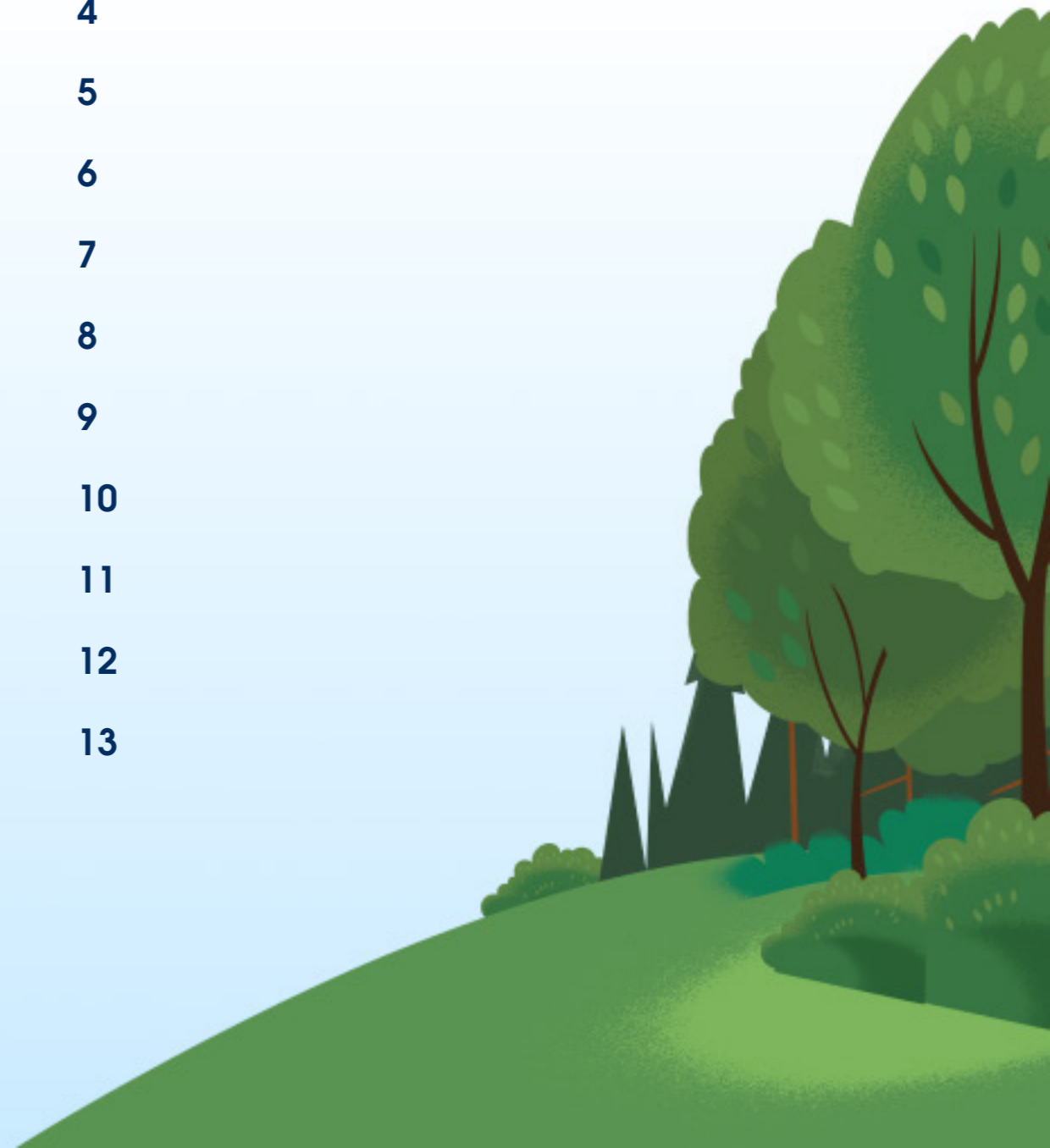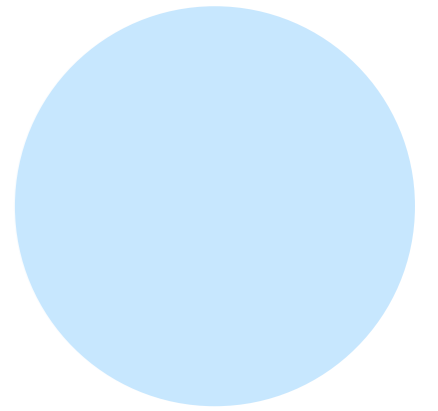# Improving HHS Service Delivery for Resilient Communities

Equip your health and human services agency with analytics that enable data-driven decision making

Table of contents

Empower HHS caseworkers and address agency challenges with data-driven decision making

We've all seen how the COVID-19 pandemic has caused a major upheaval in the way we work, with lasting impacts on nearly every industry. Few, if any, businesses and organizations are untouched.

