

# McKinsey on Government

## Highlights

**2**  
Elements of a successful government transformation

**18**  
Four innovations reshaping tax administration

**10**  
Transforming a 150-year-old government agency: A CEO story

**29**  
Improving the effectiveness of tax collection: \$30 in additional revenue for every \$1 spent?

**15**  
Improving outcomes with better government productivity

August 2018

*McKinsey on Government* is a publication of McKinsey's Public and Social Sector Practice. Our objective is to share insights, new approaches, and experiences from our proprietary research and relationships across all aspects of government around the world at the local, state, agency, national, and supranational levels.

This and archived issues of *McKinsey on Government* are available online at [McKinsey.com](http://McKinsey.com).

**Editorial Contact:**  
[McKinsey\\_on\\_Government@McKinsey.com](mailto:McKinsey_on_Government@McKinsey.com)

**Cover Image:**  
© Carlo A/Getty Images

**Editorial Board:**  
Tera Allas, Alberto Chaia, Michael Conway, Eoin Daly, Richard Dobbs, Solveigh Hieronimus, Navjot Singh, Dennis Swinford

**Editor:** Dennis Swinford

**Contributing Editors:**  
Frances Catanio, Roberta Fusaro

**External Relations:**  
Sharmeen Alam, Theo Lomas

**Art Direction and Design:**  
Leff Communications

**Managing Editors:**  
Michael T. Borruso, Venetia Simcock

**Data Visualization:**  
Richard Johnson, Jonathon Rivait

**Editorial Production:**  
Elizabeth Brown, Heather Byer, Roger Draper, Gwyn Herbein, Pamela Norton, Katya Petriwsky, Charmaine Rice, John C. Sanchez, Dana Sand, Katie Turner, Sneha Vats, Belinda Yu

**McKinsey Practice Publications**

**Editor in Chief:**  
Lucia Rahilly

**Executive Editors:**  
Michael T. Borruso, Allan Gold, Bill Javetski, Mark Staples

Copyright © 2018 McKinsey & Company. All rights reserved.

This publication is not intended to be used as the basis for trading in the shares of any company or for undertaking any other complex or significant financial transaction without consulting appropriate professional advisers.

No part of this publication may be copied or redistributed in any form without the prior written consent of McKinsey & Company.

## Table of contents



### **Elements of a successful government transformation**

Five essential disciplines can more than triple the success rate of public-sector change efforts.



### **Transforming a 150-year-old government agency: A CEO story**

HM Land Registry's Graham Farrant describes leading the cultural and operational transformation of an organization of 5,200 people.



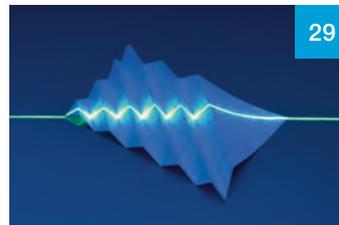
### **Improving outcomes with better government productivity**

Sure, productivity can save money. But it could also improve education, fine-tune tax collection, and add 12 billion healthy-life years for the world's population.



### **Four innovations reshaping tax administration**

New insights from McKinsey research suggest that across the globe, tax authorities diverge in the maturity of their innovation in four areas: digitized interactions, advanced analytics, process automation, and talent management.



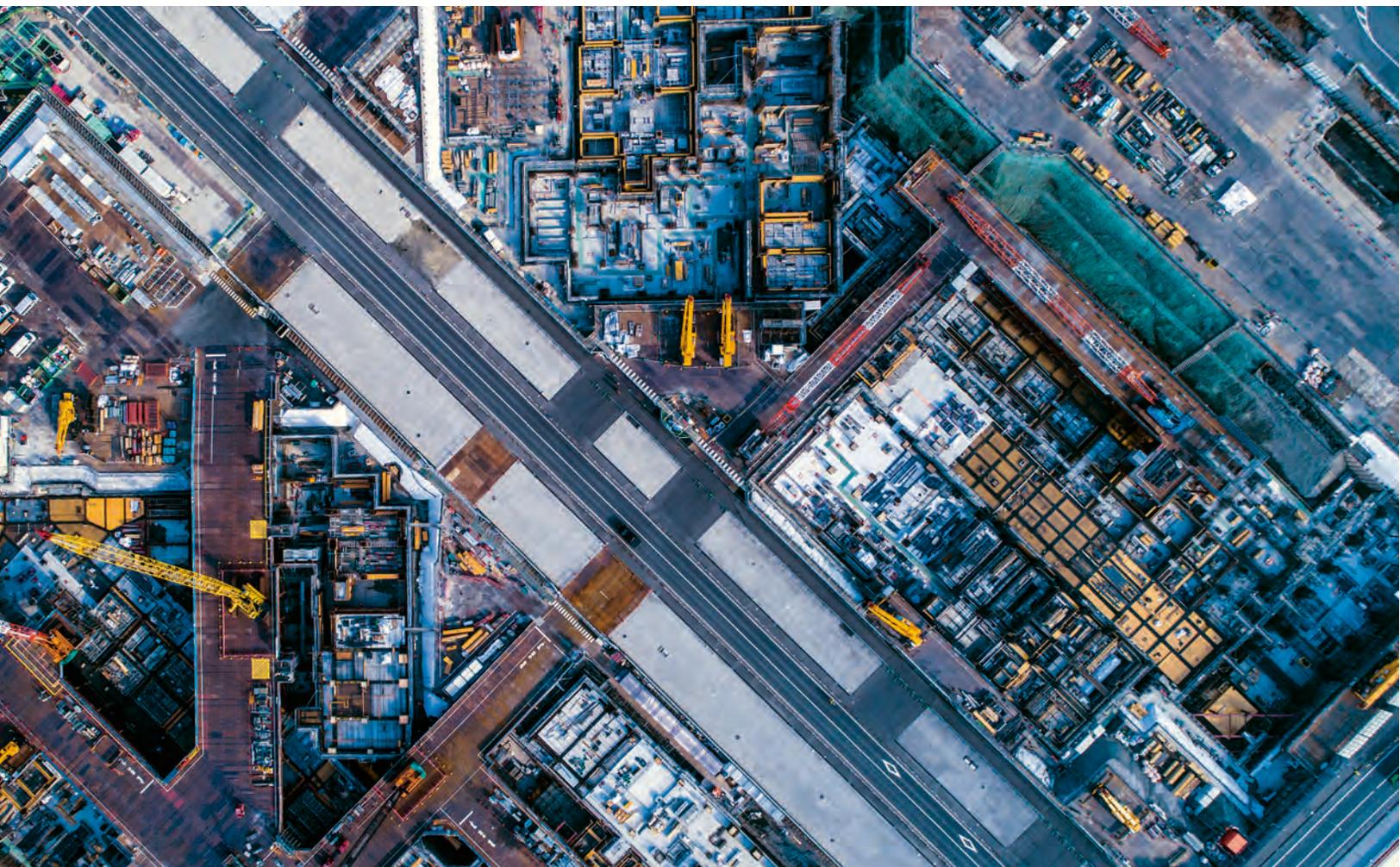
### **Improving the effectiveness of tax collection: \$30 in additional revenue for every \$1 spent?**

An analysis of OECD countries' expenditure on tax-collection effectiveness suggests high returns on investment.

# Elements of a successful government transformation

Five essential disciplines can more than triple the success rate of public-sector change efforts.

Tera Allas, Martin Checinski, Roland Dillon, and Richard Dobbs



© Michael H/Getty Images

In our conversations with public-sector leaders across the world, we hear real urgency—and a fair amount of anxiety—about the need to transform government services. At the national, state, and city levels, governments know they must find new ways to meet the expectations of citizens, many of whom are increasingly discontented. Often governments must also provide “more for less” in an environment of fiscal constraint, and myriad forces that trigger government transformations make their task more challenging (Exhibit 1).

New research by the McKinsey Center for Government shows just how hard it is to get such transformations right.<sup>1</sup> Around 80 percent of government efforts to transform fail to meet their objectives, according to a survey of nearly 3,000 public officials across 18 countries that formed part of the study’s evidence base. The study also

included insights from 80 transformation cases and from in-depth interviews with 30 leaders who have led transformations in government.

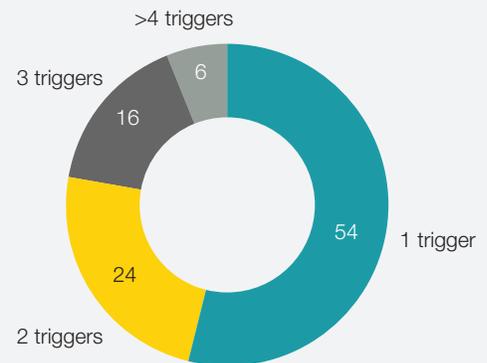
What distinguishes the 20 percent of transformations that succeed from the 80 percent that do not? Our study distilled five essential disciplines, “the five Cs,” and found that transformations that apply all of them are more than three times as likely as other change initiatives to succeed. The disciplines are as follows: committed leadership, clear purpose and priorities, cadence and coordination in delivery, compelling communication, and capability for change. These might seem obvious, but they are rarely applied effectively—and they are particularly difficult to implement in the context of the political cycles, complex delivery systems, and multiple stakeholders that characterize the public sector.

**Exhibit 1 Almost half of all public-sector transformations had more than one trigger.**

**Triggers that prompted the transformation effort, %<sup>1</sup>**



**Number of triggers that prompted the transformation, %<sup>1</sup>**



<sup>1</sup> Data weighted by 2016 share of GDP among the countries surveyed (current prices, purchasing-power parity adjusted); unweighted total number of respondents = 2,909.

Source: McKinsey Center for Government Transformation Survey, December 2017

### Committed leadership

The experience of the transformation leaders we interviewed made it clear that a high degree of personal commitment and energy—and often true courage to challenge established conventions—are necessary in bringing the five Cs to life. Our survey corroborates this: leaders of successful transformations were twice as likely as their peers in unsuccessful initiatives to model the behavior they expected of public servants. Fredrik Reinfeldt, former prime minister of Sweden, told us: “For eight years, I spent more than 250 days traveling throughout Sweden. I went everywhere, met civil servants, discussed with them what was happening, and asked them what they were seeing.” Another leader we spoke to risked reelection to pursue a crucial reform to the country’s school system. And a third leader consciously challenged the central government’s procurement rules to expedite change, confident that showing early results was worth the risk.

