



## The 2021 Digital Services Convening

#### Citation

Eaves, David, and Sechi Kailasa. 2022. "The 2021 Digital Services Convening."

#### **Published Version**

https://ash.harvard.edu/publications/2021-digital-services-convening

#### Permanent link

https://nrs.harvard.edu/URN-3:HUL.INSTREPOS:37371415

#### Terms of Use

This article was downloaded from Harvard University's DASH repository, WARNING: No applicable access license found.

## **Share Your Story**

The Harvard community has made this article openly available. Please share how this access benefits you. <u>Submit a story</u>.

**Accessibility** 

# The 2021 Digital Services Convening

David Eaves and Sechi Kailasa Editors

**JANUARY 2022** 



# The 2021 Digital Services Convening

David Eaves and Sechi Kailasa Editors

JANUARY 2022

#### About the Ash Center

The Roy and Lila Ash Center for Democratic Governance and Innovation advances excellence and innovation in governance and public policy through research, education, and public discussion. By training the very best leaders, developing powerful new ideas, and disseminating innovative solutions and institutional reforms, the Center's goal is to meet the profound challenges facing the world's citizens. The Ford Foundation is a founding donor of the Center. Additional information about the Ash Center is available at <u>ash.harvard.edu</u>.

This research paper is one in a series published by the Ash Center for Democratic Governance and Innovation at Harvard University's John F. Kennedy School of Government. The views expressed in the Ash Center Policy Briefs Series are those of the author(s) and do not necessarily reflect those of the John F. Kennedy School of Government or of Harvard University. The papers in this series are intended to elicit feedback and to encourage debate on important public policy challenges.

#### About the co-editors

David Eaves is a lecturer of public policy at Harvard Kennedy School where he teaches on digital transformation in government. In 2009, as an adviser to the Office of the Mayor of Vancouver, Eaves proposed and helped draft the Open Motion, which created one of the first open data portals in Canada and the world. He subsequently advised the Canadian government on its open data strategy where his parliamentary committee testimony laid out the core policy structure that has guided multiple governments' approaches to the issue. Eaves has gone on to work with numerous local, state, and national governments advising on technology and policy issues, including sitting on Ontario's Open Government Engagement Team in 2014–2015. In addition to working with government officials, Eaves served as the first director of education for Code for America—training each cohort of fellows for their work with cities. Eaves has also trained the 18F and Presidential Innovation Fellows at the White House.

Sechi Kailasa is an MPA 2022 Candidate at Harvard Kennedy School where she focuses on digital government. While at Harvard, Sechi has worked with David to deliver a course called Disrupting Bureaucracy: Understanding Recent Efforts in Digital Government and interned with Public Digital. Prior to the Kennedy School she was a Fast Streamer in the UK Civil Service where she had the opportunity to work on digital projects. Before government she completed Teach First and holds a BSc in Philosophy and Economics from the London School of Economics and an MSc in Development Economics from SOAS, University of London.

This paper is copyrighted by the author(s). It cannot be reproduced or reused without permission. Pursuant to the Ash Center's Open Access Policy, this paper is available to the public at ash.harvard.edu free of charge.

#### A PUBLICATION OF THE

Ash Center for Democratic Governance and Innovation Harvard Kennedy School 79 John F. Kennedy Street Cambridge, MA 02138

617-495-0557 ash.harvard.edu

# Contents

Executive Summary	1
Introduction: The 2021 Digital Services Convening	2
PART 1	
From Platforms to Protocols: India's Story of Leapfrogging Financial Inclusion	4
Open Source Will Play a Larger Role in the Digital Government of the Future	8
PART 2	
Beginning of the New Wave of Digital Service Teams	12
Experimenting with Digitalization: A Case Study of Japan's Ministry of Economy, Trade, and Industry	14
Leveraging Existing Tools Effectively: Colorado's Modern Software Delivery Maturity Matrix	18
PART 3	
A Public Servant's Perspective: Applying Digital in a Nondigital Landscape	21
Confronting a Pandemic: The Case of NHS Test and Trace	24
PART 4	
The Application of Levers for Digital Service Groups	
Wisdom from Experience: Three of the World's Top Digital Government Leaders Share Their Lessons for Getting Things Done	
Reshaping the Vendor Ecosystem	

#### **Executive Summary**

In June 2021, the John F. Kennedy School of Government at Harvard University and the digital transformation consultancy Public Digital hosted the fourth annual Digital Services Convening. The goal of this convening was to accelerate the digital transformation of governments across the world by creating a space where practitioners could learn lessons from each other, share their experiences, and discuss best practices. Like last year, this year's convening was held virtually. The three-day event was attended by over 100 participants based in around 47 governments around the world and represented 30 different countries—our most diverse set of attendees to date.

Day one kicked off with a reflection on the past year and both the successes teams realized and the challenges teams faced in light of COVID-19. The day's main theme was exploring models for scaling the adoption of digital services in ways that transcend the resources of a single nation state. Pramod Verma—the architect of the Aadhaar and much of the India stack—gave a fascinating keynote on the need to revisit creating new internet protocols to standardize and commoditize key services. This was followed by a panel discussion on the potential to use and share open source in government.

Day two focused on new digital service teams that had emerged since the first wave of digital service teams nearly a decade ago. We were joined by colleagues from Japan, Morocco, West Java, and Madagascar to discuss how they had set up their digital service teams, the levers they employed, and the lessons they may have learned from the first wave. We ended the day by asking a panel of digital service teams what their most successful levers had been.

Day three started with the first ever panel involving public servants not based in digital service teams and exploring their experience of interacting with these groups, their ways of working, and standards. The convening ended with three important digital leaders discussing their experiences of leadership and how digital transformation can be sustained. The community's growth, the progress that had been made to date, and the experiences of navigating a pandemic meant that this year, like other years, led to several great lessons and ideas being shared and discussed. It also provided an opportunity to truly reflect on the progress that had been made since the first wave of digital service teams and how the landscape has changed, bringing both benefits and familiar and different challenges. This report is an effort to share some of the learning and insights from this year's convening.

#### Introduction: The 2021 Digital Services Convening

David Eaves, Lecturer in Public Policy Harvard Kennedy School; Sechi Kailasa, Master in Public Administration 2022, Harvard Kennedy School

This year's convening marked the fourth Digital Services Convening jointly organized by the John F. Kennedy School of Government at Harvard University and Public Digital, a disruptive digital transformation consultancy. The event has been described by a <u>Cambridge University study</u> as one of six seminal digital government conferences across the globe. The importance of having a space where digital government practitioners can learn, share, and discuss their experiences is only growing, as more and more governments are grappling with transformation efforts and the subsequent issues that such efforts give rise to.

Many digital service teams had made significant gains during the pandemic and were awarded more authority, remit, and funding. COVID-19 had also affected governments' risk appetites across the world, leading to more experimentation and iteration. This has not always led to successful outcomes; in some cases, it might not be appropriate to bypass processes or use a <u>magic wand as a lever</u>. However, this general shift has meant that the entrenched ways of working and the prevailing speed of bureaucracy were challenged. It remains an open question as to whether all the gains made during the pandemic can or should be retained.

Digital teams had to respond to the pandemic with the capabilities they had as opposed to the ones they would have liked to have had. The pandemic reinforced the idea that governments and organizations more broadly can no longer afford to sideline developing digital capability—many that had previously done so were pushed to create and implement a digital strategy.

The fourth convening demonstrated the progress that had been made since the first wave of digital service teams in the early 2010s, with the attendance and participation of many new digital teams around the world. This new wave of digital teams had based many of their strategies on the first wave—they had used and adapted their tools and shadowed teams to understand their culture and ways of working. Importantly, they had also avoided some of the earlier teams' pitfalls and adapted their strategies to the local context they faced, for example, by adopting a hybrid method of delivery due to the lack of local talent. Interestingly, the North Star (the overarching goal) for digital service teams of building common infrastructure and building cross-government platforms that enabled deep institutional change hadn't changed (at least not yet) for the new wave. However, there was divergence in the strategies and methods that teams were using to approach it. At a broad level, lower income nations seem to be finding approaching the North Star much easier (perhaps because they can start from a context more similar to a blank state), but as countries build these systems of common infrastructures and platforms, considerations such as privacy, security, trust, and the relationship between citizens will become increasingly important. As a result, the governance burden inherent in digital transformation will need to be addressed sooner rather than later.

At last year's convening, the idea of levers for digital service teams was introduced. Since many organizations still aren't digitally native, levers are necessary as they enable teams with strategies to be effective and allow them to expand their sphere of influence and have meaningful impact. This year's convening allowed us to apply the concept of levers to different contexts and learn how different teams across the world had adopted various levers and how they had fared. It also highlighted the importance of levers because it's clear that teams are not yet free from the threat of defunding and deprioritization.

The convening ended with a panel reflecting on leadership within digital government, including Minister Cina Lawson of Togo; Tom Read, the CEO of the UK's Government Digital Service (GDS);

and Matt Cutts, the former head of the United States Digital Service (USDS). They noted practitioners face many challenges in this space and reinforced the need for resiliency. They asked practitioners to remember that we're operating in a different environment than in the early days, and there are now a lot of people routing for practitioners' work, fighting for their funding, and using their strategies and putting them into practice. There is a super power in demonstrating progress quickly, bringing users into the fold, and using the tried and tested ways of working that this community has developed. We've come a significant way on this journey, and as we continue, we should remember to work in the open, share and draw lessons from each other, and continue to contribute to and strengthen this community.

### PART 1

## FROM PLATFORMS TO PROTOCOLS: INDIA'S STORY OF LEAPFROGGING FINANCIAL INCLUSION

Author: Divya Goel, Master of Public Administration in International Development 2022, Dr Pramod Varma, CTO EkStep Foundation, Chief Architect Aadhaar and India Stack, Co-founder Beckn Foundation

#### Introduction

In the last two decades, India has built the world's largest digital biometric identity and real-time payment systems. The state-of-the-art digital infrastructure helped India leapfrog to a financial inclusion of 85% of the population that otherwise would have taken 47 years to do given India's GDP and the fact that only 20% of the population could access formal banking just a decade ago. The digital infrastructure being replicated by many other countries like Togo and Ethiopia consists of many interconnected and interoperable platforms that the government developed. The technical design of these platforms makes the infrastructure cost-efficient, secure, and scalable and allows the government to address market failures while enabling and regulating markets.

