, and efficient patient and health care worker experiences.

- o Supporting global goods implementations driven by country demand and adapted for local contexts. We have already started this end-to-end service model in three countries—Tanzania, Burkina Faso, and Senegal—and they will continue to be priorities in 2023. The additional two to seven deep country partnerships will be confirmed in 2023.

- **Country capacity strengthening through Regional Digital Square Hubs.** To date our technical expertise has been centralized, with technical support and technical tools (software, services, and products) mainly coming from the United States and Europe. Creating and utilizing regional hubs will allow for more tailored and appropriate developments of the digital square "market" allowing local experts to bundle and adapt needed tools based on local context, more rapidly move to implementation, contextualize the Global Goods Guidebook, implement standards, and adapt toolkits and trainings to local languages and contexts. Regional hubs will be much more effective at bringing together individuals in their countries who will be impacted by digital interventions to articulate their needs in a systematic way. Regional facilitators can do this in local languages and with a greater and more focused understanding of the situation of end users. This collaboration among stakeholders results in a shared understanding of—and agreement on—what a digital intervention or system must do. We will pilot a regional hub for South/South East Asia out of India and will test the feasibility of a West Africa Hub based out of Senegal and an East Africa Hub based out of Tanzania.

- **Ecosystem diversification to offer more locally relevant and sustainable solutions**. Establishing a roster of local entrepreneurs, innovators, and implementers of global goods will expand the menu of options for local purchasers and offer more locally relevant solutions at potentially more attainable price points. Furthermore, by working with local entrepreneurs on their organizational development capacity—and use of our organizational development tool—we will position them to become more attractive to directly receive donor support in the short term and prepare them for business-to-government and business-to-business contracting in the medium and long terms.

Understanding what Digital Square does not do is just as important as understanding what Digital Square does. Digital Square does not:

- **Provide incubation services to start-ups.** Digital Square's organizational development tool is designed for entrepreneurs who have passed the startup phase, and now need to develop a pathway to scale and sustainability. Many organizations provide incubation services; there are over 200 innovation and incubation hubs in Nairobi alone. Digital Square will work with organizations within or outside of these hubs interested in working with global goods or host country governments to find suitable partnership opportunities.

- **Develop global goods or other technology products.** Digital Square is a connector. We do not do software development ourselves, but rather work with users and software developers to ensure that needs are met with appropriate global goods products.

Digital Square priorities

Digital Square uses key performance indicators to measure our progress toward country digitalization, as outlined below.

Strengthened country digital health maturity (depth)
Percentage of Digital Square partner countries that show progress toward improved digital health maturity.

New indicator for 2023

2023
(target)
- All Digital Square partner countries (5-10 countries where Digital Square is providing end-to-end support) complete the Global Digital Health Index (GDHI) to serve as a baseline. Following baseline, countries will complete the GDHI annually and we hope to see year-on-year improvements which will be reflected in our targets for 2024 and beyond.
- Based on first-year learnings, we will determine how to best set targets and respond to feedback from qualitative research findings.

2023
(stretch target)
- Qualitative research to get feedback from country health leaders on how Digital Square is providing value and where we can improve our approach to support country digital health maturity.

Long-term target
- Country health leaders are motivated to document progress against global digital health standards and actively seeking to strengthen their country's digital health performance.

Strengthened country digital health maturity (breadth)
Number of countries that have accessed Digital Square resources to support country digital transformation.

New indicator for 2023

2023
(target)
- Establish website metrics to track access to Digital Square resources (e.g., access to toolkits, documents, guidance, lessons learned via views or downloads)
- Understand current use of Digital Square resources to inform target-setting

2023
(stretch target)
- Conduct surveys to follow up directly with target audiences on how they are using Digital Square resources

Long-term target
- Country health leaders see value in Digital Square resources and use them to strengthen their country's digital health performance.

Strengthened digital health capacity
Percentage of individuals and organizations with strengthened capacity as a result of Digital Square collaboration.

New indicator for 2023

2023
(target)
- Standardize measurement for capacity strengthening activities that focus on individuals and organizations through development of a) menu of training indicator options and b) organizational capacity assessment.
- 75% of individuals / organizations participating in capacity strengthening activities have increased capacity.

2023
(stretch target)
- All Digital Square individual/organizational capacity strengthening activities are integrating standardized metrics into their measurement plans

Long-term target
- Sufficient digital health capacity exists in countries (among all levels of the health workforce as well as local entrepreneurs, innovators, and implementers) to effectively implement, scale up, and sustain digital health systems.

Outgoing investment disbursements for Country Digital Transformation in USD
Funds disbursed to partners for Country Digital Transformation.