Of course, this is easier said than done. Leaders often have limited political capital and must carefully choose how to spend it. They might not have the longevity to complete large-scale reforms. For example, a review of ministers of health across 23 countries from 1990 to 2009 found that half of them served for fewer than two years in office. And governments often find it difficult to prioritize because of the number of vocal stakeholders, each with their own demands.

One government that has overcome such challenges is the Colombian city of Medellín. Until recently, it was notorious for having one of the world’s highest homicide rates, but the city has decreased this by more than 80 percent. This remarkable transformation is thanks in part to the bold vision and deep commitment of a series of mayors of Medellín as well as governors of the surrounding Antioquia province and the partnerships they built with the private sector. One of those leaders was Aníbal Gaviria, who served as governor from 2004 to 2007 and mayor from 2012 to 2015. Gaviria translated his personal commitment into a clear vision for change. “We faced incredulity

and people thinking that we were forever condemned to be a failed city,” he said. “The change in mentality—when people begin to see that it is possible to have breakthroughs that benefit everybody—has been the most important gain.”

### Clear purpose and priorities

Successful transformations paint a compelling picture of their destination—and make it crystal clear to public servants and citizens why the change is necessary. When it comes to objectives, less is more: successful efforts keep targets few, specific, and outcome based. Jaime Saavedra Chanduví, former minister of education in Peru, made rapid improvement in the country’s education system by simplifying more than 200 objectives into a four-point plan, “so that a cab driver understood it.”

Another example is from Dalton McGuinty, premier of the Canadian province of Ontario from 2003 to 2013. McGuinty committed his leadership to the reform of education in the province, leading to impressive improvements in quality. For example, the number of low-performing schools dropped from 800 to 63. As he told us, that success came about only because of ruthless prioritization. “I learned that it’s very important to settle on just a few priorities,” he emphasized. “Of course, we wanted to get hospital waiting times down. Of course, we wanted to see queues for the courts reduced. But if you try to boil the ocean, you’re not going to succeed. That is why my single greatest priority was education.”

McGuinty also set ambitious targets, which raised the motivation of everyone involved. As he said, “When I made my commitments to increase test scores and graduation rates, I didn’t know how I was going to get there.” But he knew that he had to bring teachers with him. “I did everything I could to enlist teachers to the cause by treating them respectfully, building capacity by investing heavily in them and their training, and publishing graduation rates and the test scores, which kept the pressure on them and on me.”

### Cadence and coordination in delivery

Successful transformation efforts are characterized by smart approaches to delivery, which differ markedly from traditional public-sector approaches to policy development and implementation. A smart approach requires a fast yet steady pace, a flatter hierarchy with close collaboration among different agencies and functions, and the flexibility to solve problems as they arise. It also requires an empowered and focused transformation team to spur the pace and track progress. According to our survey, a dedicated team centrally coordinated the change program in 51 percent of successful transformations, whereas such a team was present in only 26 percent of unsuccessful ones.

An example comes from the Indian state of Maharashtra. There, chief minister Devendra Fadnavis created a war room in 2015 that focused on accelerating infrastructure delivery. A faster pace is critical in this populous, fast-growing region with historic backlogs in infrastructure ranging from transport to water. The war room convenes regular meetings focused solely on the issues holding back each project. These meetings, chaired by the chief minister, bring together heads of the different departments and agencies so they can make decisions on the spot to resolve the issues. This focus and rapid escalation has enabled a dramatic acceleration in delivery—for example, from opening 11 kilometers of metro lines in the previous decade to 250 kilometers in the past three years.

### Compelling communication

Every government communicates, but only a few do so effectively enough to win hearts and minds. Nearly 90 percent of participants in our transformation survey said that engaging more with frontline employees would have enhanced success. Transformations need well-planned, in-depth, genuine two-way communication with all the groups affected by the change—especially the organizations' own employees.

Two examples from the United Kingdom offer powerful illustrations of this need. The first is the

FiReControl project, which was launched in 2004 to merge 46 local fire-control centers into nine. According to the UK National Audit Office, the effort did a poor job of communicating the purpose of the change to local fire services and did not take sufficient account of their needs and concerns. As a result, the project didn't have users' support and failed to deliver a system that met their requirements. The project was canceled in 2010, wasting around \$700 million.

The transformation of HM Land Registry,<sup>2</sup> whose mission is to protect UK land and property rights, took a very different approach. Graham Farrant was appointed chief executive and chief land registrar in 2015, with a mandate to transform the agency into “the world's leading land registry for speed, simplicity, and an open approach to data.” Farrant kicked off the transformation by conducting town-hall meetings with all 4,000 staff in groups of 30 to 50 at a time. Farrant learned that HM Land Registry's staff felt passionate about upholding the integrity of the property-registration system. This knowledge helped him craft a transformation message that spoke directly to advancing that widely held and deeply felt professional mission rather than focusing simply on efficiency gains, as his predecessors had done. Farrant also introduced a weekly blog, which allowed staff to post comments, and personally responded to people's thoughts and ideas. He made it clear that he cared about employees' views and wanted to build on the strengths and professionalism of the organization. Farrant's collaborative approach has contributed to the ongoing success of the full transformation, which has dramatically reduced the backlog of cases.

### Capability for change

Finally, governments need to rethink their approach to public-service capabilities if they are to increase their odds of success in major change programs. Over centuries, governments have honed their skills in areas such as policy and diplomacy. They now need to build new capacity and encourage agility to transform how they deliver services. Sometimes acquiring the right

capabilities means hiring experienced change leaders from outside government and, critically, investing in their orientation to help them become an integral part of the team. But it also requires focusing on internal capability building, as our survey findings make clear. When we compared successful and unsuccessful transformations, we found that the former were three times more likely to train initiative leaders in change-leadership skills. They were also twice as likely to offer broader capability-building programs to employees involved in the transformation (Exhibit 2).

One public-sector change effort that grasped the importance of capabilities was that of the Ethiopian federal tax authority, which embarked on an ambitious effort to improve the effectiveness of its tax collection. The authority put transformation capabilities at

the heart of its program, starting with a top-team workshop in which leaders agreed to a common vision of reform, identified the values they wanted to demonstrate to their people, and made explicit personal commitments to the program. More than 200 key frontline staff received training and coaching both on tax-specific skills (such as debt-collections tracking) and project-delivery capabilities.

Another example is New Zealand's transformation of policing, launched in 2009. A key component was the Prevention First model, which addressed the underlying causes of crime. This required a focus on early intervention and engagement with the community. To make this change, police received training in preventative policing and engagement techniques.

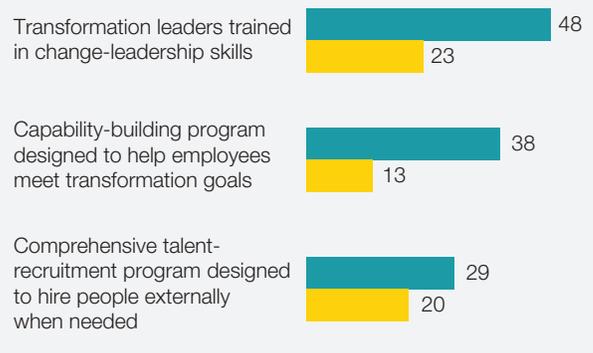
**Exhibit 2** **Capability gaps can be an issue in public-sector transformations, but improvement programs can boost success.**

■ Completely successful transformations   ■ Unsuccessful transformations

**Capabilities present during transformation,**  
weighted % of total respondents



**Action taken during transformation,**  
weighted % of total respondents



Source: McKinsey Center for Government Transformation Survey, December 2017

### Beyond the five Cs: Putting citizens at the heart of transformations

The task of transforming large-scale public-sector organizations is daunting—all the more so given the high failure rate revealed in our survey. By embedding the five Cs, public-sector leaders can substantially improve their odds of success (Exhibit 3). However, our study also identified further technology-inspired techniques to support faster and better change: citizen experience, design thinking, and agile practices.

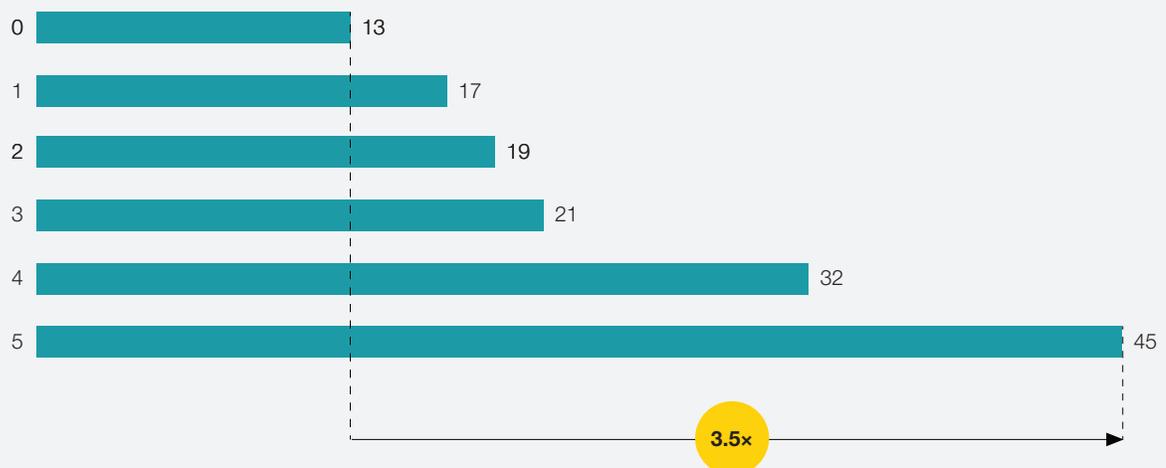
Pioneering organizations are using the concept of citizen experience to understand people’s end-to-end journeys in services such as public transport and business licensing. They are drawing on design thinking to reconfigure such services in a way that integrates the needs of people, the possibilities of technology, and the requirements of the provider

organization. And they are deploying agile practices to quickly design, prototype, and test services with users.

