

The City of the Future

Planning for the smart, resilient, innovative, and data-driven cities of tomorrow

BY HARRY E. BLACK

Government leaders are tasked with looking to the future, and as such need to build a modern performance management and data analytics capability that informs and optimizes the execution of their organizational strategies. Cities center on service delivery, and leaders of these types of organizations need a structure—a management system. Without this, it won't be possible to optimize performance and meet the expectations of the organization's governing body, employees, or citizens.

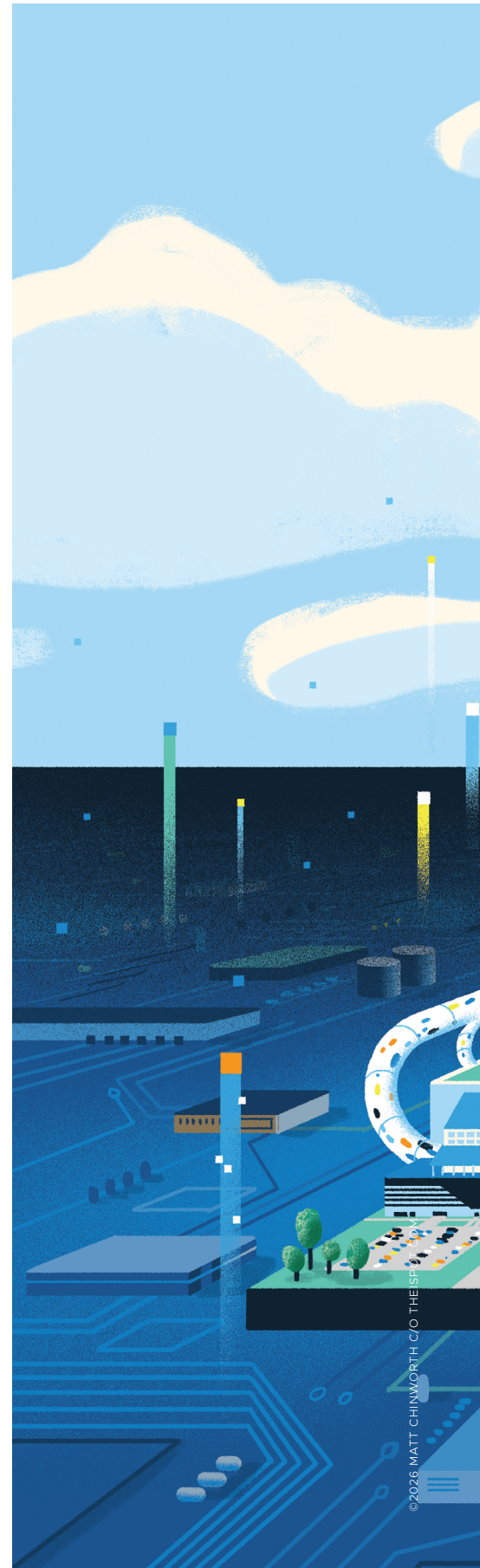
In previous decades, we have focused on performance management and stat models, and these approaches still have a place in government. Innovation is made possible by integrating strategy, performance management, and data analytics into one seamless system. This can be accomplished by adopting a

one-page strategic plan and seamlessly integrating it with an electronic performance scorecard, innovation lab (iLab) function, a system for tracking data in real time, and open data. And from there, we can look to the ways in which technology will shape the future.

Supporting priorities

Before anything else, a government must have a robust performance management strategy, starting at the top with the chief executive officer (CEO) or chief administrative officer (CAO). If the CEO/CAO and the C-suite aren't fully on board, success will be minimal and difficult to sustain.

During my time with the City of Cincinnati, Ohio, and City of Stockton, California, I established the Office of Performance and Data Analytics (OPDA). OPDA at these cities is led by a director who has a small staff of two to three full-time employees, along with a rolling cadre of graduate interns who serve







for 6- to 10-month intervals. Both cities established standalone facilities that support the program.

The first of OPDA's four key components is the one-page strategic plan. This is more operationally focused than your standard strategic plan, and it has a rolling 12-month focus. The city council establishes the priority goals, each with corresponding strategies, plans, and metrics to guide the government through that 12-month cycle. A corresponding electronic performance scorecard is linked directly to the one-page strategic plan.