Many are still reeling from supply chain issues, staffing shortages, business disruptions, and remote work challenges. But few industries have been affected as deeply—and forced to transform as quickly—as the health and human services (HHS) industry.

Pushed into the spotlight by the increased need to protect vulnerable children, families, and communities during a major health crisis, HHS organizations have been under enormous pressure as COVID-19 both exacerbated existing challenges and brought up new ones:

- Rising caseloads and staffing shortages causing burnout and attrition

- Interoperability challenges create siloed communication channels between—and even within—agencies

- A lack of visibility and prioritization to meet growing demands

- A shortage of personal protective equipment (PPE) for essential workers

To add to those challenges, the pandemic also brought a huge increase in demand for HHS services. In 2021, 61% of HHS agencies reported that service demand went up more than 25%.*

HHS agencies have been forced to rapidly modernize legacy technologies and develop new initiatives to optimize service delivery. Many HHS agencies and their partners sit on a wealth of valuable data—including patient health information, surveys, censuses, lab reports, and more—but often lack the ability to access, manage, analyze, and act on that data.

Ready for some good news? Using analytics to generate insights from critical data is changing the game for many HHS organizations. Analytics enable HHS organizations to empower their leaders to gain a holistic view of staffing requirements, which helps ensure that workers have the right level of support to avoid burnout during times of crisis.

For caseworkers in the field, analytics enhances data-driven decision making, enabling them to better prioritize workloads and increase the success of their efforts—which can lead to greater job satisfaction. The ability to better visualize this data is increasingly important for HHS agencies to manage spending, increase operational efficiency, and ensure timely and equitable service delivery.

In this ebook, we'll explore how Tableau can help your agency start using data more effectively.

Find out how a flexible, cohesive analytics platform enables you to:

- **Reduce data silos to improve collaboration and effectiveness**

- **Empower your workforce through data literacy and self-service tools to better manage risk and increased demand**

- **Eliminate service disparities and advance health equity**

- **Improve communication and trust with the public through transparent, actionable data**
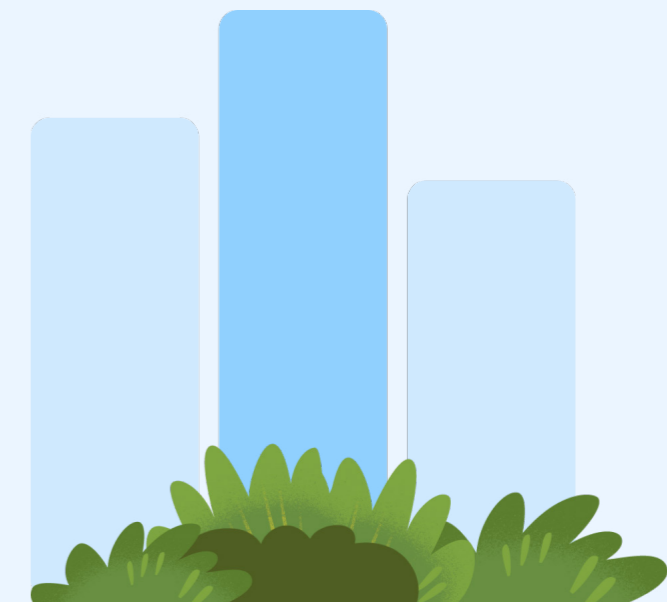
Break down data silos to facilitate better communication across the organization

The data challenges

Families facing hardships often seek services from more than one HHS agency at any given time. Unfortunately, these agencies don't always work together to help solve these challenges. To compound this challenge, departments within a single agency often fail to communicate or share information. These agencies have an abundance of useful data, but don't have the right technology to link and quickly translate that data within and across systems. This means outdated information can drive inaccurate decision making that has a human cost.