A department of corrections in the United States provides an example of several of these innovations. This department sought to reduce violence in prisons and lower recidivism among several thousand offenders. In one project, the agency used design thinking, including journey mapping, to improve the effectiveness of rehabilitation. The agency identified “offender segments”—analogous to the customer segments used by private-sector marketers—based on factors such as education, employment, behavioral therapy, and mental health. The transformation team also designed “offender journeys” for each segment, much in the way private-sector firms reimagine customer journeys. The aim was to allow corrections staff to set goals for the offender’s rehabilitation and

#### Exhibit 3 Embedding the five disciplines more than triples the likelihood of success in government transformations.

Number of “five Cs” implemented during transformation effort, % of transformations ranked as completely successful

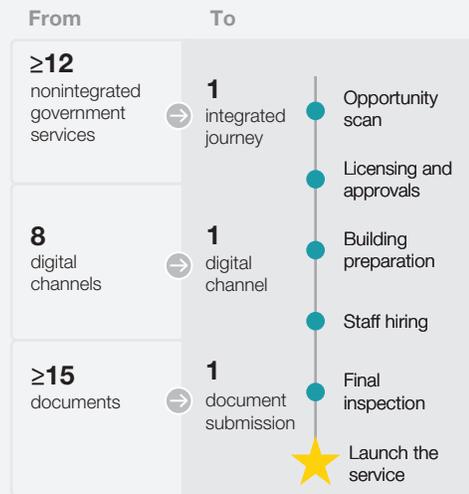
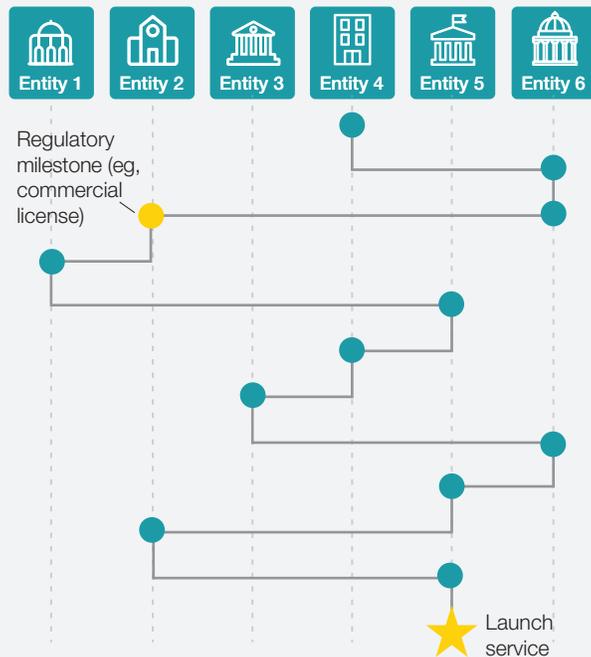


Note: Based on most relevant surveyed action for each of the five disciplines; sample sizes for number of Cs were 0: 747, 1: 659, 2: 590, 3: 441, 4: 338, and 5: 134; data weighted by proportion of world GDP, following *McKinsey Quarterly* weighting standards.

Source: McKinsey Center for Government Transformation Survey, December 2017

**Exhibit 4 Focusing on the end-to-end user journey can support simplification and integration, as seen by a sample user journey for establishing a medical-services facility.**

**Government entities involved in the journey**



Source: McKinsey Center for Government analysis

direct the appropriate programming and resources from the start of the offender’s stay through parole and reintegration into the community. Another government used citizen-journey design to dramatically streamline the process of setting up medical facilities—a policy priority for the country in question (Exhibit 4).

Governments exploring the next horizon of transformations are also harnessing technology to engage with citizens much more frequently and imaginatively. In India, for example, the government launched the MyGov online platform in 2014 to invite

citizens to share comments, ideas, and concerns. To date, nearly two million citizens have participated by submitting suggestions in policy areas ranging from environmental pollution to girls’ education to health. One proposal submitted through the platform was to turn rural post offices into simple banks to increase financial inclusion—an idea included in India’s 2015 budget. By March 2017, banking sections had been installed in 25,000 post offices. Such participative planning puts citizens at the heart of designing and delivering effective services.



The world urgently needs successful government transformations—to improve health and education outcomes, foster growth and job creation, make cities more livable, make constrained public-sector budgets go further—and, ultimately, to restore citizens’ confidence in governments’ ability to deliver. Although the failure rate of such efforts is high, there is every reason to believe it can be radically improved. For these efforts to be successful, commitment and sharp focus by leaders, engagement and consistent discipline in delivery, and the foresight to shape a set of capabilities for a new era of government are necessary. ■

This article is adapted from *Delivering for citizens: How to triple the success rate of government transformations*, available on [McKinsey.com](https://www.mckinsey.com).

**Tera Allas**, a senior fellow at the McKinsey Center for Government, is based in McKinsey’s London office, where **Richard Dobbs** is a director emeritus; **Martin Checinski** is an associate partner in the Dubai office; and **Roland Dillon** is an associate partner in the Melbourne office.

Copyright © 2018 McKinsey & Company.  
All rights reserved.

---

<sup>1</sup> Tera Allas, Andres Cadena, Martin Checinski, Eoin Daly, Roland Dillon, Richard Dobbs, David Fine, John Hatwell, Solveigh Hieronimus, and Navjot Singh, *Delivering for citizens: How to triple the success rate of government transformations*, June 2018, [McKinsey.com](https://www.mckinsey.com).

<sup>2</sup> Tera Allas, “Transforming a 150-year-old government agency: A CEO story,” April 2018, [McKinsey.com](https://www.mckinsey.com).

# Transforming a 150-year-old government agency: A CEO story

HM Land Registry's Graham Farrant describes leading the cultural and operational transformation of an organization of 5,200 people.

Tera Allas



© Shomos Uddin/Getty Images

When is a backlog not a backlog? When the organization views it as “stock.” That was the position at HM Land Registry, the venerable body created in 1862 to register ownership of land and property in England and Wales. When Graham Farrant joined the organization three years ago, he was astonished to learn that management referred to some 250,000 unresolved cases as “stock”—something that could keep the agency busy in the event of another property downturn.

That’s when it became clear to him that a significant transformation was in order. The organization’s overarching goal is to “become the world’s leading land registry for speed, simplicity, and an open approach to data,” Farrant states in this interview with McKinsey’s Tera Allas. To do this, the chief executive would need to truly engage with frontline staff and customers, shape a top team that would take collective responsibility, take personal risks, and follow through on change initiatives.

It wouldn’t be easy: Farrant was the organization’s fifth chief executive in five years. In that time, the organization had employed five directors of finance, five directors of HR, and four directors of customer strategy. “I quickly realized that we needed to change the culture at its core and embed values that focus on customer service and integrity toward internal and external stakeholders,” he says.

Here, he talks about the importance of having a clear statement of purpose and shared values, the CEO’s role as an integrating force, and what it takes to communicate and deliver a transformation.

**McKinsey:** *You have a bit of a reputation as a transformation specialist, in both the public and private sectors. What core principles are common to both?*

**Graham Farrant:** You’re correct, I’ve had extensive experience in the public sector, and I’ve also been a management consultant and led a private-equity-

backed business. Regardless of the industry, the transformation principles are the same: you must go into the situation with an open mind. You must understand why things are the way they are—but then use those insights to challenge prevailing assumptions and, hopefully, change things for the better.

**McKinsey:** *Did you come into this particular role with a formal change or transformation program?*

**Graham Farrant:** Not personally, at the beginning. I started off with asking some fairly basic questions: What are we here for? What are we trying to do? Those questions then became crystallized in a very clear strategy and set of priorities. That said, when I arrived, the land registry was in the process of a big transformation program, and it had thrown every bit of change into it. It was being led by a single director and not owned by the board as a whole. So I said it’s going to become a board function; I’m going to head it, but it’s going to be the responsibility of the whole board to deliver it. I then made the executive board meet in a different guise, the transformation board, so we had two governance structures. One is the executive board, doing strategy; the other is the transformation board, which I chair and all the directors are on, and that leads the transformation program.

Since then, we have agreed upon a new five-year business strategy, which is broken down into the digital program, the people-change program, the customer program, and so on. We are in the process of finalizing the key elements, as I have just now brought in a transformation director to run this. We all take collective responsibility for the transformation. That relies as much on the HR director getting the people change, culture, staff engagement, and communications right as it does on IT getting the systems right. To make some rapid progress—but also to avoid just being incremental—we broke it down into three stages: fix, improve, transform.

**McKinsey:** *How long did it take to get to a point where you could identify the biggest problems and were in a position to change them?*

**Graham Farrant:** It took a bit longer than it should have, in part because of the long-standing nature of our employees and an ingrained and old-fashioned culture, which I have described as being “command and control” rather than being empowering and enabling. Most of our staff are professional caseworkers, exercising quasi-legal judgment on registration applications, and of course we have more than 100 lawyers exercising actual legal judgment. I had to build a new top team, with the capacity to change the culture and empower our colleagues while still doing 120,000 things every day, from responding to requests for official information about property ownership to first registration of unregistered land.

We now have a completely new top team in place, with new directors and deputy directors throughout, many of whom are new to the agency and many of whom are very experienced here, but in new roles that play to their undoubted strengths. The whole leadership group is committed to the new business strategy as well. They know exactly what they have been appointed to achieve, and they know that we will only deliver it if we work collectively. And, further down, the whole organization is getting behind the new vision for the organization, because they recognize the words and the ambition, and it just feels totally different.

**McKinsey:** *What was the vision?*

**Graham Farrant:** Staff buy-in to the principles of registration was huge. They believed they were part of a good team, that they did worthwhile work. They believed that the board had no idea what they did because it just talked about efficiency gains. They kept talking to me about assurance, about integrity. So I introduced values they recognized: “We give assurance, we have integrity, we drive innovation,

we are professional.” And they all said, “That’s what we do for a living. We recognize those words.” So suddenly we had a set of values they bought into. We went for the mission statement, “Your land and property rights: guaranteed and protected.” Simple, and we do what it says in the mission. We register land and protect people’s interest in that land. This realignment back to our core purpose was central to the development of our new business strategy, which I was immensely proud to launch with our key stakeholders at the end of 2017. Both colleagues and the wider property sector have really got behind it, because it absolutely looks to the future but absolutely recognizes the agency’s rich history, too.

**McKinsey:** *How did you communicate with staff through all this?*

**Graham Farrant:** I went around the organization and stood in front of the entire staff, albeit in groups of 30, 40, and 50 at a time. I introduced a weekly blog. Bear in mind, most had never met the chief land registrar before. Suddenly, they get a weekly blog from me with the opportunity to post comments under their own names—no anonymity. Their colleagues can like or disagree with their comments as well as my blog. In the first few months, there were loads of negative comments—most of them along the lines of, “Graham, we’ve been saying the same thing for the past five or more years. Why hasn’t anyone been listening to us?” But that has evened out as people have had more opportunity to articulate their thoughts and share them directly with me. Now they know someone is listening. Staff understand what we’re doing, and they can see that I and the board believe in the registry and registration.