The one-page strategic plan might have five to six high-level metrics for each priority goal; however, the performance scorecard might be tracking 300 data points. The one-page plan is the front end of the system. The next component is an iLab that uses Lean techniques to solve problems and to innovate. This was followed by developing StocktonStat and CincyStat, which play off the CompStat model, and then the CityStat model, which was championed by the City of Baltimore, Maryland, in 1999 and 2000, respectively. The stat process is a way to drive performance and results, with the iLab and stat process complementing each other.

The city's open data efforts make up the fourth component of the system,

feeding information into the iLab and stat processes, and allowing the government to share data and city information as public-facing visualizations and dashboards. The dashboards are for both internal and external use, so residents can do deep dives and learn about their local government and what it is doing for them, which will, hopefully, make local government more interesting and more exciting to the community.

After addressing the main functions, the government now needs to house them under one roof—getting the right senior executive to lead the effort, putting the team in place, and integrating the system throughout the organization in an organic fashion. This approach makes a substantial difference, helping a government achieve its intended results faster and better. For the City of Cincinnati, the team created a snowplow tracker dashboard that allowed residents to track the movement of snowplows by address. Residents could use the dashboard to estimate when a plow was going to get to their street, which reduced customer service calls to the city, as well as residents' anxiety. The Stockton pandemic dashboard allowed residents to track the city's pandemic response efforts and obtain information about how

to access services, including vaccination resources.

The system helps the organization optimize its strategies, allowing it to determine its focus more effectively. A government can't do all things and be all things to all people. What, then, are the most important investments of time, money, and effort to make the greatest difference for our communities?

A performance management system like this, particularly when it follows the one-page strategic plan, allows us to focus and develop effective strategies and plans, eliminating distractions. It also enables organization-wide accountability for results and outcomes, while allowing our customers to hold us accountable for missteps. The one-page strategic plan provides the crucial focal point—something we all can focus on in the same way, at the same time. With it, there is no doubt and no questions about our priorities or what will be important for us during the upcoming 12-month period as an organization. Using this integrated approach allowed Cincinnati to reduce the process cycle time for a building permit by 60 percent, and for Stockton to reduce that time by 45 percent.

Setting up an OPDA-like operation is much less expensive than one might

Technology will force us to accelerate more of a customer self-service approach to local government, which will expedite the creation, manufacturing, and adoption of further technologies.

imagine. The upfront costs are mostly one-time. You will need to build out office space and acquire information technology infrastructure/software, but the cloud has made this step much easier and less costly. When the City of Cincinnati undertook this project, the city purchased all required software, hardware, and other associated materials, and it had to be maintained locally. Today, you can simply pay for the cloud service and start working. As far as human capital expenses, the project will require a lead person and a couple of full-time analysts, along with a data manager/scientist.

Data governance and data management policies and procedures make up the foundation of the operation. [See gfoa.org for best practices in these areas.] The data governance policy provides the rules of the road in terms of how the organization does business.

There will be ongoing costs for staffing and maintaining the IT cloud services, but the real issue is how well a government can mobilize data. Cities that don't have data governance/management policies and procedures probably can't be nimble about mobilizing data. Data helps solve problems because it can be converted into information and then strategy, which leads to solutions and innovation. For example, this approach was tested and held true for Stockton during the pandemic, allowing the city to create an emergency rental assistance program that disbursed more than \$40 million to 5,000 households, provided 40,000 meals and bags of food, and issued more than 6,000 over-the-counter building permits, just to name a few of our successes.

The city of the future

Having the right technology in place will only matter more and more as we march into the future. The silver tsunami we've all dreaded for so long will be an important piece of it. Today, 65 percent of all public-sector employees—federal, state, and local—are either retirement eligible (they can put their paperwork in today if they want) or they're near retirement eligible (they can put their paperwork in within the next two to three years). Governments are already experiencing a major vacuum of talent, accelerated by the pandemic, and city governments are challenged with filling vacancies. This will get better—but not that much better. Technology will be our primary tool for counteracting the effects of a shrinking labor supply and workforce turnover.

Technology will force us to accelerate more of a customer self-service approach to local government, which will expedite the creation, manufacturing, and adoption of further technologies. Because there won't be sufficient labor to do a lot of this work, we'll need to take automation to another level. We'll need to leverage machine learning, AI, robotics, and even virtual reality. A permit center in 5 to 10 years might be in a virtual reality environment. That might sound a little out there, but if you're going to lose 40 to 45 percent of your workforce, the response will have to be innovation and creativity. So, the city of the future might be partially brick and mortar and people-based, but also partially digital.