Over the years, the experience of implementing government platforms, combined with the growing awareness of the drawbacks of private big tech platforms such as Facebook and Google, has led to an intellectual shift toward using more protocols (rules of communication or data exchange between networks or communication systems) in the technical architecture. In India's digital infrastructure, these protocols make the platforms accessible to private and public sector innovators. In this article, we discuss the country's journey of building platforms and the consequent shift toward protocols.

#### The Current Digital Infrastructure in India

India's digital infrastructure, known as the "<u>India stack</u>," consists of a set of interoperable and independent single-purpose platforms connected through open-source <u>APIs</u> (application programming interfaces). APIs can be accessed by any private or public player through protocols. While these single-purpose platforms alone don't do much in isolation, they have huge effects when combined to perform a general task.

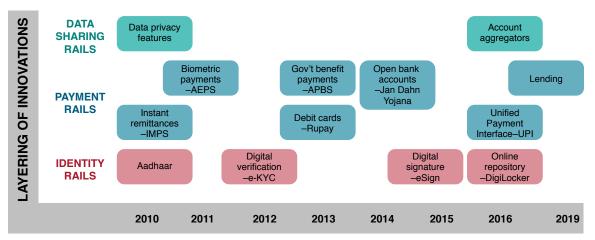
In addition to helping the government provide social securities efficiently, the digital infrastructure enables financial markets to provide services to the poor. Previously, services by the private sector were financially unviable because of information asymmetries that led to high costs in customer acquisition and retention. However, with the current digital infrastructure, both the public and private sector can innovate to create products that operate within a regulatory framework. As some may describe it, the Indian government takes the middle path where it doesn't completely leave it to market players to solve all the problems, nor does it resort to fully state-owned services and solutions. It balances the two by being an orchestrator rather than a player, building minimal public digital infrastructure for markets to leverage, and facilitating innovation on top, an approach that complements its historical welfare society leanings.

The digital infrastructure reduced multiple costs of financial markets by incorporating three key elements:

1. **Digital identity**: <u>Aadhaar</u> and <u>GSTIN</u> (Goods and Services Tax identification number) provide unique digital identities to individuals and establishments, respectively. With open APIs and digitally verifiable identities for every individual and establishment, it has become easy to claim, "I am who I claim to be." Aadhaar, which is linked to a person's unique biometrics, authenticates and verifies identities for banks and other institutions at a very low transaction cost. This has reduced the cost of customer acquisition and brought large sections of the society under the formal financial system.

- 2. Payment interface: Unified Payment Interface (UPI) is an instant real-time payment system developed by the nonprofit National Payments Corporation of India, which is promoted by the Reserve Bank of India. UPI has brought down the cost of account-to-account transfers to just 1/700th of a dollar and helps retain customers by facilitating convenient transactions by catering to the typical low-value transactions in India. With 4.5 billion transactions monthly, UPI is not only the largest real-time payment system in the world but also the most preferred payment mode in India, making the country the global leader in digital payments in terms of volumes.
- 3. Data sharing rail: The data sharing rail empowers customers to access and share their data (generated through high volumes of digital transactions, e.g., in UPI) with institutions and individuals at their own consent. In the financial domain, account aggregators facilitate the consent management and transfer of financial data between various regulated financial institutions (banks, securities firms, insurance companies, pension funds, etc.). Apart from its application in the lending sector, the individual-centric approach for digital data sharing is relevant for healthcare (e.g., to allow patients to access and control their own health records) as well as the labor market (e.g., to allow potential employees to validate their employment history or credentials).

The Diagram below developed by the Bank of International Settlements (BIS) shows how different elements come to play in the India Stack.



Source: Bank of International Settlements: December 2019 ("The Design of Digital Financial Infrastructure: Lessons from India" by Derryl D'Silva, Zuzana Filková, Frank Packer, and Siddharth Tiwari)

#### **Benefits of Protocols over Platforms**

As opposed to just <u>monolithic platforms</u>, the use of decentralized networks based on open protocols that connect many platforms in an interoperable manner makes this infrastructure unique and powerful. First, the design fosters competition by lowering the barriers of entry for private players as any private player can use this infrastructure at minimal costs. Given that the government also provides a basic service (e.g., <u>BHIM (Bharat Interface for Money)</u> for payments) at the lowest possible cost, private players are forced to provide competing products at affordable prices that meet the demands of an average Indian and address the diversity of solutions that are needed to cater to a billion people. Second, customers are empowered because they are provided multiple service providers to choose from, including those that may be more privacy centered. The protocols do not replace platforms, but rather amplify the existence of multiple platforms. Third, it also allows the emergence of players that help customers control and use their own data to access services such as loans and insurance by eliminating the monopoly of data control through the existence of multiple players.

To understand how protocols compare with platforms, the following example provides a clear overview. Email is a protocol that allows multiple private players to emerge and provide various services to customers, and its rules let people with email accounts on different service providers like Gmail, Yahoo, or Google communicate with each other. On the other hand, platforms like WhatsApp or Telegram require the user to have an account on the platform to communicate. While a person owning a Gmail account can communicate with someone owning an outlook account, this is not possible in the case of WhatsApp or Telegram since different platforms are governed by the rules of different private players and, by design, are not interoperable. To access instant messaging, all users are required to be on a single platform. As the platform becomes popular, consumers are left with no "meaningful choice" but to be on those platforms if they want to avail any of these services.

However, in the case of email, customers have a choice. They could choose Gmail (which could use their data for customer's advertisements), use ProtonMail where emails are encrypted, or even set up a private email server. The problem with platforms is even bigger because they own consumers' data and use it for their own benefit rather than the consumers'. In contrast, protocols give control and decision-making to the consumers rather than keeping it centralized among a small group of very powerful companies. They also foster competition and empower consumers to choose from a variety of options that best suit their needs.

#### Scaling Up of Protocols across the World

The use of networks based on open protocol is a way of going back to the foundations of the early days of the internet when email was invented. Common protocols are also the reason why global mobile networks are connected and interoperable. When the public stopped with protocols, monopoly platforms by private companies such as Uber, Facebook, and Google sprang up to provide services that protocols didn't.

While India is a successful story for creating digital infrastructure based on protocols, scaling up a network that is interoperable across the world may not be straightforward. For example, we could imagine a world of payment networks that is interoperable across the world. There could be a set of protocols for payment transactions that are universally agreed upon, like in the case of mobile phone networks, which allow money to be routed anywhere across the globe without any one entity being the intermediary. While a central bank may have some nodes for security and regulation, the protocols could be versatile enough to handle individual-to-individual payments directly without banks.

However, questions related to the How, the Who and the What of protocols require deliberation. Each country's needs and agendas are different, which makes consensus on the use case and the rules (protocols) difficult. Furthermore, the use cases need to be chosen in such a way that once scaled, they create massive opportunities without inhibiting innovation for the future. What would be criteria to decide on a protocol that works for all and how will global politics play a role in deciding what ultimately gets made? While some of the earliest protocols were a product of cutting-edge research in universities such as UCLA and Stanford, it is plausible to have a committee of influential and technical experts to lead the way. For

example, in India, the decentralized networks are developed by the not-for-profit entity setup and funded by the network participants themselves and other non-Govt institutions.

Currently, a D-6 alliance that includes Australia, Japan, and India is exploring how personal data can be liberated through open protocols. But there needs to be more of such conversations and efforts across the globe to unlock the full potential of protocols.

#### Conclusion

India pushes the frontier of innovation in digital government. Beyond UPI and Aadhaar, India is rapidly expanding its use of protocol-based networks to sectors such as e-commerce, health and education. While <u>addressing Startup India Innovation Week</u>, Nandan Nilekani stressed on how the infrastructure of <u>Open Network for Digital Commerce (ONDC)</u>, built on open source <u>beckn protocol</u>, will support the transition of the trillion-dollar retail economy in India to e-commerce. Similarly, the Ayushman Bharat Digital Mission launched by the Prime Minister that uses the <u>Unified Health Interface (UHI)</u> will provide an interoperable infrastructure to health care providers to transform the health sector.

With over a decade of experience with India Stack, India seems to have learned what works in their context and is taking giant leaps in different sectors with a rapid speed. It sticks to its fundamentals of creating a decentralized infrastructure that solves the problems of its 1.3 billion population, controls monopoly, allows innovations and sets regulations.

Just a decade ago, the predominant approach for digital government practitioners was to move from products to platforms (e.g., Irembo (Rwanda), GOV.UK). Today, India's success shows the game-changing potential that protocols offer over platforms.

### OPEN SOURCE WILL PLAY A LARGER ROLE IN THE DIGITAL GOVERNMENT OF THE FUTURE

Author: Surabhi Hodigere, Master of Public Policy, 2022

This article captures the growing state of open-source adoption in government, explores common challenges, and discusses pertinent research intended to be useful for both overseers and implementers of digital services in government.

Governments across the world are facilitating the use of open-source software in the delivery of public services, and many have instituted concrete policies in this regard. For example, the shift toward open source in government is not a new phenomenon but is now being preferred for public service delivery at an accelerated pace. This was apparent both in themes discussed in the Digital Services Convening as well as the general trends among digital service groups represented at this year's convening.

Among the reasons for the growing interest in using open source, avoiding vendor lock-in, lowering prices, and facilitating sharing and reuse stand out as important advantages. <u>This GDS blog</u> on the benefits of coding in the open highlights practical reasons that are compelling governments to shift toward open source. The World Bank in its primer on "<u>Open Source for Global Good</u>" also lists reasons that make open-source imperative for governments to consider, particularly those in developing countries and in contexts with high resource constraints. These reasons include enabling integration and interoperability across government, engendering trust in robust and secure systems, enabling continuous innovation, and enhancing usability, localization, and citizen-centered design.

From a global perspective, open source has the capability to spur innovation, interoperability, and reuse across borders. The World Bank notes that "despite many processes being largely similar in various country contexts, each new project is typically built from scratch, as if there were no templates, code libraries or models, or lessons learned on which to base new implementations."