**McKinsey:** *What was one of the biggest problems the organization faced?*

**Graham Farrant:** Well, a good example is that 18 months ago was the first time the land registry had

ever drawn up an organization chart and identified the full establishment in one place—who reports to whom and how big the teams are. For years, people had been leaving, and there hadn't been any recruitment, even though we had this growing backlog of cases. We had radically reduced our staff numbers during the recession and took them down to a level that was absolutely the right size for that time. But then the market grew, and we just assumed that efficiency gains would cover the growth while we had ten to 20 people leaving every month on retirement. We got some efficiency gains, but not enough to make up the ground. We'd lose managers, we'd lose technical people, we wouldn't recruit to those posts. So the shape of the teams by then was random in nature.

To fix this, I started recruiting. In five years' time, we'll have a different process; we'll need fewer people. But

right now, we have 1,000 more people than we had two-and-a-half years ago. We have 50,000 cases that are over target time. We used to have about 90,000. My goal is to get that down to zero by the end of the year.

**McKinsey:** *Why was there was no recruitment? Was it cost pressure?*

**Graham Farrant:** There was bit of that, but bear in mind we are a fee-generating organization, creating more than £20 million a year in surpluses.<sup>1</sup> I just don't think the organization had put the pieces together, because when we did, there was no barrier to recruitment. There were various government committee structures to go through, but once we had shown we had an organizational plan to recruit against, it was no problem. So, why hadn't we done that before? We were rule bound as an organization.

## Graham Farrant



### Vital statistics

Born 1960, in London

### Education

Holds a master of science degree in environmental pollution science from Brunel University London and a bachelor of science degree in environmental health from the University of Greenwich

### Career highlights

#### HM Land Registry

(2015–present)

Chief executive and chief land registrar

#### Thurrock Council

(2010–15)

Chief executive

#### London Borough of Barking & Dagenham (jointly with Thurrock Council)

(2012–15)

Chief executive

#### PMPGenesis

(2009–10)

Chief executive

#### Leisure Connection

(2004–08)

Chief executive

### Fast facts

Married, with 4 daughters

**McKinsey:** *What did it take to break the rules, so to speak?*

**Graham Farrant:** A bit of risk taking. Here's one example: believe it or not, there was a standard paragraph in a standard letter that we were sending 1,000 times a day, and the second paragraph in the letter didn't apply anymore, so the first job for our caseworkers was to manually delete it. They were repeating an unproductive task 1,000 times a day, and they knew it. The problem could easily be fixed by the IT group, but the cabinet-office controls say zero spending on customer-facing IT. I just told them to do it, and of course it wasn't a problem. There are strange things like that, which you wouldn't believe if you hadn't seen them with your own eyes. You have to be brave enough to say, "I'll take responsibility for that," without being reckless. It's not really a difficult balance, but most people don't have the confidence, because they think there is somebody else that will hold them to account for it—the public-accounts committee or treasury. I'm sure that they will, but not on trivial matters like that.

**McKinsey:** *In that context, were you able to change the culture so people would start raising issues on their own?*

**Graham Farrant:** Yes, slowly at first, but now we've had a thousand suggestions in our staff suggestion scheme. That's quite a lot to work through. Some of them are easy, and some of them you say, "No, we can only do that when we get a new casework system."

**McKinsey:** *How do you deal with the cynicism people might have about that kind of suggestion scheme?*

**Graham Farrant:** Feedback. Be open. Allow yourself to be challenged. So if people say, "This is crazy," I will say, "That's fine; now you've raised that, one of us will get back to you." And of course, following up is the key—but the managers hate that. I have a task list. I say, "I've asked you to do this, so I expect it to be done by that date, and it's on the list until it's done." So if

they haven't done it, they get embarrassed every four weeks when we go through the task list at the executive governance board and their tasks are outstanding.

**McKinsey:** *How far along are you with respect to achieving the initial "fix" phase of the transformation?*

**Graham Farrant:** By March 2018, we will have the backlog down to virtually zero, we will have a new enterprise-resource platform coming in, we will have confidence in the system. We are in a good place. We now have to focus on the next phase, whether that's robotic process automation or machine learning, plus a new casework system that enables electronic conveyancing, even if that doesn't exist in the United Kingdom yet.

**McKinsey:** *What advice might you give to other leaders in government agencies that are seeking to transform their cultures and operations?*

**Graham Farrant:** Be aware of your surroundings, because it actually changes quite a lot. In our case, as an arm's-length body, that means using informal networks and tuning in to what the current government or civil-service position is. The other thing is just keep digging until you find something you like, some core strengths, a solid foundation, and then build on that. It's too easy to say, "OK, we'll paper over that problem." I've always wanted to work in organizations that are good, not necessarily perfect, but really good—and you have to have solid foundations to do that. ■

---

<sup>1</sup> As a so-called trading fund, HM Land Registry is a government entity that is expected to finance its operations from trading income and generate a financial return commensurate with the risk of the business. The actual return may vary somewhat from one year to the next.

**Tera Allas**, a senior fellow at the McKinsey Center for Government, is based in McKinsey's London office.

Copyright © 2018 McKinsey & Company.  
All rights reserved.

# Improving outcomes with better government productivity

Sure, productivity can save money. But it could also improve education, fine-tune tax collection, and add 12 billion healthy-life years for the world's population.

Tera Allas, Damien Bruce, and Eoin Daly



© jacoblund/Getty Images

When citizens are asked about their expectations of government, they focus on specific, real outcomes—better education, healthcare, and job opportunities, for example, are top priorities.<sup>1</sup> Moreover, citizen expectations of public services have risen over the past two decades, as people increasingly come to expect service levels comparable to what they get from the private sector.

It would be generous to say that governments are succeeding. According to our research, the quality of most services has improved only marginally—with some, such as education, even declining—despite increased expenditures.<sup>2</sup>

Yet buried in the global averages are some success stories. For example, between 2008 and

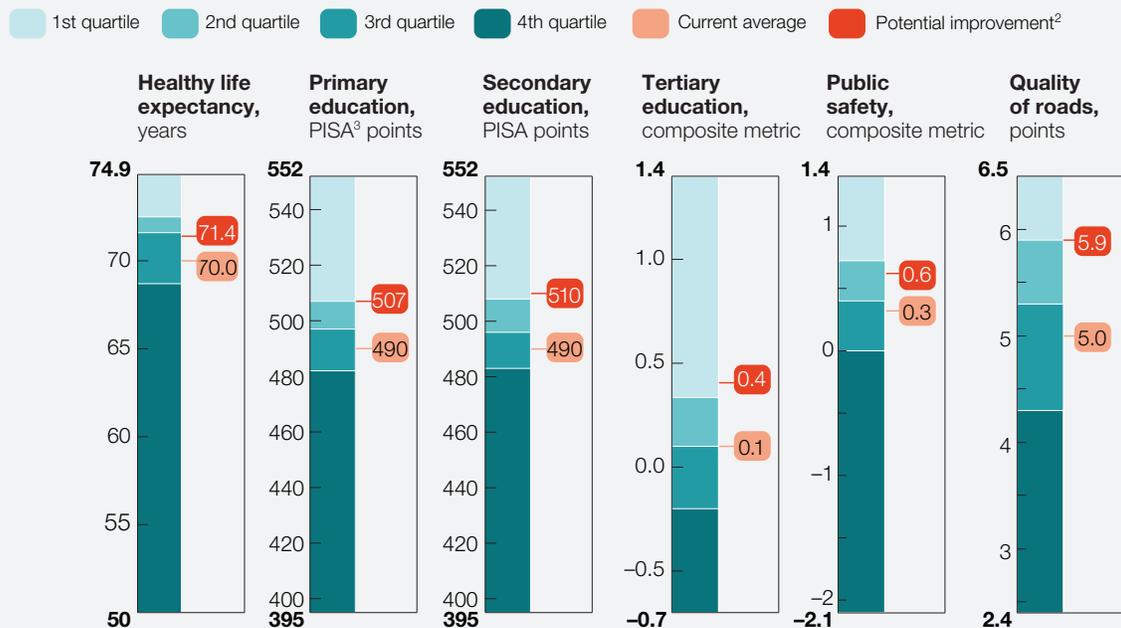
2015, Denmark improved its average healthy-life expectancy by 1.8 years (or 2.6 percent), without increasing per capita health expenditures. Similarly, Poland’s performance in primary and secondary education—as measured by the Programme for International Student Assessment (PISA)—increased by 8.1 percent from 2000 to 2012, while spending stayed roughly the same.<sup>3</sup> The New Zealand Police improved public satisfaction with its work by five percentage points from 2009 to 2014 while reducing per capita expenditures by 8 percent. Confidence in police increased to 78 percent.

In fact, each sector and each peer group (countries achieving similar outcomes) has its own outperformers. If all countries could raise their productivity at the same rate as their fastest-improving peer, they could save or

**Exhibit**

**Improving government productivity at the rate of countries’ fastest-improving peers would dramatically improve outcomes.**

**Outcomes by quartile by government sector<sup>1</sup>**



<sup>1</sup> Productivity defined as quality-adjusted outputs per \$ spent.  
<sup>2</sup> Average potential improvement assuming best peer’s rate of improvement.  
<sup>3</sup> Programme for International Student Assessment.

Source: McKinsey Center for Government

recover \$3.5 trillion a year by 2021.<sup>4</sup> That's more than enough to cover the International Monetary Fund's projections of the global gap between governmental revenues and costs.<sup>5</sup> Plugging revenue leaks with advanced analytics represents a \$1 trillion opportunity.<sup>6</sup> Governments could improve their revenue collection by 1 to 3 percent in larger, advanced economies; in less formal, developing ones, the opportunity is much larger.

But productivity improvements are about more than just money. They can also spur better outcomes without the need to increase per capita or per-unit spending (exhibit). If countries had raised the productivity of their healthcare systems at the rate of their fastest-improving peer over the past five years, the average healthy-life expectancy would have been 1.4 years higher. If that happened globally, the result would be 12 billion additional healthy-life years.

What's more, the average school leaver's literacy, numeracy, and problem-solving skills could reach those of top-quartile countries today. Putting a monetary value on such gains is fraught with challenge. But as an indication, the Organisation for Economic Co-operation and Development (OECD) estimates that the 20-point increase in PISA scores implied above would generate an increase of approximately 0.4 percentage points in a country's annual per capita GDP growth rate.<sup>7</sup> Since per capita GDP growth in OECD member countries has averaged 1.2 percent annually during the past ten years, this is a meaningful improvement.