Another (and related) issue that will shape the local government of the future is human capital management. Human

capital management is number one at this point, primarily because of the pandemic and the silver tsunami. If we don't have people in the right places, with the right skill sets, governments will be restricted in terms of what can be accomplished—particularly the ability to innovate. There are next-generation things we must pursue as a society, but we'll be slowed down if we don't have the human capital to bring those pursuits to fruition. Change and transformation require critical mass. Government processes such as civil service systems and collective bargaining will need to be transformed and contemporized if local governments are going to be able to keep up with the speed of transformation and change.

Competition for talent will continue to affect the city government of the future. The competition for labor/talent is and will remain tough, simply because the private sector is able to pay more money and can offer more attractive work-from-home options, since it doesn't have a responsibility to deliver direct services that often require a physical presence. So, local governments will need to refine their value proposition—the ability to make a difference for your community and to have a hands-on role in making change—and integrate it into their retention and recruitment efforts. Also part of the value proposition is the opportunity to work as part of a team to solve problems and to innovate, and to realize the satisfaction and fulfillment that comes from that. Furthermore, working for local government under the right circumstances can give life greater meaning because you are making a difference, and you are helping to make the world a better place.

Executives will need to have some element of information technology acumen because technology is one of their greatest tools to realize the results and outcomes that we are trying to achieve as a city government.

Also valuable is that because of the silver tsunami, government employees will be able to climb the ladder much faster because of the need and the demand for human capital. So, you can get a chance to learn a lot of things that you otherwise would not get an opportunity to learn, because local governments are challenged with filling vacancies. You will be asked to do more. But what you'll be asked to do will provide variety and a greater opportunity to excel, learn, and grow within the organization. Government employees will be able to make themselves more valuable than most private-sector employees, and faster.

The ways in which we police our communities will be another issue. Policing is going to change because, first of all, fewer people are going into the profession, and more people are leaving the profession. U.S. police departments are dealing with and managing high vacancy rates. What will that mean for the city of the future? It means that technological innovation will be accelerated, ushering in the use of robotics, advanced surveillance capabilities, artificial intelligence, and a variety of unmanned aerial/land vehicles and equipment (imagine the remote management of a crime scene). This will likely expedite the solving of crimes, quicker capture of criminals, and more effective crime prevention, and lessen the loss of life. The same applies to local fire and emergency management services (EMS), particularly unmanned aerial/land vehicles and equipment. These technological advances also have the potential to reduce property losses as well as loss of

life through remote fire suppression and EMS situational management.

Technology is everyone's job

For data to improve service delivery, enable citizen self-service, and optimize overall community well-being, technology needs to be everyone's job. So, how do we bring along folks who think that data and technology are not their jobs? It goes back to setting up robust data governance and data management policies and procedures, and then weaving them throughout the entire organization.

Both the City of Cincinnati and the City of Stockton were able to establish a data coordinator within each city department. You don't necessarily have to be an IT person to be a data coordinator. That person is an extension of OPDA, and they meet on a regular basis. The secret to making this work is not doing it with a two-by-four in your hand. You are integrating these elements into the overall culture and fabric of the organization, and the organization will adopt them more organically over time because you're involving people who typically wouldn't be involved in these types of activities. Before you know it, they become excited and more enthusiastic about the work; it's all about the way you engage the organization with operationalizing strategy and plans. Having the one-page strategic plan at the forefront is the beginning of cultivating those new practices and behaviors within the organization.

Local government executives who might be less comfortable with technology will become comfortable with it and

excel because of it. Executives will need to have some element of information technology acumen because technology is one of their greatest tools to realize the results and outcomes that we are trying to achieve as a city government. To the extent that you can mobilize and manage the organization in a way that allows you to optimize the mobilization of your data, you will be more nimble. The organization will be smarter and more strategic, and to make that happen, executives will need to better understand the power of data and its value as a tool.

Conclusion

The key to success is keeping it simple. Being laser-focused, as an organization, will be the order of the day. Many organizations go wrong when they try to do too much. Apple co-founder Steve Jobs said that "organizations fail not because they are doing too little, but because they are doing too much." The focus should really be on doing the right stuff. So, laser focus, being strategic, and making decisions about what you are not going to do as an organization is just as important as what you decide to do. Local government management is challenging work, and even more so in our post-pandemic environment. If we allow ourselves to be distracted, we make our own jobs even harder; we aren't adding value, and we won't be successful. Distraction is the enemy of success. ■

Harry E. Black is a senior fellow with the Center for Digital Government.