In this context, it is appropriate that the creation of digital public goods (DPGs), which are inherently open in nature, are being encouraged across countries and stakeholders including multilateral organizations, funders, and expert groups. The Digital Public Goods Alliance, which sets standards for DPGs, notes in its blog post that "open source is a necessary condition for any technology to be considered a digital public good. It enables sharing, reuse, and adaptation to suit local needs." <u>Mojaloop</u>, <u>MOSIP</u>, and the <u>X-Road</u> are some well-known examples of DPGs recognized as such by the Digital Public Goods Alliance.

## Well-Known Examples of Digital Public Goods Include Mojaloop, Mosip, and X-Road:

- Mojaloop is an open-source software empowering organizations to create interoperable digital payment systems to increase financial inclusion.
- MOSIP is a modular and open-source/open standard identity platform that helps governments and other users implement a digital, foundational ID in a cost-effective way.
- X-Road is open-source software and ecosystem solution that provides unified and secure data exchange between organizations.

In this context, it is appropriate that the creation of digital public goods (DPGs), which are inherently open in nature, are being encouraged across countries and stakeholders including multilateral organizations, funders, and expert groups. The Digital Public Goods Alliance, which sets standards for DPGs, notes in its blog post that "open source is a necessary condition for any technology to be considered a digital public good. It enables sharing, reuse, and adaptation to suit local needs."

Seen from these perspectives, it becomes apparent that open source is an inevitable future of digital-era governments. This is why this year's Digital Services Convening began with a panel unpacking the many facets to the use of open source in government. Some major questions that were tackled in the panel include the following:

- 1. What is the starting point for governments looking to explore open source?
- 2. What empowers governments' successful adoption of open source?
- 3. How can governments working in the open collaborate and grow?
- 4. What governance considerations go into facilitating a value-creating, sustainable open source in government effort?

In tackling these questions, panelists referred to bodies of work, both in which they co-authored as well as otherwise. In the paragraphs that follow, a selection of research reports, playbooks, and tools that answer the above questions will be discussed.

#### What Is the Starting Point for Governments Looking to Explore Open Source?

Governments with differing levels of maturity in digital services are looking to adopt open source. This New America report on "<u>Building and Reusing Open-Source Tools for Government</u>" is a fantastic first resource for government practitioners, both those who have used open source in their prior projects as well as those new to open source. The report details five paths to open-source adoption in government, provides a detailed checklist of governments looking to adopt open source, and <u>answers common questions that decision-makers might have</u>. These questions include "Is open source kept up to date?," "What are open-source licenses," and "Will using open source reveal policies prematurely?"

Highlights: New America's "Checklist for How Governments Can Leverage Open Source Solutions"

- · Create organization-wide open source policies
- · Make usage of open source a priority
- · Work in the open
- Migrate existing software and code to open source
- Facilitate interoperability

A first principal issue that appears frequently in discussions of open source is concerns around security and privacy. The US Department of Defense has compiled a comprehensive <u>set of FAQs</u> that addresses these questions about security and privacy in the context of open source in government.

#### What Empowers Governments' Adoption of Open Source?

In answering the above question, an in-depth tool to assess and create conditions to successfully facilitate the use of open-source government was released by Public Digital in its report "<u>Open Source</u> in <u>Government: Creating the Conditions for Success</u>." Called the "Open Source Capability Model for Governments," the tool was presented at the convening by Emma Gawen, partner at Public Digital. It is "intended to be a self-assessment tool assisting governments to adopt open-source practices and calibrate their current policy and technical environment."

## The Model Proposed by Public Digital Ranks Government Capability across Four Areas:

- Policy environment (political leadership and legislation, government standards, and policy)
- In-house skills and capabilities (open-source leadership and coordination, technical skills, or experience in implementing open-source software)
- Open-source vendor ecosystem (open-source procurement policy, ecosystem of vendors at the national or international level)
- Sustainability (funding, ability to manage and maintain software, engagement with the global open-source community)

Public Digital's report postulates that strengthening capabilities in each categorized area will allow governments to increase the probability of successfully and sustainably implementing open-source initiatives.

## How Can Governments Working in the Open Collaborate and Grow?

Interoperability and reuse are important advantages of using open-source software and fosters innovation. However, the mere adoption of open-source software does not translate to an ecosystem of collaboration. A concerted effort toward software sharing is necessary to ensure that open-source adoption leads to collaboration and growth. In their report titled "<u>Sharing Government Software: How Agencies</u> <u>Are Cooperatively Building Mission-Critical Software</u>," Waldo Jaquith and Robin Carnahan from the Beeck Center study how intergovernmental software cooperatives have facilitated software sharing across the US and the world.

The Beeck Center defines software cooperatives as "organizations that are made up of two or more agencies, jointly supporting the development of software for their collective use, operating under some kind of a governance structure." It must be noted that not all software cooperatives studied by this report use purely open-source software models. Many are what can be referred to as gated open-source communities, where the code is available openly to a select few organizations.

The Beeck Center team in their <u>report</u> stresses that "working in the open," which includes the use of open-source software, increases the chances of a successful software cooperative. Jaquith joined the convening panel to discuss important findings from the aforementioned report. He discussed crucial drivers needed to create a successful intergovernmental software cooperative, which included identifying shared needs, the importance of starting and building small, establishing and architecting governance and needs, deciding between insourcing or outsourcing, emphasizing agile development, contracting, and using modern software development practices. Examples of successful software cooperatives can be found referenced across the <u>report</u> and provide an idea for government agencies looking to follow a similar path.

#### What Governance Considerations Go into Facilitating a Value-Creating, Sustainable Open Source in Government Effort?

The Beeck Center <u>report</u> clearly articulates that "the success of a cooperative hinges on its governance." David Eaves, the panel's moderator, couldn't agree more as the author of the recently released report on "Best Practices for the Governance of Digital Public Goods." What applies for DPGs is relevant to open-source products as well given that DPGs are inherently open source in nature.

In the discussion on facilitating a value-creating, sustainable open source in government effort, it is necessary and prudent to ponder on the governance best practices necessary to achieve such an outcome. Eaves's report details six such best practices that are studied through the strategic triangle framework of creating public value, ensuring legitimacy and support, and strengthening operational capability. The report provides existing and potential open source in government effort an in-depth view into the governance considerations required to ensure their efforts lead to sustainable and intentional value creation.

#### Conclusion

Participants in the open-source panel at the Digital Services Convening agreed on the growing importance of open source in the digital government of the future. While panelists felt that open source might not be the answer each time, they felt that in most cases it is always the better choice. Given this reality and the general trend among digital teams across the world to embrace open source, research and discussion on this topic must continue and grow. This article is an attempt at consolidating existing bodies of thought and research on the adoption of open source in government. It can never be exhaustive, and thus if you know of research that deserves a mention here, do write to us or share in the comments section.

### PART 2

# BEGINNING OF THE NEW WAVE OF DIGITAL SERVICE TEAMS

Author: Surabhi Hodigere, Master of Public Policy, 2022

This article delves into how a new wave of digital service teams converge and diverge from the previous ones, examines what characterizes their approach, and sets up challenges that must be addressed in the coming years.

In 2018, the <u>postconvening report</u> declared that digital service teams in governments from across the world are at the **end of the beginning** in a long, and perhaps endless, journey of digital transformation. In describing digital services teams that we will refer to as part of the "first wave" throughout this article, David Eaves and Ben McGuire wrote in 2018 that "the novelty and newness of these teams has worn off; on the other hand, there is growing acceptance by many governments that these teams are a useful tool for driving new practices, particularly agile development processes and user centric design." Four years hence, the time is ripe to conclude that a wave of digital service teams growing through the pandemic years has heralded the beginning of a new era. Governments are waking up to the immense impact technology has in facilitating better public service delivery, and core digital government platforms such as identity, single sign-on, and payment platforms are becoming part of governments' lexicon world over. At the same time, the world, both in general and specific to digital in government, has been changing at a rapid pace and has been further accelerated by the COVID-19 pandemic.

How does this new wave of digital service teams approach what has been described as <u>the North Star</u> <u>for digital service teams</u>? Are they following the same strategies as the first wave? What challenges do they face? A panel at this year's Digital Services Convening brought together representatives from this new wave of teams, including from West Java, Morocco, Japan, and Madagascar, to discuss these questions.

#### New Teams Are More Strongly Oriented toward the North Star

As with the first wave, there is consensus across key stakeholders that the new teams continue to ascertain that "creating or acquiring a core government platform" is the North Star. The first wave was more focused on creating buy-in, testing, and building, whereas the new wave can afford to be a lot less intervention focused. Instead, the new teams are investing in key infrastructure development, which is visible in the prioritization of projects taken up by the new digital teams. For example, West Java is building a platform that helps multiple government agencies within the province to share and reuse data. Similarly, Madagascar is creating an identity management system that allows for data authentication across government services. While new wave teams converge on the North Star, they follow a multitude of approaches. Unlike the provincial West Java team or the federal Madagascar team, the newly formed Japan team found its origins catering to industry. The Japanese Ministry of Electronics and Information created a digital service team focused on providing unique solutions to better facilitate business in the country. One of their products was a unique digital ID for companies, page 14.

#### New Wave Teams Are More Reliant on Collaboration

New wave teams, particularly in emerging economies, were building off of the work done in the first wave. All the new wave teams represented on the panel spent considerable time researching existing digital government efforts and collaborating with the first wave teams and the larger community of digital government actors before arriving at their approach to achieving the North Star. They benefited from the lessons learned from first movers in countries like Estonia, India, the UK, and Singapore. In fact, before setting up the digital service unit, the Japanese office at this year's panel visited, shadowed, and learned from these early movers. In addition, panelists from Morocco mentioned they had benchmarked solutions from relatively newer digital agencies in Australia and Denmark.