What can governments do to spur their productivity and, in the process, improve outcomes? Our work emphasizes four areas:

- **Finance.** By taking on a more pivotal leadership role, the finance function can provide the information, insights, and incentives for public funds to be spent in ways that make a real difference to outcomes in every area of government. The finance function can also supply better data, guidance, benchmarking, and support to the line agencies who provide government services to citizens.

- **Commercial capabilities.** Cultivating excellence in commercial skills makes it possible for governments not only to ensure that big-expenditure items (such as procurement, major projects, and information technology) are actively managed for value but also to unlock better performance from state-owned enterprises.
- **Digital technologies and data analytics.** By building an effective digital function, governments can transform citizen experience, save money, and improve outcomes. They can also use advanced analytics to reduce waste and pinpoint the government activities that do—and don't—improve citizens' lives.
- **Talent management.** A strategic human-resources function can ensure that an entire government attracts and develops the talent needed to deliver better outcomes for less—and manages and motivates that talent to drive ongoing productivity gains. ■

<sup>1</sup> André Dua, Navjot Singh, Aly Spencer, and Tim Ward, "High-performing US states: Is there a secret to success?," February 2018, McKinsey.com.

<sup>2</sup> *The opportunity in government productivity*, McKinsey Center for Government, April 2017, McKinsey.com.

<sup>3</sup> Programme for International Student Assessment, a worldwide study by the Organisation for Economic Co-operation and Development, evaluates educational systems by measuring the scholastic performance of 15-year-olds.

<sup>4</sup> Productivity is defined as quality-adjusted outputs per dollar spent.

<sup>5</sup> World Economic Outlook Database, International Monetary Fund, 2016, imf.org.

<sup>6</sup> Susan Cunningham, Jonathan Davis, and Thomas Dohrmann, "The trillion-dollar prize: Plugging government revenue leaks with advanced analytics," January 2018, McKinsey.com.

<sup>7</sup> *The high cost of low educational performance: The long-run economic impact of improving PISA outcomes*, Organisation for Economic Co-operation and Development, 2010, oecd.org.

This article is adapted from the McKinsey Center for Government's report *Government productivity: Unlocking the \$3.5 trillion opportunity*, on McKinsey.com.

**Tera Allas**, a senior fellow at the McKinsey Center for Government, is based in McKinsey's London office; **Damien Bruce** is a partner in the Melbourne office; and **Eoin Daly** is a senior partner in the Kuala Lumpur office.

Copyright © 2018 McKinsey & Company.  
All rights reserved.

# Four innovations reshaping tax administration

New insights from McKinsey research suggest that across the globe, tax authorities diverge in the maturity of their innovation in four areas: digitized interactions, advanced analytics, process automation, and talent management.

Aurélie Barnay, Jonathan Davis, Jonathan Dimson, Emma Gibbs, and Daniel Korn



© CarlosAndreSantos/Getty Images

In an age when we can order food, hail a ride, track our fitness, book a flight, and perform multiple banking activities from our smartphones, technology is shifting citizen expectations across the globe. These higher expectations directly translate to higher expectations for government services, but many public-sector institutions lag behind these expectations.

Tax authorities are in the eye of the storm of these global forces; digital payments are growing in scale and significance, and data are becoming the currency of tomorrow. These and other changes are raising security and privacy questions and challenging the

conventional role of tax authorities. These agencies, alongside the rest of the public sector as well as private businesses, are also facing structural changes as global growth is shifting east, global trade is coming under increased scrutiny, and employment patterns are being reshaped (Exhibit 1).

In every economy, these forces are requiring organizations to innovate rapidly, and tax authorities have a lot to gain or lose from these changes. Tax authorities make decisions based on their unique situation to provide high-quality citizen services, improve revenue collection, and deliver operational excellence—but all face similar forces.

### Exhibit 1 Global forces are reshaping tax authorities across the world.



**Global growth shifting** to the east  
In 2010, 17% of Fortune Global 500 companies were in emerging regions. By 2025, this number will reach 46%.



**Changing sentiment toward global trade**  
The number of trade-restrictive measures in various countries is on the rise, potentially clogging world trade.



**Emergence of the “gig economy”**  
According to a survey by the McKinsey Global Institute, if all workers pursued their preferred working style, the total independent workforce in the EU-15 and the United States could grow from 162 million up to 268 million.



**Rapidly rising automation**  
Globally, half of jobs could be automated by 2055—or earlier.



**Digital transactions** replacing cash  
In Kenya, more than 90% of adults transact money through the M-Pesa platform.



**Cyberthreats** on the rise  
Cyberattacks on US federal agencies alone increased from ~5,500 in 2006 to ~77,000 in 2015.



**Explosion of data** from variety of devices  
90% of the data currently in the world has been generated in the past 2 years.



**Digital platforms** playing growing role in tax administration  
Small businesses increasingly use external vendors for payroll management and tax payments, including Gusto, Intuit's Payroll, OnPay, and Sure Payroll.

Source: Press search; World Bank Group; McKinsey Global Institute

To understand how tax authorities are adapting to operational changes and adhering to best practices—or failing to do so—we gathered a new set of qualitative and quantitative insights. Our research, primarily derived from our Tax Administration Performance Benchmark (see sidebar, “Survey methodology”), includes data from 21 national and state tax authorities around the world. The research highlights four areas of divergence where the practices of leading tax authorities are significantly more advanced than others: digitizing interactions with taxpayers, advanced analytics, process automation, and talent management. Our research shows that most tax authorities have made some progress in at least one of these areas—however, no institution is leading in all dimensions, and even those in the lead are continuing to innovate and capture significant gains. Much can be learned, therefore, from the different choices made by tax authorities on what to accelerate.

## Survey methodology

Our Tax Administration Performance Benchmark, initially developed in partnership with the Organisation for Economic Co-operation and Development (OECD) in 2008, compares tax authorities based on quantitative analyses of operating results as well as their adoption of leading practices. Our data set includes national and subnational governments representing more than 460 million taxpayers. Our approach involved assessing more than 160 qualitative and quantitative metrics in five areas of operations (general management, submissions, taxpayer service, examination, and collections). In addition to quantitative analyses, we also conducted extensive interviews to test for the presence of leading practices across typical tax-authority functions such as service, audit, and collections.

---

Tax authorities make decisions based on their unique situation to provide high-quality citizen services, improve revenue collection, and deliver operational excellence—but all face similar forces.

---

### Digitizing interactions with taxpayers

Tax authorities are at varying levels of maturity in digitizing interactions to offer more efficient and customized service to taxpayers.

While many tax authorities are making progress in digitizing interactions with taxpayers, few are performing on par with leading public organizations or private-sector businesses. Our research looked at two key indicators to assess the extent to which tax authorities are embracing digital transformations: service differentiation, which is essential to effective digitization of taxpayer service, and an integrated view of the taxpayer, which involves implementing an integrated account-management system required to digitize large volumes of taxpayer interactions (Exhibit 2).

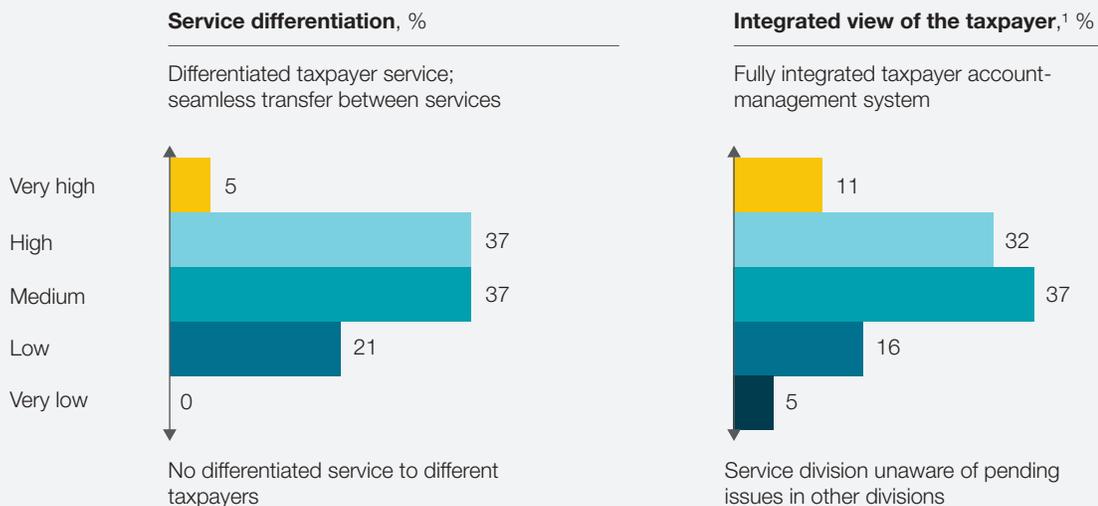
**Service differentiation.** As taxpayers come to expect that their digital footprint can bring them

more customized service, the impact on tax authorities will be significant. In the case of service differentiation, the most sophisticated tax authorities, which represent just 5 percent of our sample, have moved beyond measuring services by channel to mapping taxpayers' service journeys across channels and applying analytics to identify the most frustrating and time-consuming interactions. With this knowledge, tax authorities devise more customized and differentiated digital channels to address customer wants and needs, including providing easy access to tax services. They quickly identify the root cause of customer dissatisfaction and resolve the issue much more efficiently than previously possible.

**Integrated view of the taxpayer.** By measure of building an integrated view of the taxpayer, the leading tax authorities, which account for just 11 percent of our sample, have created central,

Exhibit 2

### Tax authorities differ in their use of digital techniques to segment taxpayers and differentiate service.



<sup>1</sup> Figures may not sum to 100%, because of rounding.

Source: McKinsey Tax Administration Performance Benchmark

digital work flows across departments involved in taxpayer contact, such as processing, audit, and collections. This integration results in a substantially improved taxpayer experience, as representatives can see and resolve multiple issues at once—even ones the taxpayer may not have raised. Integration also provides tax authorities with significant efficiency gains, as administrative workers who were previously assigned to a single function (for example, customer service) can also resolve other issues (for example, debt payment), either in the same customer interaction

or through flexing to manage peaks at different times of the year.

For more examples of cutting-edge digitization efforts, see Box 1, “Example approaches to digitizing interactions with taxpayers.”