Systemic barriers in the child welfare system are also difficult to overcome in developing strategies to address service and quality gaps. Communication, collaboration, and information sharing are critically important for agencies that are trying to match and deliver appropriate individualized services to children and families.

The goal

Simplify information sharing across programs, departments, and agencies. When all stakeholders can access the same data, it's easier to solve problems, facilitate better communication, and work more efficiently and collaboratively.

How Tableau helps

Brings together disparate data channels to deliver a 360-degree view of a child's experience and economic circumstances, so problems can be addressed at the root

Measures and reports on state-wide performance metrics, down to individual caseworkers (caseworker load, delinquency rates, etc.)

Optimizes workforce management by measuring caseworker performance, staffing, and support– helping to drive greater efficiency and alleviating caseworker burnout

28% of state data exists in a dashboard that not many people can access*

*TRACIE Healthcare Emergency Preparedness Information Gateway, "COVID-19: Concerns and Opportunities for Healthcare Leadership," September 2021

State of Indiana Department of Child Services standardizes its technology stack to deliver personalized, real-time care

Business challenge

IN DCS manages 258,000+ unique workflows each year, in addition to helping coordinate the efforts of caseworkers who work together to deliver care. The agency needed a better way to manage all these complex processes and data sets, while continuing to deliver personalized services for each case.

Tableau + Salesforce solution

The team launched CCWIS, a case management system built on Salesforce 360 Platform for Government. CCWIS connects multiple systems across multiple organizations, offering IN DCS a data-driven, 360-degree view that helps provide personalized, actionable, real-time care. IN DCS layered on Tableau to give its teams the ability to share data with the entire enterprise.

Additionally, to help workers feel supported and more effectively do their jobs, IN DCS worked with Tableau to develop a dashboard called the FCM (Family Case Manager) Data Companion Tool. The dashboard was initially developed to measure FCM performance, but now it also allows supervisors to manage the bigger picture for their entire division. They can see where FCMs are placing children and look at the engaging parent metrics to see which caregivers FCMs are interacting with. Supervisors can use performance data to identify how FCMs are doing and when action needs to be taken to better support them.

Results with Tableau

The CCWIS platform helped IN DCS pivot quickly during the pandemic to give employees the tools they needed to safely do their jobs. The team deployed an app that tracks masks, hand sanitizer, and general PPE available to employees in real time. It also used CCWIS to manage shift scheduling to meet capacity limitations and facilitate contact tracing, layering on Salesforce Maps to visualize the number of cases per office or team.

Just 10 days after it launched, 4,000 people were using the app.

Empower HHS public health workers to manage risk and make informed decisions with data

The data challenges

To help workers make informed decisions, HHS agencies need better ways to connect analytics capabilities with the analysts and program managers who draw insights from that data. Frontline caseworkers are already overburdened with the pressure of unprecedented demand for services, so it's important that they have data insights at their fingertips. Easy access helps them prioritize cases, manage risk, and make the right decisions for the children and families they work with.

Also, when caseworkers can't use data to help them prioritize their work, it's hard to see what impact their efforts have–which detracts focus from the cases that need the most attention. With the spike in cases, caseworkers are getting increasingly bogged down by data and paperwork. According to Navigator, 45% of a caseworker's time is spent on administrative duties rather than in the field.*

The goal

Create a strong, self-service data culture that helps optimize service delivery and empowers frontline workers with trusted, actionable data to make better decisions. Unlocking the full potential that human services technology holds means investing in upskilling the workforce, building their capacity to use and analyze data, and equipping them with modern tools and resources for success.

How Tableau helps

Provides an intuitive, flexible self-service tool to help caseworkers prioritize highest-need cases and reduce administrative duties

Enables caseworkers to manage risk by leveraging AI-powered predictions that help:

- Forecast the likelihood of repeat events, such as maltreatment and re-entry into foster care
- Address overdue applications that require immediate attention
- Reduce implicit racial bias from decision-making

Enhances managerial support for caseworkers by pinpointing what services need more coverage and identifying opportunities to course correct

* Navigator HHS Report, March 2022

St. George's Hospital cuts patient waiting times, optimizes clinical care for millions

With over 9,000 dedicated staff caring for patients, St. George's University Hospitals NHS Foundation Trust in London is one of the UK's largest healthcare providers. It offers acute hospital services, specialist care, and community services to a population of 1.3 million people.