#### New Wave Teams Are Prioritizing Political Capital Building

The first wave of digital service teams demonstrated the <u>importance of securing strong political capital</u> to establish and sustain digital initiatives. For example, the <u>GDS was able to cash in their earned political capital to attain domain control</u>, a factor that greatly facilitated their eventual scale. New wave teams had the benefit of learning from the previous teams in this matter; they were aware of, and intentionally prioritized the building of, political capital. In West Java, the new wave digital team is working with multiple provincial agencies on data sharing and standardization. The team's proximity to the governor allows it to work cohesively with multiple agencies, a task that might have proven to be harder otherwise. However, one aspect remained similar across both the new and previous wave teams <u>political actors have overarching authority over the projects they sponsor</u>. This was apparent in conversations in the conveying where panelists agreed that proximity to power often comes with curbs on autonomy. Additionally, the question of what happens when your political sponsor leaves office remains just as pertinent for new wave teams as it did for the previous ones.

## New Wave Teams Continue to Face the Talent Crunch, Struggle with IT Management

That there is a new wave of digital services teams is testimony to the growing importance of digital in government. New wave teams must create, hire, and adapt expertise to sustain this growth, bringing up a plethora of questions on the nature of digital government expertise. How much technological expertise is required to build and handle the digital government of the future? Who trains the existing and next generation of public servants to incorporate digital? What role must consultants, communities, and experts play? New wave teams seem to be more sensitive to the need to manage incentives of other departments, particularly IT. However, there are no clear-cut strategies that are equivocally endorsed by them. Instead, the strategies to work among competing incentives are circumstantial and context based.

#### New Wave Teams Learned from the Past, but Challenges Continue and Are Growing

As the size of the digital government grows, there is an increasing cost to getting things wrong. Questions continue to exist and grow on the governance, funding, and sustainability of digital service teams. In addition, emerging technologies are expanding the boundaries of law and regulation, particularly on the aspects of security and privacy. While the first wave was aware of these challenges, its ability to tackle them was restricted by the newness of their mandate. While new wave teams had the benefit of understanding the depth of these challenges thanks to the previous wave of teams, how they will be tackled going forward is yet to be seen.

### EXPERIMENTING WITH DIGITALIZATION: A CASE STUDY OF JAPAN'S MINISTRY OF ECONOMY, TRADE, AND INDUSTRY

Author: Sechi Kailasa, Master of Public Administration, 2022

In the early 2000s, Japan first announced its intention to take digital transformation seriously. However, it's only now in autumn of 2021, nearly 20 years later, that the country commonly categorized as a paper bureaucracy is finally set to launch its central government's digital agency. Like many countries that had sidelined investing in digital capability, during the pandemic, the Japanese government recognized that this could no longer continue. This article explores one aspect behind this launch: the story of digital transformation within Japan's Ministry of Economy, Trade, and Industry. It's based on the experience of Hiroki Yoshida, who was a leader in the digitalization of services for businesses in METI and is currently working as a director in the newly established central agency. Yoshida presented this case at the Harvard Kennedy School during the spring term in 2021 and at the annual Digital Services Convening in June 2021.

#### Leveraging a Crisis to Push for a New Shift

The pandemic highlighted the impact of a lack of digitalization in Japan when the government was unable to distribute mask supplies or make special payments to citizens efficiently (the local governments systems were highly fragmented such that there were significant time lags between each city). Additionally, not all citizens having digital IDs negatively impacted several systems within the Ministry of Health, Labor, and Welfare (MHLW), the patient record system, the vaccine supply management system, and the contact confirmation app. In contrast, Taiwan and Singapore, Japan's neighbors, were able to use digital technology effectively. Subsequently, there was a strong media spotlight on the inefficiency of the Japanese government. By exposing capability gaps, COVID-19 provided an additional push for the new central agency to be set up.

#### METI Adopted a Platform-First Strategy

METI, the department in charge of coordinating industrial, economic, and trade policy, is perceived to be responsible for Japan's considerable economic growth in the 1960s. While it isn't a central ministry, it's certainly a powerful one. Yoshida was based in the Commerce and Information Bureau (which oversaw industrial policy related to IT and digital government) as the deputy director for digital government. He says that his main motivation was to close the gap between the public and private sectors in Japan, "many private services are viewed as convenient because they utilize digital technology, in contrast many public services that the government is responsible for are still paper-based."

In contrast to many digital teams around the world that focused on citizens, the METI team focused on their main customers—small- and medium-sized enterprises (SMEs) and corporations—and this strategy made them unique. It allowed them to build credibility with their most important stakeholder and to place issues such as privacy and security (more prevalent in the citizen-facing context) to the side, as generally there is less concern for giving unique identifiers to businesses, for example. Businesses are also a much smaller user base compared to citizens, which makes them easier to navigate when attempting digitalization for the first time. In addition to focusing on the above, Yoshida built a vision that was realistic and scalable across government. He focused on his ministry because of the government's siloed nature; it wouldn't have been possible to build something across government with that as the headline goal. Instead, he made sure the components they were building within METI could, when the time was right and enough political capital had been collected, be scaled to other ministries and local governments.

#### METI's Technical Stack Was Inspired by Elements of Other Countries' Digitalization Journeys

The overall technical architecture that was developed by METI is referred to as "gBizStack" (government business stack). It includes several components, visualized below, and was inspired in part by digital transformation efforts in Singapore, Estonia, and India.

Open Data Open source	gBizSTACK		
	gBizINFO Open corporate information	Infrastructure for Multi-layer interoperability Data cleansing tools	
Data Analysis Layer	BI platform for policy making	RESAS BI for local economy analysis	
Data Exchange Layer	<b>gBizCONNECT</b> Data exchange between systems		
Application Layer	<b>jGrants</b> Uniform grants application system	<b>ミラサポ<u>Plus</u></b> Total SME support portal	
Digital ID Layer	gBizID Corporate authentication for government services		

#### Layered Functions Necessary for Government Services

Source: Ministry of Economy, Trade, and Industry

We can understand the stack by starting from the bottom and considering each layer:

- **Digital ID layer**: This is the first layer and consists of a uniform authentication system. The team ensured there were incentives for businesses to use this service; if the business wanted to get to the application layer where it could apply for grants, then it needed to use the authentication service to get there. In their first year, METI authenticated 400,000 businesses, which is about 10% of the addressable market. The service is not restricted to METI; other ministries can also use this platform. For example, the Ministry of Health, Labor, and Welfare started using it for social insurance applications. It is now used by around 32 systems.
- **Application layer:** METI initially focused on two flagship projects for SMEs (as 99% of Japanese businesses fall into this category): i) a uniform grants application platform and ii) a portal that provided SMEs with support. Many SMEs encountered problems when getting grants from the government, and hence the team wanted to focus on improving this in the first instance.

- **Data exchange layer:** As the data is accumulated from the application layer, this layer connects and exchanges the data. The team used APIs to connect the system with other systems. Before this, all the systems were premised on the idea that they couldn't be connected.
- **Data analysis layer:** This layer enabled the use of the accumulated data to inform and improve other services.
- **Open data and open source:** The final layer of the stack concerned opening the data to the public; if businesses or others wanted to use government data, they could access this open data site with information about corporations.

#### The Team Used Several Levers to Enable Digital Transformation

The team started as a very small team with around five people, and it gradually hired until there were around twenty members. While there was an existing IT team, Yoshida's team was focused on digital, since there was a lack of government officers with a background in digitalization the team needed to hire from the private sector. In fact, his team created the custom for this, and other ministries soon followed its lead. It created a **hybrid team consisting of private sector talent alongside eager and passionate professionals in government**. Hiring from the private sector allowed the team to address the lack of capability within government, opened the potential to learn more about IT development, and, importantly, ensured the transfer of knowledge from the private to the public sector.

The team built a network of allies within the government—it attracted passionate, young professionals through its flagship projects. Additionally, the team actively asked other departments what their problems were and how it could help them, helping to build its rapport with them. Most importantly, Yoshida ensured that the METI team had the support of senior management—he did this via build-ing a convincing vision that was both effective and reasonable. The budget director also sympathized with the team's ideas for digitalization. Externally, the team built close connections with Code for Japan and other civic tech organizations, holding conferences about digitalizing government and government technology—these were mediums through which it could attract small vendors and others interested in their work. When the team first created the digital team in METI, it publicized the event and as a result, many citizens took notice of it alongside government officers in other ministries.

As noted briefly above, **the team ensured there was traction with its digital transformation strategy by providing incentives for businesses to use the new services**. That is, they made sure you could only get to the services if businesses went through the authentication process. The team also demonstrated that they actively cared for their main user by creating a central management office for SMEs to support and assist them.

#### The Team's Main Challenge Was Culture

The team faced several challenges, but their main one concerned the culture of their organization many public servants didn't understand the concept of agile or digital. The team tried to integrate the digital team with the existing IT team (which focused on hardware procurement, back-end systems), and together they founded the METI DX office, which integrated the front end (user-centric teams) with the back-end teams as they believed that to build an effective system, the service development side should be integrated with the infrastructure side. They found this to be a difficult undertaking because of the large culture gap that existed within the ministry, but they persisted, and were able to achieve the integration within three years.

#### A Look Forward

The new digital agency, which sits directly underneath the prime minister's team, was launched in September 2021 and currently consists of around 400 government officials with 200 officials recruited from the private sector. Its launch and positioning demonstrate that the government understands the importance of digitalization as before there was very little recognition of this across and within ministries, and there were very few IT experts inside the government. METI's success played a large role in showing an alternative vision for what digital government could look like.

#### The Central Agency Aims to Be Grounded in Some of the Following Concepts:

- No one should be left behind; user-centric services must be developed for all citizens.
- Agile methods should be used (start small, release services quickly, and get feedback from customers early).
- Create a new culture oriented around service development as opposed to hierarchy and bureaucracy. Ensure space for new talent and technologists from the private sector.
- Redesign government digital infrastructure and share the vision with all members in the agency. Develop systems more efficiently and based on APIs, and break silos between government organizations.
- Develop a government stack that can be used across all three levels of government: the central government can offer software as a service to local governments to help them develop their capability as the 1,700 jurisdictions don't have the resources to create their own.
- · Digitalize education, healthcare, and disaster management in the first instance.
- Redesign the security framework.
- Collaborate with government tech start-ups and civic tech to ensure effective citizen centric services are created. Allocate proper roles to government, private companies, and civic tech.