### **Advanced analytics**

While most authorities have started using advanced analytics, we see a range of sophistication in how research and analytics are used to segment taxpayers,

## **Box 1**

# Example approaches to digitizing interactions with taxpayers

### **Creating richer digital capabilities through mobile channels in Latin America.**

One Latin American tax administration’s sophisticated mobile application heralds the future of digital taxpayer service: moving from simple information delivery to much richer interactions. The app offers tax services such as validating invoices through QR codes, viewing and downloading electronic invoicing, scheduling appointments, and viewing locations of nearby inland revenue and customs offices. The application is integrated with social networks and offers consulting services for tax payments and returns, use of electronic signature, a tax-compliance indicator displaying a red or green light depending on the compliance situation, a fiscal calendar, and tutorials. The app has been downloaded more than 100,000 times and has garnered accolades for several features, especially e-billing.

### **Easing identification of taxpayers through voice biometrics.**

An increasing number of tax administrations are providing voice biometrics for faster and safer access to online tax services. Voice biometrics systems, which involve matching a stored voiceprint from a library against the caller’s voice, are user-friendly and add a layer of security when accessing online services from a smartphone or tablet; users simply log in with their voiceprint. Such systems increase taxpayers’ use of self-service over the phone and decrease the time customer-service representatives spend authenticating callers. In our experience, these systems can save between 50 and 150 seconds per call.

prioritize examinations, and choose the appropriate examination approach, including the use of “light touch” approaches rather than full audits (Exhibit 3). Several tax authorities have embraced analytics to transform how they conduct examinations and debt collections, using analytics to create early-warning systems and practice extreme modeling, while others are still working to get beyond the basics.

**Early-warning systems.** Early-warning systems can address taxpayer insolvency, a source of major tax-revenue losses. By better understanding when taxpayers are at risk of insolvency, tax authorities can take actions to avoid increases in tax debt over time or reduce costs of debt-collection efforts by focusing on debt with the best chance of recovery.

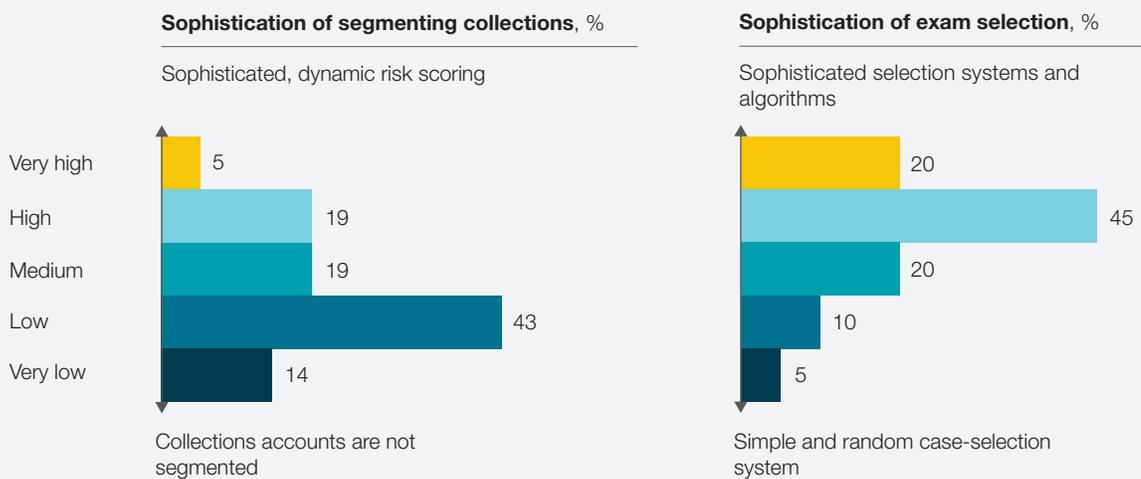
A European tax authority that was losing a significant amount to insolvency cases implemented an advanced model using value-added tax, income tax, payroll, and other data sets to create

a 360-degree view of taxpayers. This better understanding of taxpayers enabled the authority to identify taxpayers at high risk of insolvency and proactively address these situations. As a result, the agency is on track to deliver targets of approximately \$8 million in operating-cost reductions and \$800 million in reduced tax losses in debt collection.

**Extreme modeling.** In most countries, less than 5 percent of taxpayers are audited annually, so it is critical to maximize the value of these audits. By using an advanced model for case selection, tax authorities can deliver value by choosing the right cases and avoiding unproductive cases; for one authority, unproductive cases made up more than 50 percent of audits.

Some tax authorities now identify taxpayers for audit using extreme modeling, which involves employing machine learning to build a sophisticated algorithm to identify the best predicting factors of

**Exhibit 3 Most tax authorities have started using advanced analytics, but at different levels.**



Source: McKinsey Tax Administration Performance Benchmark

a successful audit. One tax authority in a country from the Organisation for Economic Co-operation and Development (OECD) built such an algorithm integrating more than ten databases, using two independent modeling techniques, and automatically scanning more than 1,500 variables. The algorithm looks at changes in different ratios of expenses and revenues over time, opening up new insights compared with “static” features. The improved case selection avoided the more than 50 percent of unproductive audits and meant the cases selected returned up to two times more revenue than the baseline.

For an example of an approach to advanced analytics being taken by one tax authority, see Box 2, “Example approach to advanced analytics.”

### Process automation

Tax authorities have been investing in automation for decades—for example, with e-filing, automatic data checks, automatic reminders, call-center interactive voice response, and so forth. However, the combination of new analytics and machine learning with robotic process automation is enabling a whole new wave of capabilities that increase productivity dramatically. While many tax authorities are quick to automate internal processes, they are not moving as quickly with their externally facing service offerings (Exhibit 4). This trend probably reflects a desire to gain familiarity with the tools before rolling out to an external audience.

## Box 2

## Example approach to advanced analytics

**Using open-source tools to fight identity fraud.** One developed nation’s tax administration uses a combination of open-source tools to develop algorithms capable of identifying people who intentionally misuse identities, which can result in revealing complex organized-crime rings such as carousel fraud. The innovative algorithms optimize state-of-the-art machine-learning models that help the tax administration predict

linkages between references and identities, compute social-network metrics, and traverse relationships with several degrees of separation. As a result, the tax administration is able to identify networks of unusual behaviors that would not be easy to find using proprietary technologies and tools. They also allow the analytics department to use the knowledge produced and shared by a wider user community, for example, in academic or industrial fields.

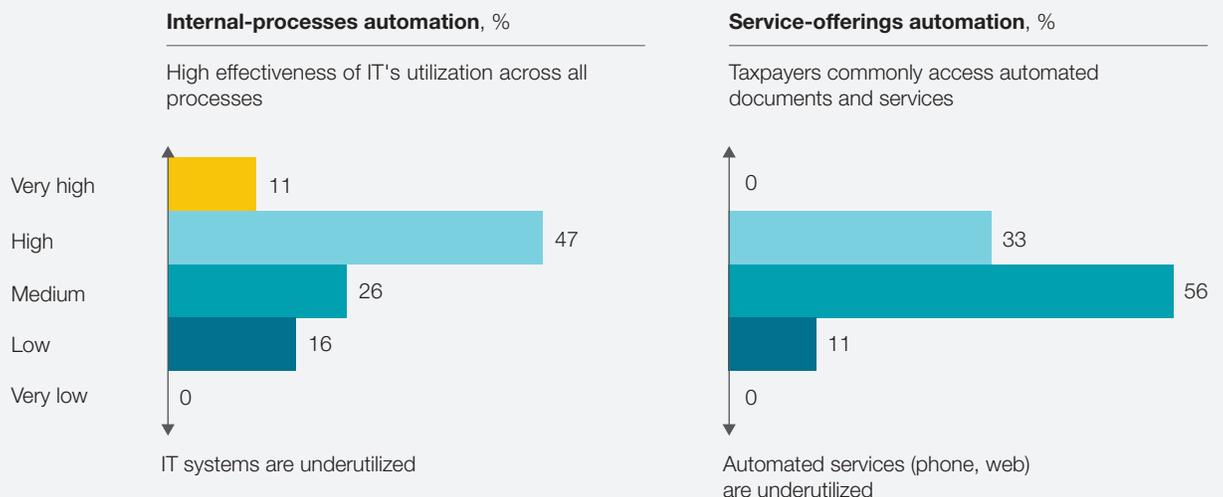
Some tax authorities stand out from the rest in how they have applied IT and digital technology to automate key stages of their operations, including compliance processes. Those organizations that have invested more heavily have more automated processes, offer prepopulated and self-corrected returns, and integrate taxpayers' accounts across various products and situations.

We have also seen tremendous innovation in the use of automation to mine inbound inquiries from taxpayers—from large OECD tax authorities to smaller, subnational tax agencies. The inquiries can be captured in the form of emails, web chats, or even notes from customer-service representatives. Using automation, inbound service inquiries are automatically processed and tagged by issue.

Typically, the algorithms can cleanse and normalize free text into data, which in turn helps analyze trends, prioritize communications efforts, and identify training needed for customer-service representatives. These algorithms provide a much higher degree of rigor and consistency in managing and improving the flow of information to and from taxpayers. We think this type of automation will continue to expand in its uses—for example, through automated processing of tips and complaints to make sure that potentially valuable information from the public does not fall through the cracks.

We expect the current focus on experiments and pilots to increasingly turn to at-scale implementation with a whole new digitally skilled workforce

**Exhibit 4 Tax authorities are applying automation technology at different rates.**



Source: McKinsey Tax Administration Performance Benchmark

working alongside machines and algorithms. The private sector is already investing heavily in the area; corporate call centers increasingly use interactive robots with machine-learning capabilities to reduce call-center waiting time for customers. Robots are trained to recognize meaning, interact with customers to clarify requests, and apply knowledge to solve problems. This has proven to be very successful.

The public sector is also increasingly looking into innovative use of automation. An Asian country recently launched its first online court for speedy justice, where a judge presides over two computer panels at a workstation. A voice-identification computer program transcribes the proceedings, eliminating the need for a court clerk. For more examples of efforts to automate both internal and external processes, see Box 3, “Example approach to process automation.”

### Talent management

Solid talent-management practices are crucial regardless of the maturity of a tax authority’s digital footprint. The appeal of working for a tax authority partly rests in a sense of purpose and the inherent reward of public service, as professionals are invited to work on high-value challenges on behalf of society. However, as the operations of tax authorities change with the advent of advanced analytics, digital techniques, and process automation, questions of talent management, recruitment, reskilling, and retention are real issues for many authorities. Our benchmark found that just 10 percent of tax authorities take extraordinary measures to retain top talent, and only 5 percent offer very high-quality training and link evaluations to personal development (Exhibit 5).