Business challenge

St. George's Hospital relied on spreadsheets and SQL Server Reporting Services (SSRS) for its data analytics and reporting needs. The siloed nature of reports made it difficult to distribute important information throughout the organization, and the reports were often difficult to navigate and understand. As data plays an increasingly pivotal role at St. George's, the hospital recognized the need for a modern, flexible data platform.

Tableau + Salesforce solution

St. George's IT team evaluated many solutions and identified Tableau as the best fit for its needs. The team was impressed by Tableau's speed of development, flexibility to link to and present different business sources, and its centralized location for data consolidation.

Results with Tableau

Since implementation, Tableau usage has grown substantially throughout the hospital, and St. George's now has more than 2,000 active users. Clinicians, nurses, administrative workers, management, and executive staff are able to quickly find the data they need, saving time and enabling a flourishing self-service data culture throughout the organization.

240K Tableau hits/month from self-service analytics users

"A few years ago, most users wouldn't know where to look for data so they would just come to the central informatics team, which turned it into a bottleneck for productivity. Now they can easily find most of what they need directly in Tableau, saving time for everyone."

Preethi Satheyendra, Principal Information Analyst, St. George's Hospital
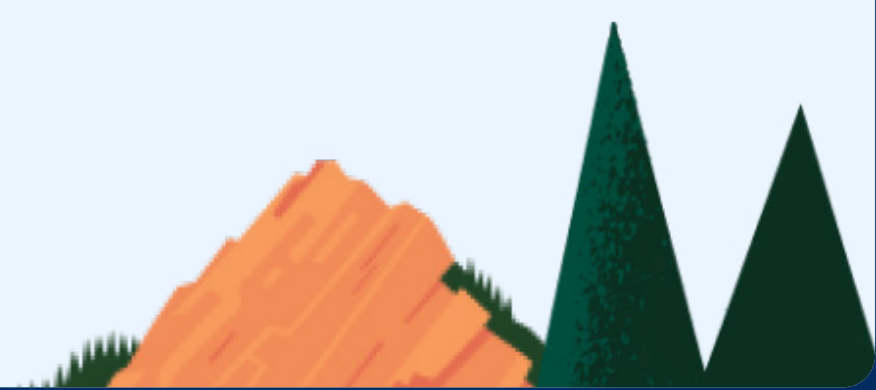
Eliminate health disparities and advance health equity

The data challenges

HHS agencies need to be able to access the right data at the right time, so that they can take swift action to serve the community. Without current, easily accessible data, it's difficult for agencies to spot health equity disparities and gaps in service availability and utilization. And when they do recognize disparities, taking action poses many other challenges, including:

- **Standardizing how social determinants of health (SDOH) data is collected, communicated, and defined to drive actionable decision making**

- **Finding a clear focal point for analytics efforts that maximizes citizen outcomes while controlling costs**

- **Building a complete picture of socioeconomic barriers that exist and how they may impact care quality**

- **Providing business insights to both clinical and operational leadership***

One real-life example of this is vaccine management and distribution. To make significant advances against the spread of disease, equitable vaccine distribution must be a focal point–but ensuring that vulnerable segments of the population are prioritized has proven to be a challenge.

There's still a lot of work to be done to achieve vaccine equity, but to get there, we must be able to analyze, understand, and use insights revealed by disaggregated data. When we explore the data at a disaggregated level, we can see details that help uncover the bigger picture. By finding the hidden stories in our data, we're able to acknowledge that every data point is a human being, not just a number. Disaggregated data helps us better understand what communities are underserved, so we can respond with public health policies and communications outreach to reduce those disparities.

The goal

During infectious disease and other time-sensitive outbreaks, identify underserved communities and help state and local health departments leverage real-time data for expedited decision making.

Take proactive care measures by knowing which patient populations are at risk. To improve health equity, pinpoint which communities need services and then work to ensure that they receive care. When more granular data is available, health departments can pinpoint information such as vaccine delivery by postal code, and then they can use that data to address equity challenges from the ground up– for example, offering pop-up vaccine clinics in underserved areas.