The new agency faces challenges on several fronts. First, it is quite large, which could impact how quickly it can implement strategy. Second, it will need to manage the cultural gap that exists between government agencies and private sector talent. Finally, and perhaps most importantly, it must think carefully about the framework it adopts as it will be the baseline and foundation for all future work going forward. While these are considerable tasks, it is exciting to see the Japanese government start this next phase of digitalization.

## LEVERAGING EXISTING TOOLS EFFECTIVELY: COLORADO'S MODERN SOFTWARE DELIVERY MATURITY MATRIX

Author: Leonie Bolte, Master of Public Administration, 2022

This article explores how digital service teams can benefit from adapting existing digital tools as opposed to creating them from scratch as well as highlights the importance of working in the open. The Colorado Digital Team's Matrix provides a case study on how to do this.

#### The End of the Beginning of Digital Service Units

One of the outcomes of the 2018 Digital Services Convening at the Harvard Kennedy School was the theme of <u>the end of the beginning of digital service units</u>. As part of this theme, the group called for "<u>maintaining or building political capital . . . to prepare for the next phase [of digital service units]</u>." Different digital service units—such as the Colorado Digital Service (CDS)—are following this call only three years later. CDS's <u>Modern Software Delivery Maturity Matrix</u> is an exemplary attempt to develop a digital service standard minimum viable product (MVP) inspired by other digital service tools to build political capital for their project work.

The Digital Services at the Harvard Kennedy School initially proposed a <u>maturity framework</u> for public sector digital services in 2018. The framework helps to contextualize the current status of a digital service unit and allows setting milestones for the future. Since then, this maturity framework has inspired at least two other tools. The first tool is Public Digital's <u>Open Source Capability Model for Governments</u>, which was developed to provide stakeholders with an overview of their open-source capabilities. The second tool—and the focus of this article—is the <u>Modern Software Delivery Maturity Matrix</u> developed by CDS.

#### What Is the Colorado Digital Service?

CDS is a digital service team that operates on the state level. Established in <u>October 2019</u>, the team works on the governor's top priorities. It describes itself as "<u>a diverse cross-functional team</u> of senior engineers, designers, product managers, and procurement specialists serving limited <u>'tours of civic service' (six months to two years) in government.</u>" CDS works jointly with civil servants in the and across state agencies during these tours.

#### A Project Triggered the Development of the Modern Software Delivery Maturity Matrix

The development of CDS's very own Modern Software Delivery Maturity Matrix was triggered in the <u>summer of 2020</u> when it worked with the team that oversees the state's child welfare system. To kick off their work and better understand the project environment, CDS conducted a discovery sprint with two goals in mind. It first wanted to evaluate the maturity of the state's child welfare system project and then strove to identify measures through which they wanted to advance the project.

The team collected the data to fulfill its two goals. However, as Karyn Lu, a CDS alumna and then project member, puts it, "<u>our insights made sense to us, but felt fragmented and untethered as we cob-</u> bled together a report intended for an audience with very mixed levels of expertise in modern software <u>delivery practices</u>." Hence, the team started to investigate potential options to organize and better communicate their thoughts.

While many foundational tools around service standards exist, none of the tools fully fit the two specific needs of CDS. For example, Harvard's <u>maturity framework</u> for public sector digital services holistically evaluates the maturity of a digital service unit. CDS, however, needed a tool that would allow it to assess maturity on a project level. It set to work on developing a framework appropriate for its local context that would best enable it to deliver value to its citizens, and the idea of the Modern Software Delivery Matrix was born.

In its MVP version, the <u>Modern Software Delivery Maturity Matrix</u> has two axes. The first axis consists of eight categories:

- team culture
- purchasing vs. procurement
- modular contracting
- a user-centered approach
- product ownership
- agile software development
- DevSecOps
- building with loosely coupled parts

These categories are then detailed and potentially scored on a maturity scale: low, medium, and high.

#### The Maturity Matrix Builds on Three Existing Tools

The framework for the Maturity Matrix draws on three foundational tools: the maturity framework developed by the Harvard Kennedy School, the UK GDS's <u>Service Standard</u>, and the <u>Quality Assurance</u> <u>Surveillance Plan</u> (QASP) developed by 18F.

These three tools were developed with different targets in mind. The first framework—Harvard's maturity framework—is a maturity benchmarking tool for digital service groups. It also allows one to define a future target for the service group under consideration. In contrast to this, GOV.UK developed its Service Standard as a set of criteria that government teams ranging from central to local must meet when they build a digital service. It enables teams to create and operate inclusive, effective, and commonly agreed to be good digital public services. 18F's QASP focuses on assessing software requests for proposals, and its ultimate goal is to ensure vendors deliver work that meets the needs of a custom technology project.

In this light, it is no surprise that the tool developed by CDS was inspired by different aspects of the three foundational tools. The team drew on aspects that it deemed as fundamental for digital service and product teams. For example, CDS's categories of "purchasing vs. procurement" and "modular contracting" are inspired by the overall content of the quality assurance plan. As another example, all three tools strongly emphasize a user-centric design. This consensus is echoed in CDS's matrix by the category of a "user-centered approach." While CDS's maturity axis drew on Harvard's maturity framework for public sector digital services, it refrained from defining a future state.

CDS also went beyond the three tools to emphasize topics it deemed especially important. For example, it views culture as key for its Modern Software Delivery Maturity Matrix because "<u>the human</u> <u>layer is the foundation that needs to be in place before a team can operate effectively</u>." None of the tools feature culture as prominently as the Modern Software Delivery Maturity Matrix. Hence, in this case, CDS shifted the tool focus to an area it considered crucial.

#### CDS Used the Modern Software Delivery Maturity Matrix to Identify Levers for Change

In practice, CDS used its Modern Software Delivery Maturity Matrix to evaluate the child welfare system project's maturity and identify levers for change. First, the group assessed the project, and the assessment showed, for example, that the project was not well positioned to enforce quality standards on the team's vendors. It also showed that the project had strong product managers.

Next, CDS focused on levers of change to drive the project forward. After negotiating with the human services agency, the team decided to hire talent to increase the level of software delivery maturity for the child welfare system team. In more specific terms, it focused on hiring the senior-most engineer for the project—a tech lead. The team chose this particular lever because it assumed that it would be an enabler for multiple categories in the framework. For example, the lever may help to increase maturity for team culture and purchasing vs. procurement simultaneously.

#### Other Digital Service Groups Can Learn from the Maturity Matrix

While the Modern Software Delivery Maturity Matrix holds many lessons, three lessons are especially interesting:

- The development process shows one path to build up the lever of a service standard.
- The matrix positioning illustrates the value of transparency and openness for discussion.
- Levers such as standard tools must be used appropriately.

First, the Modern Software Delivery Maturity Matrix shows one possible path to build up the lever of a service standard. Developing and setting (service) standards is often viewed as <u>one of the levers</u> that a digital service group can use to influence an organization or a project. These potential paths can include forming a standard for one's own digital service unit or using an MVP as a consulting tool to structure project conversations. CDS pursued the latter path, proving that adapting existing tools is an opportunity to structure consulting conversations on the ground. This can then help identify the most critical levers so that change can be fostered while other aspects of the maturity remain low.

Next, CDS's case illustrates the value of tool transparency and openness for discussion. For example, CDS published their tool on their <u>GitHub page</u> and made it open for reuse, and it also encourages users to provide feedback on its tool. This move fosters the knowledge exchange among different digital service units and leverages input for improvement from the outside world beyond said units.

Finally, levers such as standard tools <u>must be used appropriately</u>, meaning not only does selecting the right levers matter but effectively using the levers is also equally important. CDS found the tool helpful for the child welfare system project but noted it did not reuse it as much as expected. While the team <u>attempted</u> to leverage an adjusted tool for another project, this idea ultimately failed. Additionally, the tool has not been updated beyond its original publication on CDS's GitHub page, partially because the team has since pivoted away from doing discovery sprints where the tool was most useful. However, in hindsight, one might ask if the team—knowing what it knows now—would develop the tool in the same manner, for example, if it dedicates the same amount of human resources to the tool's development.

Overall, digital service teams considering altering foundational tools should consider the lessons mentioned above. However, the most important takeaway from the CDS's example is that it illustrates how digital service teams **can benefit from adapting foundational digital tools** for their purposes.

### PART 3

## A PUBLIC SERVANT'S PERSPECTIVE: APPLYING DIGITAL IN A NONDIGITAL LANDSCAPE

Author: Sechi Kailasa, Master of Public Administration, 2022

The word nondigital is used in this article. This isn't intended to be a negative phrase but rather indicates that digital ways of working have not yet fully extended into every context.

This year was the first time we had a panel at the convening consisting solely of public servants who weren't or hadn't been based within digital service teams. Alongside myself, we were joined by colleagues from Madagascar and Canada to explore the following questions: What does it feel like to be a public servant interacting with digital service teams, their processes, standards, and ways of working? Do digital service teams attempt to understand such perspectives? Digital service teams tend to think about citizens as their end users. However, internal users are also a key end user group as they are responsible for driving an organization's digital transformation, therefore it seems critical that they should take them into account.

This article is based on my experience of being a civil servant in the UK government. It offers one narrative of experiencing the services of a central digital service team, and therefore you need to be careful about what you extrapolate. However, the experience hopefully offers an opportunity to reflect on your own context. I was based in a home department in the government, in the UK this means you're not part of the central government. I was in the IT function, on a graduate leadership program, and had two main roles. One involved functioning as an IT project manager, and the second involved contributing to the product management of the service we were building. We were a small project that fell under the threshold required for a project to undertake centralized GDS assessments. We wanted to be nimble and agile and aimed to go into <u>private beta</u> within 15 weeks, we hired a vendor to build the service. Importantly, while we were not a GDS project, we still needed to pass internal GDS style assessments and ensure we met <u>GDS spend control requirements</u>, both of which required us to meet the <u>Service Standard</u> (set by the central digital team GDS).