Since 2016 *(achieved)*

$14,076,000 disbursed out of
$17,709,640 committed

Learning questions 2023

Ongoing, iterative learning and adaptation is central to Digital Square's approach. As a learning initiative, we prioritize learning questions that drive the learning agenda aligned to our strategy. Insights from our learning agenda are used to inform Digital Square's implementation and are shared with the digital health community to have wider impact. In 2023, we will focus on three learning questions:

1. **What is the impact of digital health?**

Impact is understood in different ways by different stakeholders. Digital Square will focus on how we can measure and communicate the added value of digital health, particularly to public health audiences, country leaders, and digital health skeptics. This question includes a focus on global goods, to understand their reach, scale, and use, and how they can strengthen health systems to drive improvements in service delivery and population health. It also includes a focus on Digital Square's approach to center country choice, support localization, and strengthen local capacity—and whether or how those approaches lead to sustainable, scalable country digital transformation. Our learnings will inform how we measure and communicate impact within our own work and on how we can contribute to the evidence base for digital health.

2. **How is Digital Square and its ecosystem of partners supporting localization, country sovereignty, and an ecosystem of choice? What approaches work (or not)?**

Digital Square's 2023 strategy has an increased focus on localization, country sovereignty, and an ecosystem of choice. This learning question will focus on new approaches Digital Square implements and what we learn about what works (or doesn't work) to drive country digital transformation. Approaches include engaging local global goods developers and implementers, creating regional hubs, elevating country voices, advocating for country priorities, and contextualizing capacity strengthening opportunities based on local needs. Learning about what programmatic and operational changes can meaningfully support localization, country sovereignty, and an ecosystem of choice will allow us to iteratively adapt our approach based on what works.

3. **What is the vision for a sustainable digital health ecosystem and how do we get there?**

A sustainable digital health ecosystem includes available, adaptable, mature global goods for country leaders to choose from. The availability of those global goods is contingent on sustainable financing and a healthy market. This question builds on our market analytics work to "demystify the market" for investors, global goods innovators, and other stakeholders. Within countries, we can continue to learn how financing for digital health is evolving and implications for the total cost of ownership. A sustainable digital health ecosystem also includes demand for global goods, so this question aims to understand what factors hinder or support the adoption of global goods and how our efforts to strengthen capacity and provide timely, localized information on global goods influences demand.

Conclusion

True digital health transformation at a global level requires a paradigm shift. In all aspects of its current work, Digital Square is committed to building momentum for this shift. The initiative creates and shares evidence, works with digital health leaders to enhance their skills and knowledge for country digital transformation, and establishes frameworks for interoperability and coordination.

But Digital Square cannot make a paradigm shift without the partnership of transformative thinkers and doers. Transformative thinkers and doers will help the digital health sector go beyond existing market structures to change the way digital health technologies and innovations are financed and scaled. They will help better match the pace of digital health funding and implementation to the pace of technological evolution. They will inspire renewed creativity to improve the accessibility, quality, and effectiveness of digitally enabled health services—catalyzing a large-scale transformation of how digital health interventions support health systems in low- and middle-income countries and reach billions of people to help close the health equity gap.

Glossary

Digital transformation refers to the strategic integration of digital technologies and associated change management capabilities to strengthen systems, increase their use and efficiency, and improve the quality of and access to services.

Global good. A digital health tool that is adaptable to different countries and contexts. There are three types of global goods:

- Software: A tool that is frequently free and open source; is used to manage, analyze, or transmit health-related data; and has proven utility in several settings.

- Services: A software tool that is used to manage, transmit, or analyze health-related data; can be freely accessed as a software service; and adheres to open data principles.

- Content: A resource, toolkit, or data standard that is available under an open license and is used to improve or analyze health data management processes.

Open Application Process (OAP) refers to the competitive procurement process run by Digital Square where bids are submitted in a fair and transparent process for a peer review committee to evaluate applicants and an investment review committee to select successful applicants.

References

[i] Read more about the underlying causes of inequality in the Gates Foundation's 2019 *Goalkeepers Report: Examining Inequality* at https://www.gatesfoundation.org/goalkeepers/report/2019-report/#ExaminingInequality.

[ii] National Academies of Sciences, Engineering, and Medicine. 2018. *Using Technology to Advance Global Health: Proceedings of a Workshop*. Washington, DC: The National Academies Press. https://doi.org/10.17226/24882.

[iii] World Health Organization (WHO). *Global Strategy on Digital Health 2020-2025*. Geneva: WHO; 2021. License: CC BY-NC-SA 3.0 IGO. https://www.who.int/docs/default-source/documents/gs4dhdaa2a9f352b0445bafbc79ca799dce4d.pdf.

[iv] Fast L, Waugaman A. *Fighting Ebola with Information: Learning from Data and Information Flows in the West Africa Ebola Response*. Washington, DC: USAID, 2016. https://2017-2020.usaid.gov/sites/default/files/documents/15396/FightingEbolaWithInformation.pdf.

[v] GSMA Intelligence. *Scaling Digital Health in Developing Markets: Opportunities and Recommendations for Mobile Operators and Other Stakeholders*. June 2017. https://www.gsma.com/mobilefordevelopment/resources/scaling-digital-health-in-developing-markets/.

[vi] See: Herrick T, Gannon S, Gilbert S. How digital health maturity can inform global goods design [blog post]. *Digital Square Blog*. December 9, 2019.