How Tableau helps

- Standardizes the way data is collected and expressed across the organization to make it easier to understand, connect and trust the data

- Promotes health equity and eliminates systems biases by highlighting disparities and gaps in service availability and utilization

- Provides detailed, patient-level data to better understand affected populations and the burden of disease so that health departments can conduct investigations and implement proper prevention and control measures

- Ensures proper coverage and intervention for vulnerable populations by leveraging real-time data streams from multiple sources to build a holistic view of populations at risk

*HealthTech Magazine, "How Technology Helps Identify and Track Social Determinants of Health Data," August 23, 2022.

Guy's and St. Thomas' Charity uses advanced mapping to tackle major urban health issues

Guy's and St. Thomas' Charity is an independent urban health foundation that works with other agencies, such as the Guy's and St. Thomas' NHS Foundation Trust, to improve public health in London.
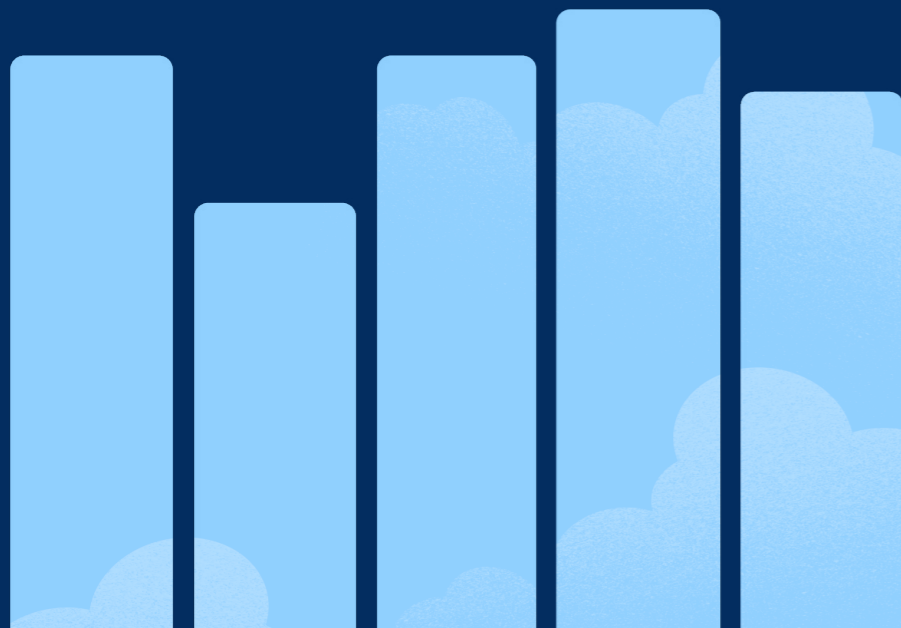
Business challenge

The charity is often tasked with identifying the regions in the greatest need of charitable support, so it can appropriately allocate budget funds and resources. To do so, it needs to have up-to-date data at hand. Until recently, Guy's and St. Thomas' Charity relied on traditional means to identify at-risk areas, using Excel to build scatter points and get basic insights into child obesity across neighborhoods. Providing a deeper level of insight proved difficult for the charity—for one thing, it was incredibly slow and time-consuming.

Tableau + Salesforce solution

Using Tableau Cloud was an easy decision for the Guy's and St. Thomas' Charity team. The charity standardized on the powerful, secure Tableau analytics platform to quickly share data and insights, enabling it to identify areas with the greatest density of health problems and help them access the right resources. Guy's and St. Thomas' Charity also used Tableau's advanced mapping capabilities to create interactive maps that helped it gain insights for its childhood obesity program. Mapping pinpoints specific areas of risk and allows the charity to provide a faster, more targeted response.

Results with Tableau

Using Tableau's inbuilt maps and new hyper files, Guy's and St. Thomas' Charity is able to get insights and answers to the team's questions within minutes; this process used to take weeks. And by pinpointing the precise location of some problem areas, the charity has rapidly expanded its programs to where they're most needed.

Deliver transparent, actionable data to constituents and communities

The data challenges

Transparency is now more critical than ever before. The COVID-19 pandemic raised the bar, increasing the public's transparency expectations and level of interest in government operations.

People want to know how agencies are serving citizens–which means websites that show agency performance, the demographics they're hitting, and how the community is benefiting.

How data was shared throughout the pandemic has raised expectations for easy-to-consume government information at all times. Many people are questioning media reports and seek information and data directly from the source–which in many cases is the government.