## There Are Different Ways to Work with a Central Digital Service Team; We Were Using Its "Manual"

In many ways, working on the project felt like experiencing government at its very best; it involved a multidisciplinary team, collaboration between policy and implementation (no silos), and a highly trusting relationship between all team members and the vendor. However, there were certain aspects of the project that, looking back, offer some insight into potential ways that central digital teams can improve their work's impact. The project was not an official GDS project—technically, we were trying to navigate the system simply based on the documentation that GDS issues—so their processes, protocols, and standards. Unlike some of the other panelists who were working more directly with digital service groups and were provided central team resources, we were essentially using the manual.

#### The Journey at Times Felt Like You Had "two" bosses

We had to follow both the GDS processes, for example, spend control *and* the internal protocols specific to the home department. **The two processes at times felt like two very different forms of compliance.** While we tended to receive a positive and receptive reception from one, the GDS, the internal IT function didn't necessarily agree that we met all the requirements we needed. It's important to note here that it's not always the case that the internal IT requirements were unreasonable; for example, the IT function could have a high security threshold due to the nature of projects under its remit. However, we didn't fall into this category because we were a small, low-risk project; the department didn't really have a place for projects such as this within its organization structure, so we had to comply with the forms of compliance of where we were placed. This demonstrated that as far as digital teams have come, there is still a way to go in terms of creating a space for working in this way beyond the central digital teams themselves.

Digital teams often say that they're trying to help you, but *only* holding this perspective tends to overlook the high burden on the public servant who is trying to meet two processes at once and trying to apply digital ways of working in a as of yet nondigital, risk-averse, culture. As a result, the digital team's processes almost became additional hurdles we had to meet on top of everything else— which, even if we devoted time to, didn't make the other processes easier. One strategy to overcome this could involve first thinking through and mapping out whether the two processes are complimenting each other (the central digital team's process and the department's), figure out where the pain points are, and determine how they can be alleviated—what needs to change, be put in place, or removed because it's redundant.

#### Central Digital Teams Should Provide More Tools for Public Servants Trying to Apply Digital Ways of Working in Nondigital Environments

When we were trying to be an agile project, there were several tools that could have really helped us along the way if there were examples that we could draw upon, for example, an agile business case. Currently, it is difficult to build a standard business case (which requires high amounts of certainty upfront) for an agile project as you start with many unknowns. In the initial few months, a business case can be iterated as more information is discerned from user testing. However, it would have been useful to have seen a blog about this and how other projects have handled this—going beyond just the guidance currently offered on the GOV.UK website.

#### "Digital" Is Not Yet Pervasive, and There Is Still Work to Do

Unlike in the article below, digital culture wasn't pervasive, and we still had to raise awareness of agile and have conversations with colleagues. This should not dissuade from the tremendous amount of progress that has been made to date—digital teams such as the GDS in the UK have changed the way the government functions, accepted ways of working, and, importantly, the expectations of internal and external users. However, there is still much work to do to translate digital ways of working and agile into the wider government. One important strategy could be to focus on improving the services offered to public servants.

#### Public Servants Must Be Considered as a Key User Group

It was clear from this experience and the panel at this year's convening that public servants are critical consumers of digital service units, and we must think about them much more than we perhaps currently do. The following are suggestions for potential strategies that could be adopted:

- Digital service teams could ask public servants for feedback.
- Pushing "out" digital ways of working via creating service standards, working in the open, and creating digital academies aren't the only strategies that should be employed to raise awareness. Considering the public servant's point of view and the barriers they face when actually implementing these ways of working could be a key way to ensure digital's impact is far-reaching.
- Digital teams could create a playbook for public servants attempting to practice digital ways of working which could include topics such as how to overcome common hurdles.

There needs to be a space and approach to hear the concerns of public servants who are using these processes, feel things aren't going smoothly, and feel like they're trying to navigate a as of yet nondigital culture. Digital service teams have an important role to play in creating this space and approach.

## CONFRONTING A PANDEMIC: THE CASE OF NHS TEST AND TRACE

Author: Sechi Kailasa, Master of Public Administration, 2022

One of the panels at this year's convening included colleagues from the UK's NHS (National Health Service) Test and Trace team. They noted that it was only possible to stand up the organization because of the capability that had been put in place by the UK's GDS and NHS Digital. This existing capability provided them with much-needed speed and reliable processes and ensured the quality of their own services and products. In this article we explore how the team was able to positively impact public health and confront a pandemic, in large part due to the investment in digital transformation capability that has been occurring throughout the past decade.

NHS Test and Trace is an emergency response organization that was set up in the UK to protect public health during the COVID-19 pandemic. The organization was responsible for the entire user journey from testing and contact tracing right through to providing self-isolation support. By the time of the convening in June 2021, the Test and Trace team had created over 100 different products, services, and guidance spanning both the GOV.UK and the NHS website. Their remit also included distributing and rolling out tests across the country; they undertake up to five million tests a week. Due to the organization's emergency nature, they were essentially given the <u>magic wand lever</u> and were able to operate largely free of bureaucracy. This enabled them to remove traditional hurdles such as those found in procurement and hiring processes to speed up delivery and set up the organization.

The team was only able to have this impact because they were a beneficiary of the GDS and NHS Digital Capability. In the rest of this article, we consider the dimensions through which it benefited.

## The Test and Trace Team Had the Mandate to Set Up a Digitally Native Organization

The NHS Test and Test team had the authority to truly set up an <u>internet-era organization</u>. Authority here consists of the power to make decisions—they had the <u>magic wand lever</u> and were trusted to use it. This lever is defined as having the ability to redesign rules or processes that must be adhered to by others—essentially, the team were able to be rule setters. Being an internet-era organization meant the team were digitally native and everyone instinctively knew how to work digitally. The team didn't have a separate digital unit tucked away somewhere in the corner that would tell others that users should be considered—*everyone* already knew this principle and applied it in practice. There was no cultural battle between those who were comfortable working digitally and those who weren't. Additionally, the team knew they had to be omnichannel in its delivery of services and products. No one had to explain where digital fits in or include the service design function within the digital capability—the *whole* team was user needs focused. This isn't the typical organization structure normally found in government departments.

#### The Team Was Able to Circumvent Traditional Processes in Large Part Due to the Capability Put in Place over the Past Decade

The team, as noted above, was able to remove traditional hiring hurdles and hire staff at speed because of the authority they were given. Importantly, they could draw on the readily available talent and communities of practice that had been developed since the creation of the UK's GDS, and this talent wasn't just located in the central government. Another reason the team was able to do this quickly was because they could draw on the <u>hiring frameworks</u> that had been created for digital roles.

#### New Hires/Existing Civil Servants Already Knew How to Work Digitally

The newly hired individuals were already familiar with GDS frameworks, protocols, assessments, and standards as they had worked with them and done their tours in government. This was an important element of standing up the NHS Test and Trace, and the central team's job was reduced to just placing individuals into teams to build digital services, which they already knew how to do. It wasn't enough to have the standards that demonstrated the right way of working; the team needed people who were actually experienced at using them. The team was also able to draw in private sector hires. While the hires might not have been completely familiar with the standards and protocols, they were so intuitive that they understood them in a matter of weeks and could offer a counter perspective.

## The Team Didn't Have to Reinvent Tools and Processes, This Allowed Them to Set Up Fast and with Quality in Mind

Over the years, the UK's GDS had put together a wide variety of tools: <u>the Service Standard, a method</u> to develop digital services in government, and <u>the GDS Assessment</u> to test whether a service met the Service Standard at each stage in the delivery strategy. They also enabled the creation of common design patterns that could be copied across services and communities of practice. In addition to the GDS tools, there is also the NHS Digital Service Standard and the NHS and GOV.UK Design Systems. Digital capability had become quite a mature capability, and the team could draw from this. They didn't have to reinvent the wheel and could use what had become standard practice and influential beyond the public sector.

#### They Used the Tools to Align and Strategize

Due to the nature of the pandemic and the constantly changing circumstances, the team couldn't always meet all of the requirements a service typically requires. The pandemic's ambiguity usually meant that a new issue generally had to be prioritized over the continual improvement of a live service. However, the practices, standards, and guidance listed above guided the team's strategy. They used the standards to ensure they were building something that was at least minimally acceptable and where possible met all of the standards. They used them to pivot and re-align work, and the magic wand lever was crucial in allowing them to make these decisions as the pandemic progressed.

## The Team Had a Challenging User Base, So They Adapted the Standard Methods of User Research Accordingly

The team ensured they tested with the most vulnerable groups and used trauma-informed user research techniques. Managing the customer experience in a complex changing situation is challenging as the impact isn't linear, but they did use a variety of ways to ensure they got feedback ranging from market research surveys to classical metrics (e.g., customer satisfaction and tracking brand trust) to digital analytics, behavioral scientists, and social researchers being consulted.

The NHS Test and Trace team had a huge impact on public health and were able to meet the government's needs on several fronts. This was only possible due the maturity of the digital capability that had come to be since the GDS and NHS Digital were created, and the investment into building this capacity played a significant role in enabling the team to confront a pandemic.

### PART 4

# THE APPLICATION OF LEVERS FOR DIGITAL SERVICE GROUPS

Author: Lauren Lombardo, Master of Public Policy, 2021

After the 2020 Digital Services Convening, David Eaves, Tom Loosemore, and Lauren Lombardo published a paper titled "Introduction to Levers for Digital Service Groups." This paper sought to understand how digital teams use (or aspire to use) levers to scale impact across the government. It focused primarily on defining levers and mapping how they might be secured and used to influence or mandate change. In addition to analyzing how levers could be operationalized, the paper published a categorized list of them. This list was socialized before and during the 2020 convening and was later updated based on feedback from convening attendees.

The 2020 paper communicated four key takeaways:

- 1. Levers can be given or built. A digital service can be granted levers by an external authority or build its own. Successful teams should collect a combination of both types.
- 2. Voluntary and mandatory levers can be equally powerful. A group should pursue the combination of levers needed to execute its transformation strategy.
- **3.** Levers must be used appropriately. Overusing a lever can create resentment, but underusing it can lead other departments to ignore the group's power.
- 4. Levers can compound over time. Levers are used to achieve a particular end. This political capital can be used to accumulate even more power over time.