In many leading organizations, we see the human-resources function taking a more active role

### Box 3

## Example approach to process automation

**Using text mining to replace manual tracking of email inquiries.** Text mining helps to identify the common queries taxpayers have after a tax-policy change, enabling the tax authority to push out appropriate communication campaigns, provide better guidance on its website, and proactively initiate updates, thereby reducing the need for taxpayers to contact the tax administration.

One tax authority in Asia extracts, cleanses, and structures text data from taxpayer correspondence

to derive patterns and insights. The automated process has replaced the manual tracking of email inquiries, which has improved customer satisfaction and saved the staff both time and productivity.

Law firms take this approach to the next level with investment in natural-language-processing software and tools to handle a wide range of unstructured documents in a variety of formats as evidence in investigations.

as a strategic business leader, linking talent to service quality and citizen satisfaction. Several developments have led to this trend, including the increasingly competitive talent market, the emergence of people analytics and digital technologies that can unlock better talent decision making, and increasing pressure to deliver productivity and better user experience.

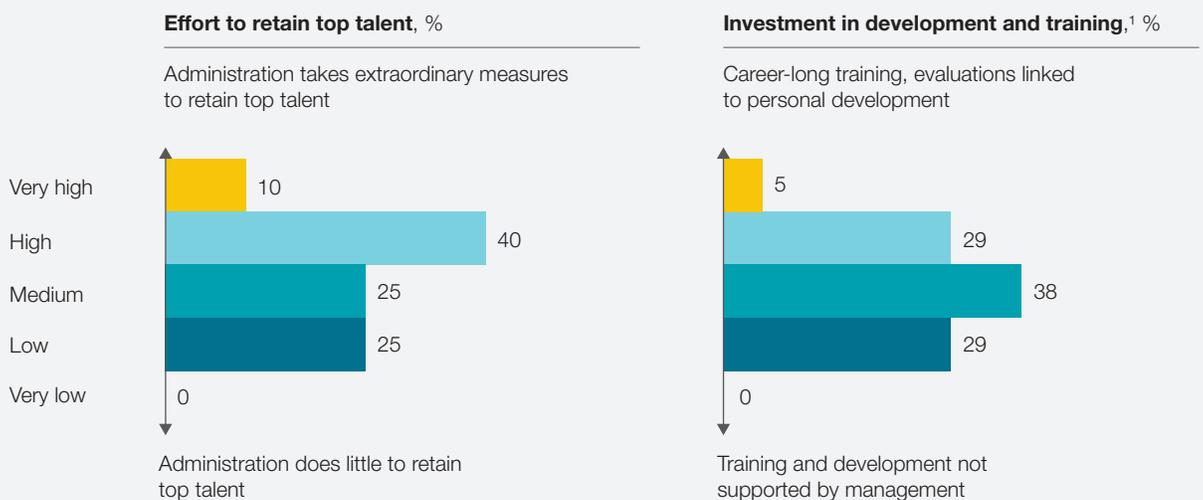
One bank uses regression models on employee performance and other organizational data to identify the top 15 percent of talent who qualify as high performers and then make them candidates for promotion, training, or transfer. In the public sector, a major state-owned telecom company uses advanced analytics to understand key drivers of employee motivation and tailor its new motivation program accordingly. It identified an opportunity to double employee motivation and improve overall

company health. Across the spectrum, agencies expect HR to harness new capabilities and technology to consistently attract, retain, and develop talent as well as increase efficiency of operations.

Many tax authorities still have limited sophistication in their talent strategies, bringing less rigor and discipline to their organizational health than their organizational performance. Less sophisticated agencies prioritize organizational dashboards that capture key performance indicators of compliance, service, and processing over measures of organizational health such as investments in talent and the approach to retention. For an example of an effort to imbue talent management with technology, see Box 4, “Example approach to talent management.”



**Exhibit 5 Tax authorities differ in the emphasis they place on attracting, retaining, and developing talent.**



<sup>1</sup> Figures may not sum to 100%, because of rounding.  
Source: McKinsey Tax Administration Performance Benchmark

## Example approach to talent management

**Using social media to target, inspire, and attract high-potential candidates.** One Asian police force takes a targeted digital approach to finding and hiring superior new officers. Aiming to recruit ambitious young men and women who aren't afraid of a challenge, the force determined that the best way to reach this group is through digital media and television. Therefore, it built a robust Facebook page, which has more than half a million "likes." In addition, the force has posted a collection of videos online that show police work and community

meetings, as well as four seasons of the television series on police procedures that it produces with a media company. Through all of this engagement, the force aims to communicate its employee value proposition to potential recruits and show them that joining the force would make them "richer, more mature, and developed." It also works to attract its target applicants by offering scholarships to universities in the city and abroad. The force's scholarship program, for example, covers all costs of earning a degree at leading universities around the world.

To make progress in the digital age, tax authorities must examine their strengths and weaknesses and ask what is holding them back from progress. Based on a survey of nearly 3,000 public servants, 80 percent of government transformations fail to fully meet their objectives.<sup>1</sup> To overcome the odds in typically large, complex, and cautious organizations, agencies must create a compelling vision for change, build a consistent process that ensures coordination and continued progress, and sustain momentum by building organizational capabilities, providing clear and influential leadership, and communicating effectively. For tax authorities looking to take advantage of the four innovation trends driving the future of citizen services, candid discussions of four questions can help begin the conversation and build alignment for the way forward:

- Are the administration's digitization efforts matching taxpayer expectations? How can these tools improve customer service and give back time to businesses and workers in the economy?
- How effectively is the administration unlocking value, improving tax revenues, and lowering costs through advanced analytics?
- How mature are tax authorities' automation efforts? What cost savings and productivity can be gained by running a digital workforce alongside a human force?

- How are tax administrations innovating in their approach to attracting and retaining talent and ensuring the right digital and analytical skills mix?

The tax administration of tomorrow will be radically different from that of today; data will be used in a highly relevant manner, allowing systematic filing and payment in a risk- and error-free environment, and back-end operations will be so smooth that taxpayers may not even need to be in contact with tax administrations anymore. To get there, tax authorities must go beyond incremental changes with existing tools and begin revising their approach to a whole host of operational tasks. ■

<sup>1</sup> For more insights on what it takes to improve the odds of success in government transformations, see Tera Allas, Martin Chęcinski, Roland Dillon, Richard Dobbs, Solveigh Hieronimus, and Navjot Singh, "Delivering for citizens: How to triple the success rate of government transformations," May 2018, on McKinsey.com.

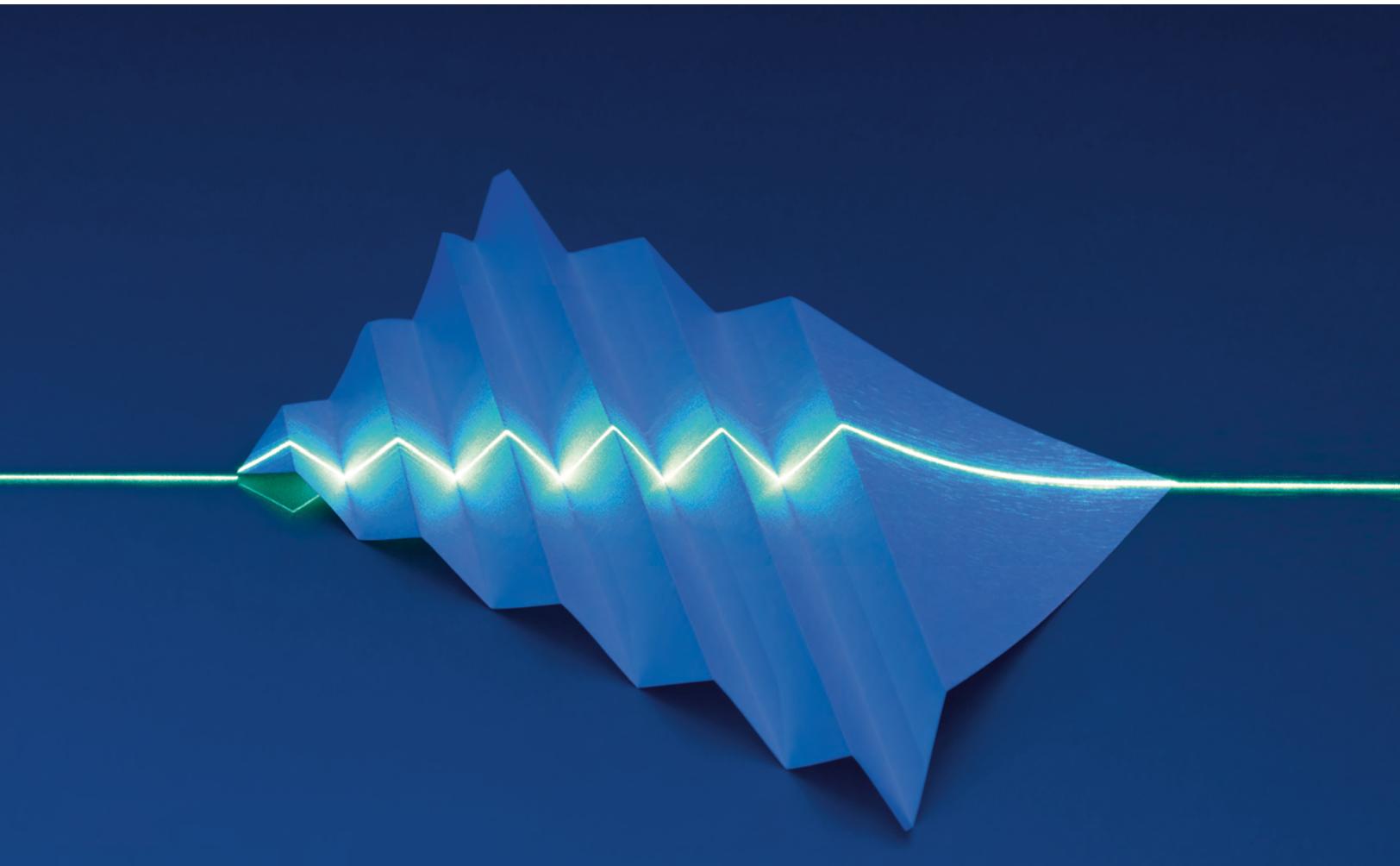
**Aurélie Barnay** is a specialist in McKinsey's Paris office; **Jonathan Davis** is a partner in the Washington, DC, office; **Jonathan Dimson** is a senior partner in the London office, where **Emma Gibbs** is a partner; and **Daniel Korn** is an associate partner in the Tel Aviv office.