The goal

Build public trust in data by delivering transparent, concise information so that constituents of all ages and abilities can easily understand it and make better decisions. Offering clear information from the scientific community helps people feel more informed and builds trust, so that they're more likely to comply with response measures.

Transparency helps hold caseworkers, program managers, and entire agencies accountable for meeting their performance metrics, a critical factor in receiving future funding. Also, to have a more responsive, trusted government, state and local officials must be able to share timely, accurate information through visualizations and dashboards.*

How Tableau helps

- Enables users to embed interactive, accessible visualization into digital reports; the reports offer insights into a health or welfare subject, and the vizzes bring the data to life by visually communicating statistics, trends, patterns, and findings

- Aggregates and synthesizes customer data across local, state, and federal data sources in real time to provide a holistic view of the constituent

- Helps organizations deliver transparent, concise information for constituents of all ages and abilities as well as groups with specialized needs (researchers, policy setters)

- Enables public sector leaders to examine key variables from a variety of data sources, providing deeper understanding of the impacts of a disease or emerging threats

*GCN, "Data-driven communications lessons from COVID-19," May 5, 2021. https://gcn.com/data-analytics/2021/05/data-driven-communications-lessons-from-covid-19/316050/
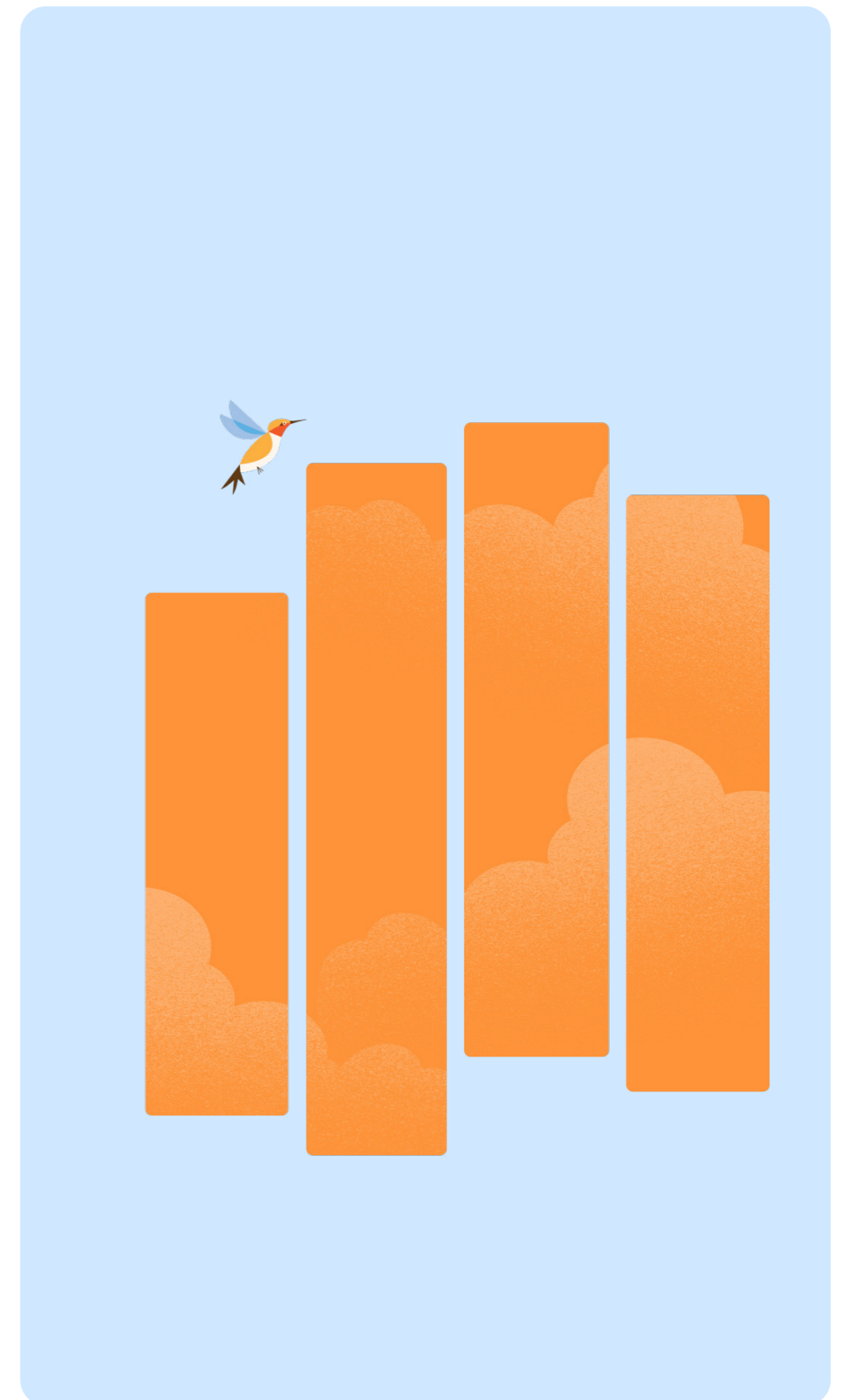
Australian Institute of Health and Welfare transforms public data into interactive visualizations