The 2020 convening conversation and accompanying paper succeeded in creating a shared framework with which to discuss the power of digital service groups. It also allowed us to begin analyzing this power's practical implications. However, the 2020 work exclusively mapped these frameworks to GDS as a means of understanding application and impact. At the time, this allowed us to get the conversation started using the lived experience of Loosemore.

During the past year, we've spent time discussing this framework with a variety of digital service groups and have had many more chances to apply the model. For this reason, we were able to spend part of the 2021 Digital Services Convening digging into how these levers apply to a variety of digital service groups. We examined case studies from four distinct digital service groups: CDS (United States), GovTech (Singapore), Communication and Information Technology Authority (Mongolia), and the Department of Health and Social Care (United Kingdom). These case studies not only showcased the power of different levers but also provided four unique ways that teams might secure and use the levers in their control.

#### **Colorado Digital Service, United States**

(levers: service assessments—the group assesses whether a new service should go live and ensures that all new services meet its standards; hiring—the group can attract and hire new digital talent)

The CDS team created a service assessment, referred to as the <u>Modern Software Delivery Matrix</u>, to determine if a project would succeed in meeting the digital team's service standards. This matrix

incorporated elements from GOV.UK's service assessment and I8F's Quality Assurance Plan and provided a framework the team could use to assess projects. For more context, read the above article entitled "<u>The Next Phase of Digital Service Teams Can Benefit from Existing Digital Tools</u>" on page 24.

During the convening, this case revealed two important connections to our 2020 framework: the power of voluntary levers and compounding levers. First, the CDS team was not granted the service assessment lever but rather built it during a project on Colorado's child welfare system, making this service assessment a great example of how much power a self-built, voluntary lever can have on shaping or shifting decisions when used intentionally.

Second, when the CDS team began using this lever during the child welfare system project, it noticed that the project was at "low maturity" along the engineering dimensions and the state was not positioned to enforce quality standards on the procured vendor. Because the team was able to point out these problem areas during the project, it was able to propose and support solutions for issues that would have otherwise been barriers to success for the project.

Importantly, the agreed-upon solution was that the CDS team would have direct hiring authority over a tech lead for the project, who would act as the senior-most engineer. In this instance, the CDS's assessment lever was used to provide the team limited access to the hiring lever. Although the compounding influence of the service assessment was temporary and constrained in this instance, the team was able to successfully leverage its existing power to access and exert additional capabilities necessary to successfully complete this project.

#### GovTech, Singapore

(lever: procurement-shape or influence the procurement process to simplify the process or improve the quality of outcomes)

While the CDS team's service assessment is a great example of a voluntary lever, the GovTech case showcases how a strong, mandatory lever can be used to effectively implement governance processes changes. The GovTech team leveraged the procurement lever to build an agile-aligned procurement process that other government departments could opt in to use. Not only did GovTech's procurement model create a viable option for efficient and collaborative procurement, but it also provided the GovTech team with the ability to set procurement rules and guidelines for any departments that used its process and system.

GovTech's procurement system establishes demand aggregation contracts with flexible terms, allowing for the later addition of new suppliers and requirements. The team also reengineered the procurement process to reduce individual agency effort. Its efforts resulted in 30 demand aggregation contracts for several competencies including cloud, data science, and cybersecurity that any agency can leverage. These changes have reduced the time required per procurement period from five business months to five to ten business days and resulted in a 30% cost saving and 50% effort reduction. This success has also helped GovTech build relationships with government departments and show value to political leaders.

#### **Communication and Information Technology Authority, Mongolia**

(levers: communications power-group has access to communications platform; cool factor-the group is the first to access and use new tools)

The Communication and Information Technology Authority began using creative public outreach and communication practices to increase public trust in government programs and services. As part of this

campaign, the team worked with a network of social media influencers to test and promote the <u>e-mongolia</u> website. These efforts were centered on trying to change the way citizens traditionally perceived the government and were contingent upon the team's communications power and cool factor levers.

The team already had communications power through its established government function. However, while the communications power lever was strong, it was not flexible or boundless. For the team to implement its influencer-oriented approach toward community outreach, a novel idea at the time, it had to push for the cool factor lever. Upon securing the cool factor lever, and therefore the ability to work creatively with social media outlets, the team was able to use its success to prove the value of new practices and overcome the inertia of existing, outdated approaches.

This case touches on the importance of properly combining several levers to reach a certain end. Many of the levers digital service groups may use are fine independently but become truly powerful when used together. In this instance, communications power was a strong lever, but the team was only able to be truly transformative when it was able to join this lever with the cool factor lever.

#### Department of Health and Social Care, United Kingdom

(lever: magic wand-the group can avoid rules and processes that must otherwise be adhered to)

The UK Department of Health and Social Care presents an interesting case of both rare and transitioning levers. Because the organization was in the midst of responding to the COVID-19 pandemic, many teams within the department were granted the magic wand lever. This extremely rare lever allowed the organization to operate outside of regular, bureaucratic traditions.

The lever enabled it to remove many of the typical hurdles, including those involved in traditional procurement and hiring processes. As discussed in the "Confronting a Pandemic: The Case of NHS Track and Trace" article, this lever was granted to the Test and Trace team and is largely responsible for that team's ability to respond quickly at the height of the pandemic.

However, many of these bureaucratic norms are established to protect both the government institution and practitioners. Further, long-term organizational change will likely come from modifying and improving these governance structures, not by allowing some teams to circumvent them. For these reasons, the magic wand lever is frequently not a sustainable, long-term tool.

In the 2020 article, we discussed how levers transition over time. Now, as the COVID-19 outbreak moves from novel to endemic, so too will many of the levers granted as crisis response tools transition into more suitable long-term powers. It will be interesting to see which powers this team is able and willing to retain and which ones it will attempt to roll back.

## WISDOM FROM EXPERIENCE: THREE OF THE WORLD'S TOP DIGITAL GOVERNMENT LEADERS SHARE THEIR LESSONS FOR GETTING THINGS DONE

Author: Beatriz Vasconcellos, Master of Public Administration in International Development, 2021

#### Context

The last panel of the convening gathered three senior digital government leaders to reflect on their experience leading some of the most successful digital teams in the world. The three panelists had distinct and complementary trajectories that added to the discussion. The first, Cina Lawson, is the current minister of digital economy and digital transformation as of November 2021. She has been in that role since 2010. Initially considered an outsider, today Lawson's success is frequently associated with her previously accumulated private sector experience in Europe and the US.

The second, Matt Cutts, served as the head of USDS from 2017 to 2021. Before USDS, Cutts worked for almost ten years at Google, where among many of his contributions was the development of the search engine. He joined USDS originally from the Department of Defense in 2016, and upon being appointed administrator in 2017, he experienced the transition between presidents Obama and Trump. Cutts had to adapt to getting things done in the context of a shift in national policy agendas.

The third, Tom Read, became the CEO of the UK's GDS after more than four years serving as chief digital and information officer at the Ministry of Justice. Read's background put him in a strategic position as an insider to the organization with a lot of experience in execution. This enabled him to quickly realize that the GDS should better define its boundaries and objectives when working across departments.

Despite the differences in context and background, the panel was focused on finding their shared lessons. Specifically, we focused on their priorities, routines, and visions and found many of them converged. Most importantly, the three agreed that the hard part about being a leader in the digital space isn't defining the strategy but delivering it. To be effective, they must be able to navigate internal and external relationships, developing skills such as convincing, motivating, creating a shared vision, being clear about the agenda, and building trust.

Throughout the discussion, there were five main shared lessons for getting things done:

- 1. Look for sticks but avoid using them.
- 2. Frame your message differently according to the audience.
- 3. Bring digital and IT teams together.
- 4. Decide and be clear about the teams' boundaries.
- 5. Remember your North Star but be flexible during a crisis.

The focus of this article is to expand on each of these lessons and derive insights for how leaders in the digital space can get things done.

#### Five Lessons for Getting Things Done

The role of a digital leader is not always clear. Even when it is, what should one expect once in the job? The truth is that most likely the person who takes on a leadership position doesn't know. Even

experienced and outstanding professionals like our panelists admitted having some insecurities when they became the heads of their countries' national digital teams. What they learned on the job is that the hardest and perhaps most important part of their mission to advance the digital agenda is to convince people that they will benefit from it. In the lessons below, they share insights on how to get political support and mobilize people and resources to get things done.

#### Lesson 1: Look for Sticks but Avoid Using Them

Large digital transformation projects in governments often involve governance changes and renegotiating power relationships. For example, in a project to build a unified notification system, the teams in every ministry and department might feel that their working process is being supervised by— or dependent on the performance of—another agency, meaning they are losing ownership. To overcome these barriers, some leaders prefer to use a top-down approach, leveraging their legal and hierarchical power. This approach is sometimes referred to as "using a stick." While the panelists agreed that it's critical to their role to maintain or strengthen their formal power structures, they suggest that leaders avoid explicitly using them.

The biggest reason for not using a stick is straightforward: people don't want to feel like a condition has been imposed against their will. In the long run, using formal power makes one more likely to have enemies, and this prevents serious work from being done. This is true even if the stick enables a project to be executed in the short run. Consider, for example, a change in leadership in the department that has used the stick in the past. The new leadership will arrive at the office being locked out of many departments, and opening doors again is burdensome and sometimes impossible if trust has been broken. Ultimately, the excessive use of power raises attention, making it more likely that other groups will want to remove some of the sticks from the owner.

Therefore, although it takes more time in the short run, focusing on motivating people and having allies tends to be a more effective approach in the long run. Some examples that Lawson, Cutts, and Read described were publicly acknowledging colleagues for their achievements, creating internal challenges to generate new ideas, and developing motivational laptop stickers. They found that in most cases they were able to mobilize more people with this approach.

#### **Example of Sticks Covered in Cotton**

One example of sticks covered in cotton can be to use legal mechanisms to keep projects secretive. The advantages of this approach are that it gives the person using it less time to be criticized or to present the project only once there is a concrete prototype. It might be easier to convince someone of a project when the benefits are tangible.