Copyright © 2018 McKinsey & Company.  
All rights reserved.

# Improving the effectiveness of tax collection: \$30 in additional revenue for every \$1 spent?

An analysis of OECD countries' expenditure on tax-collection effectiveness suggests high returns on investment.

Tera Allas and Jonathan Dimson



Improving tax-collection processes and cracking down on tax evasion are among the few ways governments can raise more revenue without prompting a vocal outcry from at least some parts of the electorate.

Fortunately, it is becoming easier for governments to pursue these objectives. The trend toward cashless, digital transactions, coupled with the emergence of powerful data and analytics tools (new algorithms, visualization technologies, and data-management approaches, for instance) is helping tax authorities significantly reduce revenue leakage.<sup>1</sup> At the same time, increasing automation of tax-collection tasks is helping governments reduce processing times, costs, errors, and fraud.

These developments are clearly visible in global statistics.

Estimated tax evasion between 2005 and 2015 declined in 34 of 44 countries analyzed in a study commissioned by the McKinsey Center for Government (MCG).<sup>2</sup> Across all 44 countries, there was an average decrease in estimated tax evasion of 0.1 percent of country GDP.<sup>3</sup> During that same ten-year period, more than 50 percent of the 32 countries for which we also have cost data managed to reduce their overall expenditure on tax administration per capita by about 20 percent, on average, according to the Organisation for Economic Co-operation and Development (OECD) tax-administration database.

As highlighted in MCG's recent global benchmarking study, Denmark, the Netherlands, and the United Kingdom reduced their expenditure on tax administration by around 20 percent, 10 percent, and 30 percent, respectively, between 2005 and 2010. In the same period, the tax gap in the United Kingdom—the difference between actual tax collected and the theoretical amount that should have been collected—dropped from 7.9 percent to 6.7 percent.<sup>4</sup> Estimated tax evasion in Denmark and the Netherlands decreased by 0.5 percent and 0.3 percent of their GDPs, respectively.<sup>5</sup> Common to all these jurisdictions was the increasing use of prefilled and third-party information in tax forms.

Even the countries in our benchmarking study that increased their expenditure on tax administration ended up with net gains: the increases were counterbalanced by significant reductions in estimated tax evasion. For every additional dollar these countries spent, they saw a gain, on average, of around \$30 in tax revenues, or \$45 billion in total (exhibit).<sup>6</sup>

Turkey provides a case in point. Overarching tax reform is still a work in progress for the country; in the meantime, it has sought to improve the effectiveness of its tax collection. Starting in 2004, Turkey reorganized its tax administration, simplified its tax code, introduced digital technologies, and implemented mandatory e-filing.<sup>7</sup> Citizens' use of e-filing for income taxes rose from 30 percent in 2004 to 99 percent in 2009; in that

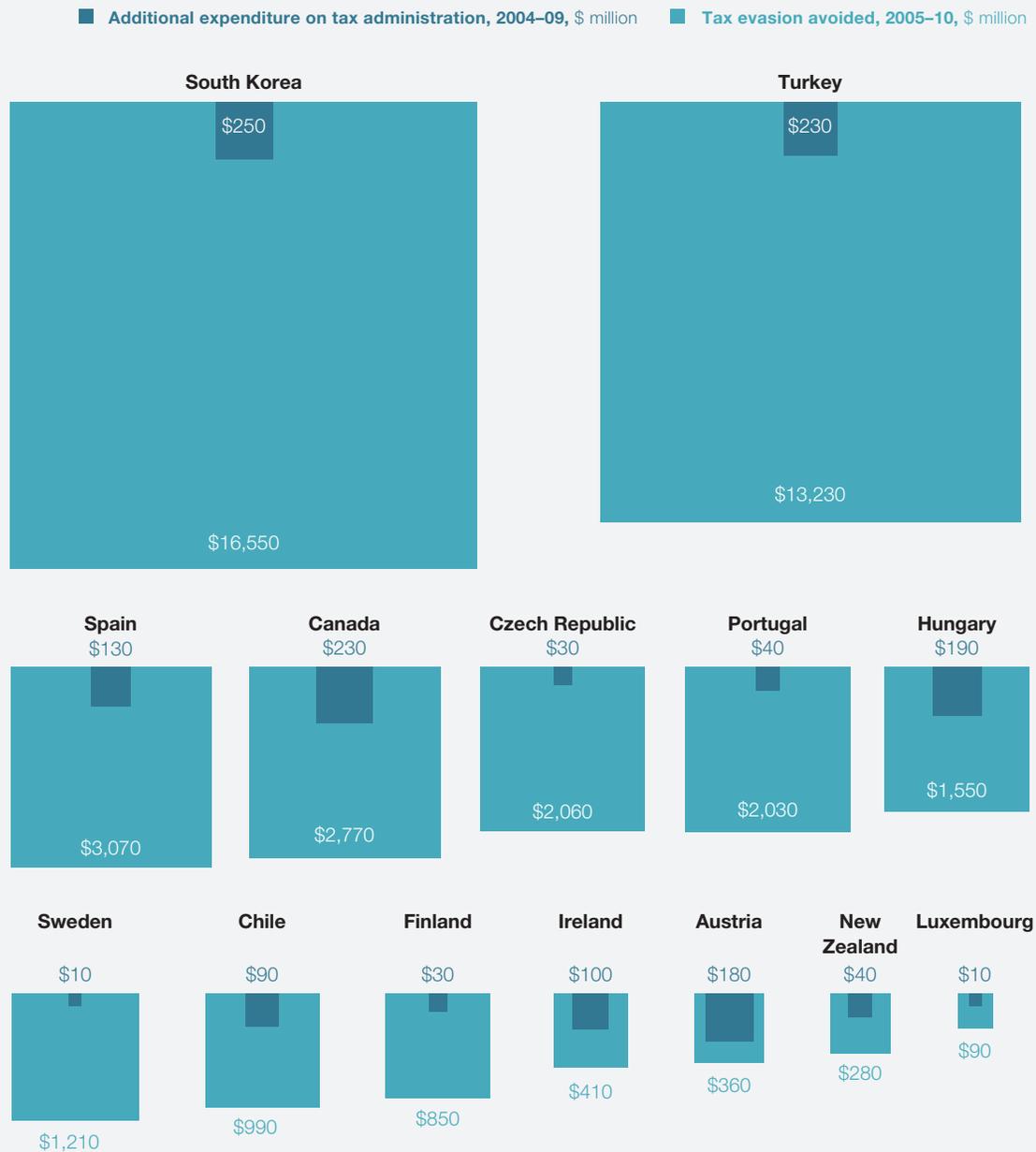
---

Estimated tax evasion between 2005 and 2015 declined in 34 of 44 countries analyzed in a study commissioned by the McKinsey Center for Government.

---

**Exhibit**

**Increased spending on tax administration was easily offset by much larger reductions in tax evasion.**



Note: This analysis includes only countries that increased their total expenditure on tax administration between 2005 and 2010. Figures are in 2010 dollars at purchasing-power parity and have been rounded.

Source: Andreas Bühn and Friedrich Schneider, "Size and development of tax evasion in 38 OECD countries: What do we (not) know?," CESifo working paper, number 4004, November 2012, cesifo-group.de; Organisation for Economic Co-operation and Development; World Bank Group; McKinsey Center for Government analysis

same period, use of e-filing for corporate taxes increased from 72 percent to 99 percent, and use of e-filing for value-added taxes rose from 70 percent to 99 percent, according to OECD data.

Turkey's tax-collection upgrades resulted in improved accountability, transparency, and information cross-checking among agencies, among other benefits. The country experienced a reduction in estimated tax evasion of 1.1 percent of GDP from 2005 to 2010—which translated into approximately \$13 billion in tax revenue that otherwise would have been lost. Turkey achieved these gains with only a modest increase in funding: spending rose by just over \$230 million, or around \$2 per citizen. In the end, each additional dollar spent on tax collection yielded almost \$60 of additional tax that would otherwise have remained unpaid.

In their quest to capture uncollected revenue, most countries could benefit from reforming their tax systems. Such changes can be politically difficult to agree on and implement, of course. The good news is that even within existing tax systems, there are still powerful levers governments can pull—using digitization, automation, and advanced analytics to improve tax-collection processes and work more efficiently. ■

- 
- <sup>1</sup> Susan Cunningham, Jonathan Davis, and Tom Dohrmann, "The trillion-dollar prize: Plugging government revenue leaks with advanced analytics," January 2018, McKinsey.com.
  - <sup>2</sup> Tax evasion is estimated based on the size of the shadow economy. The shadow economy comprises activities that are not currently registered with or declared to tax authorities but are required by tax law to be registered or declared.
  - <sup>3</sup> Friedrich Schneider, "Size and development of tax evasion for 44 mostly highly developed countries over the period 2000 to 2015," July 2017.
  - <sup>4</sup> "Measuring tax gaps 2012," HM Revenue & Customs, October 2012, gov.uk.
  - <sup>5</sup> Andreas Bühn and Friedrich Schneider, "Size and development of tax evasion in 38 OECD countries: What do we (not) know?," CESifo working paper, number 4004, November 2012, cesifo-group.de.
  - <sup>6</sup> To get these figures, we calculated what tax evasion would have been in 2010 had there been no improvement from 2005. We then compared this figure with the actual estimated tax evasion in 2010.
  - <sup>7</sup> "Survey of trends and developments in the use of electronic services for taxpayer service delivery," Organisation for Economic Co-operation and Development, March 2010, oecd.org.

For detailed findings from the McKinsey Center for Government's productivity research, see *The opportunity in government productivity*, on McKinsey.com.

**Tera Allas**, a senior fellow at the McKinsey Center for Government, is based in McKinsey's London office, where **Jonathan Dimson** is a senior partner.

Copyright © 2018 McKinsey & Company.  
All rights reserved.



August 2018

Designed by Global Editorial Services

Copyright © McKinsey & Company

This McKinsey Practice Publication meets the Forest Stewardship Council® (FSC®) chain-of-custody standards. The paper used in this publication is certified as being produced in an environmentally responsible, socially beneficial, and economically viable way.

Printed in the United States of America.