The Australian Institute of Health and Welfare (AIHW) is Australia's national agency for health and welfare statistics. AIHW informs discussions and policymaking in health, housing, and community services by producing high-quality data and reports.

Business challenge

Because the AIHW communicates to a wide-ranging audience that includes both the general public and groups with more specialized needs, it needed to find visualization tools that could present information in a captivating format. The organization wanted tools that could cater to specialist data users while remaining accessible and easy to use across a wide range of skill and data literacy levels.

Tableau + Salesforce solution

The AIHW now uses Tableau to embed interactive vizzes into online reports, which offer insights on a welfare or health subject. With Tableau, staff take an exploratory approach to data visualization and think of creative ways to tell meaningful stories from large volumes of data. The vizzes also support the reports by visually communicating statistics, trends, patterns, and findings.

Results with Tableau

With Tableau, the AIHW has evolved into a culture of innovation. Tableau's accessibility as a tool, together with strong technical support to achieve business goals, enabled the AIHW to scale it across a large number of business areas. The organization can integrate its data more closely with its stories, bringing the data to life. Feedback about the vizzes has been overwhelmingly positive, with frequent requests coming in for more interactive vizzes.

This flexible implementation model resulted in up to 1,500 AIHW vizzes shared with the public within a year, and around 6,000 vizzes created internally, changing the way people thought and felt about their work.

Intelligent analytics for better, faster decision making

You depend on your data to make informed decisions that directly impact public health and child welfare. And data analytics are helping health and human services agencies improve service delivery, empower caseworkers, and lower operational costs.

That's why Tableau offers the broadest and deepest data analytics platform: a fully integrated set of data management and governance, visual analytics, data storytelling, and collaboration capabilities, with Salesforce's industry-leading Einstein AI built right in.

One thing you can count on?

We'll continue to innovate new products that help your agency analyze and act with data even faster, so you can focus on what really matters: the families and communities you serve.

Tableau
Make decisions at the speed of change

- Visualization & Exploration
- Salesforce-Native Apps
- Fast Time to Insights
- Actionability & Collaboration
- Flexible Deployment
- AI-Powered Predictions
- Embedded Analytics
- Data Insights & Explainability
- Data Management & Prep

Analytics Apps

Analytics Platform

Next steps with Tableau:

With Tableau's powerful analytics platform, you'll be able to equip your agency with the right tools and data to support caseworkers and deliver better care to citizens and communities.

Ready to learn more about how Tableau can help you make data-driven decisions and overcome some of your toughest challenges? Here are some resources to get you started:

Want to explore Tableau for yourself?
Download a free trial

Wondering how we empower organizations like yours to improve outcomes and public trust?
Learn more about our public sector solutions

Curious how to lead with a data culture?
Begin your data culture journey today

Want deeper insights into Citizen Service Requests (CSRs)?
Get started with Tableau's Citizen Service Request Accelerator

Looking to engage and learn from our community?
Explore Tableau Public

Tableau helps people see and understand data. Tableau offers visual analytics with powerful AI, data management and collaboration. From individuals to organizations of all sizes, customers around the world love using Tableau's advanced analytics to fuel impactful, data-driven decisions.

Tableau also integrates with Salesforce Customer 360–a customer relationship management (CRM) platform that connects the business with a shared view of customer data–giving every department access to the most powerful, comprehensive, and intuitive analytics features embedded directly into workflows. By bringing your customer data to the center of your work, you can grow your relationships with your customers and employees.