## Lesson 2: Frame Your Message Differently According to the Audience

Every person has their own bias in the way they receive a message. We are all subject to different previous experiences, political and religious views, and personal values, and these influence how a person makes a first judgment about a project. These biases and experiences also tend to be accompanied by a specific vocabulary. For example, when developing a COVID-19 contact tracing app, a person who supports individual freedom will probably be immediately resistant if they hear the word "surveillance" or even "tracking" being used to describe the project. The panelists highlighted that a large part of their role in gaining allies is adapting their messages to different stakeholders and audiences.

#### **Example of Framing Affecting Perception**

Digital transformation can make things cheaper while also improving the core service experience. One particular project made a service radically simpler and removed bloat. Staffers learned that when the project was described as "virtual deregulation," it got more support from people who value less state intervention. At the same time, the project still improved the experience for vulnerable populations.

#### Lesson 3: Bring Digital and IT Teams Together

Digital transformation projects can face many sources of opposition. One is internal conflicts between the digital teams and the traditional IT team. While the former often work on political projects and leverage innovative practices (e.g., agile methodologies), the latter usually deals with more technical matters (such as internal network, servers, IT equipment, stabilizing long existing or legacy systems). Digital service teams often try to avoid being compared with IT and as a result sometimes avoid engaging with the department, which is a mistake since doing this prevents them from learning about

essential processes and getting more technical minds to collaborate on their projects. Ultimately, this attitude and the fact that IT professionals might see digital professionals as a threat can result in resentful relationships. It's hard to imagine how governments will become effective in the digital era without the support and engagement of traditional IT groups.

How can we solve this conflict? The three panelists agreed that heads of digital government should play a stronger role in bringing those teams together. In "You will be amazed how similar an IT engineer and a digital technologist are. Co-locating workers is amazing."

—Tom Read

their views, digital and IT teams have a lot in common. For example, they usually get excited about technology-related topics, and the solutions they brainstorm together tend to be more effective. Therefore, backing and getting the support from IT teams is key to the success of digital projects.

#### **Getting IT and Digital Teams Together**

Minister Lawson is a strong advocate for interteam collaboration. She encourages digital professionals to go to different departments and talk to IT to develop a shared vision and explore opportunities for mutual gain and support. Her teams have also used visual elements such as laptop stickers to enhance their collaborative spirit.

#### Lesson 4: Decide and Be Clear about the Team's Boundaries

What is the role of a digital team? Even when a strategy is well defined, there is significant latitude around what work they should do and where and when they should intervene. Read highlighted the consequences of not making clear the criteria for deciding on the scope of work. There is also a matter of respecting other teams and being humble in the approach. Eventually, digital teams can end up doing projects that could and should be undertaken by other departments. The consequences are not only a deviation of focus from the main objectives and a waste of human and financial resources but also a loss of political capital by intervening too much on other teams' agendas.

The questions that remain are how a team should decide on which boundaries it will have and how to communicate them. The panelists offered two insights. The first is to prioritize projects aligned with the digital team's main values and principles. For example, its mission might be related to efficiency and cost reduction, like the X-Road team in Estonia. Therefore, such an organization would probably prioritize projects that reduce administrative costs over one whose primary goal is to expand social protection.

Still, even if the goal is to save money, should a federal digital unit be responsible for all cost reduction projects? The second insight from panelists is that it shouldn't. They believe that the most effective use of digital teams is to work on problems that go beyond a specific department and require coordination. For example, a cross-department digital team would be more effective when working on a process that is being done in multiple ways by different departments. In that case, the digital team finds one common and more efficient solution, saves money, and adds value to every team.

#### **Deciding What Not to Do**

In May 2021, the UK's <u>GDS set a new strategy</u> for the next four years. Besides being clear on the five missions it intends to focus on, the last section of the strategy is dedicated to what it won't be focusing on. That list includes, for example, legacy technology and cyber risk, which will have the support from the Government Security Group, and running programs that departments and agencies are capable of doing themselves.

#### Lesson 5: Remember Your North Star but Be Flexible in Crises

Once a strategy is set, getting things done requires building political capital to mobilize resources, as explained in the previous lessons. However, like any government institution, it is highly likely that a team will face crises—probably many. When they happen, two common reactions occur: the leadership prioritizes the crisis response and shifts long-term priorities based on the new context or is somehow inflexible to the new context. Although the latter is rare, when a team drafts a strategy, it rarely accounts for changes in plans.

Our panelists therefore suggest that the strategy should be seen as a North Star. In the short term the trajectory toward the final goal will not be linear, and you will have to deviate from the goal to solve the most urgent public problems and to gain political capital. But in the medium run, the trend toward the North Star should be positive. If a project isn't solving a crisis, building political capital, or isn't aligned to the long-term vision, it probably shouldn't be undertaken.

#### Conclusion

As Lawson, Cutts, and Read reminded us, experience matters when it comes to getting things done in the digital government realm. But unlike before, we now have a growing community of digital enthusiasts across government departments who are willing to support and advocate for the work to be funded, even in the face of failure. When leaders like these panelists get together and share stories, a lot of knowledge is generated and we all incorporate some insights from their experience. We can only hope there will be more moments like this.

### **RESHAPING THE VENDOR ECOSYSTEM**

Author: Rebecca Moore, Master of Public Policy, 2021

#### Introduction

A key theme throughout this year's convening focused on asking, "What's next after COVID-19?" Specifically, many participants and panelists discussed how the COVID-19 pandemic became an accelerant for digital government projects and programs, with one participant stating that "during COVID-19 we were able to do a lot of procurement bypassing . . . but after this passes, we will fall back into traditional procurement."

This question as it relates to digital procurement became a central backdrop in the "Reshaping the Vendor Ecosystem" panel discussion. Panelists Bryan Hirsch, chief digital officer at Massachusetts Digital Service in the US, and Warren Smith, program director at Global Digital Marketplace in the UK, discussed best practices and lessons learned in digital public procurement, focusing specifically on the role of digital service groups in the vendor engagement life cycle.

Throughout the discussion, two key challenges emerged:

**Key Challenge 1:** Increasing the vendor pool. How can digital service groups increase the size and quality of their vendor pool throughout the public procurement process? **Key Challenge 2:** Centralizing versus decentralizing procurement. How can digital service groups champion sound purchasing decisions across the government digital marketplace?

The following recaps and analyzes the panel discussion in the context of the two key challenges, highlighting the similarities and differences in the tactics employed by each panelist's respective digital service group.

#### Key Challenge 1: Increasing the Vendor Pool

Both Hirsch and Smith emphasized that a key first step to cultivating a vibrant vendor ecosystem and ensuring successful project outcomes is reducing barriers to entry for vendors in the public procurement process. However, both had their own explicit tactics.

One of Hirsch's team's most recent digital government success stories is its end-to-end work supporting the Department of Family and Medical Leave to create the first digitally native constituent service in the Commonwealth (digital Paid Family and Medical Leave Program). Hirsch and his team focused on proactive vendor ecosystem development, a tactic he calls "Recruit an A-Team." Through this strategy, the team aimed at increasing transparency into the process for vendors by simplifying the process through an education campaign. Captured below are the varying education campaign tactics the team used aimed at reducing barriers to vendor participation:

- 1. Developed blog posts aimed at and used social media to engage with diverse sets of vendors and used the platforms to "convince the world we [Massachusetts Digital Service team] are working with new tech and want to bring in new vendors."
- 2. Recruited at conferences and handed out informational flyers: "We handed out flyers that basically stated, 'We know it's hard to work with the government, we know our procurement processes are difficult. But we want to work with people like you, and there are people in our office who will help you through this.'"
- 3. Intentionally built out a list of vendors and proactively targeted their educational campaigns and engagements to specific vendor cohorts with the specialties required for the project.

Implicit in Hirsch's strategies for increasing transparency of the process and increasing the vendor pool is the importance of building trust with vendors. As Hirsch stated, "many vendors are worried that the table is stacked against them . . . and getting them to the table is hard work." Smith provided a stark statistic on this issue, citing that a recent UK poll of digital SMEs/vendors showed that a "bulk of the respondents still think that the government doesn't know how to truly partner with SMEs." Both digital service leaders emphasized the negative impacts of lack of accessibility into the procurement process with the sense of trust among vendors.

However, while Hirsch highlighted his team's focus on getting vendors to the table through direct and proactive engagement, Smith presented a scaled version of this model through his work leading the UK's Digital Marketplace. The Marketplace is an online platform aimed at increasing vendor participation and increasing connection points between vendors and public sector organizations. In this model, suppliers can join the platform as sellers of digital services and public sector organizations can join as buyers, creating an efficient and effective mechanism for increasing the pool's size and quality. While the team leading the program does not proactively walk potential vendors through the procurement process to the extent of the Massachusetts Digital Service team, the Marketplace contains numerous standardized user guides for sellers and buyers, enabling greater accessibility to the procurement process.

#### Key Challenge 2: Centralizing Versus Decentralizing Digital Public Procurement

The second key challenge was the tension between centralizing versus decentralizing the digital public procurement processes. Both leaders grappled with the question, "What is the central function of the digital service group—should they lead every project, create the standards, or operate as hybrid model?" As Smith insightfully provided, "there is a constant cycle of centralization and decentralization, and I think there's a happy medium that can exist . . . which is kind of center led where you set the standards, and you build the capability."

As with their tactics to increasing vendor accessibility to the public procurement process, both digital teams explained their tactics within the constraints of their organization's capacity and maturity. Hirsch explained how the Massachusetts Digital Service team focuses on supporting projects with the greatest potential to be impact multipliers, that is, projects that have a strong mission impact and those with the potential to increase the government's support of digital service efforts. While the UK's GDS operates with a similar philosophy, Smith also emphasized the importance of digital service groups setting the guard rails and the standard of good for other public sector organizations to replicate. Last, an additional distinction that Smith cited, and to which Hirsch also agreed, is the importance of digital service groups acting as enablers rather than bottlenecks of digital service change across the government: "don't try to do everything and create a bottleneck that then constrains the teams out in the field."

#### A PUBLICATION OF THE

Ash Center for Democratic Governance and Innovation Harvard Kennedy School 79 John F. Kennedy Street Cambridge, MA 02138

617-495-0557 **ash.harvard.edu** 

