

Interactive, Community-Based Data Dashboards for System Performance Improvement

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What's Next:
In Data, Leadership, and Community





Community-Based Data Dashboards Taylor, Remigio, Miller

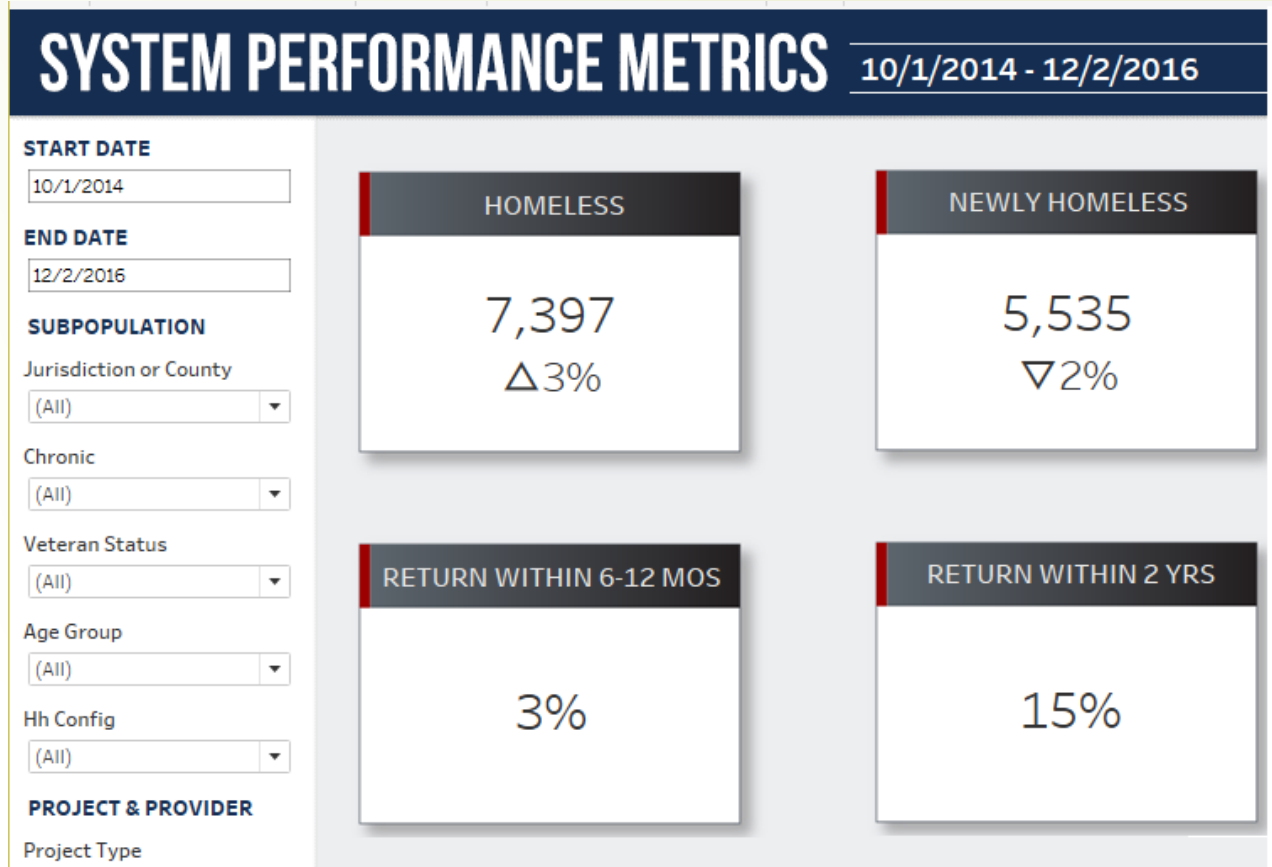
- Introductions
- Overview of Dashboard Presentation

The issue: Communities need flexible and sustainable strategies to plan for and assess system change

A solution: Customized HMIS data dashboards for ongoing local analysis to drive decision-making

Community-Based Data Dashboards Taylor, Remigio, Miller

HMIS analytic dashboards provide interactive visualizations for effective analysis, exploration, and multiple ways to drill data





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Data Discovery – Small Group Exercise

- What data-based focus would you choose for your community?



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Data Discovery – Small Group Exercise

- Returns to Homelessness
- Length of Time Homeless
- Number of Newly Homeless
- Successful Permanent Exits
- Chronically Homeless



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Data dashboards are designed to overcome existing barriers



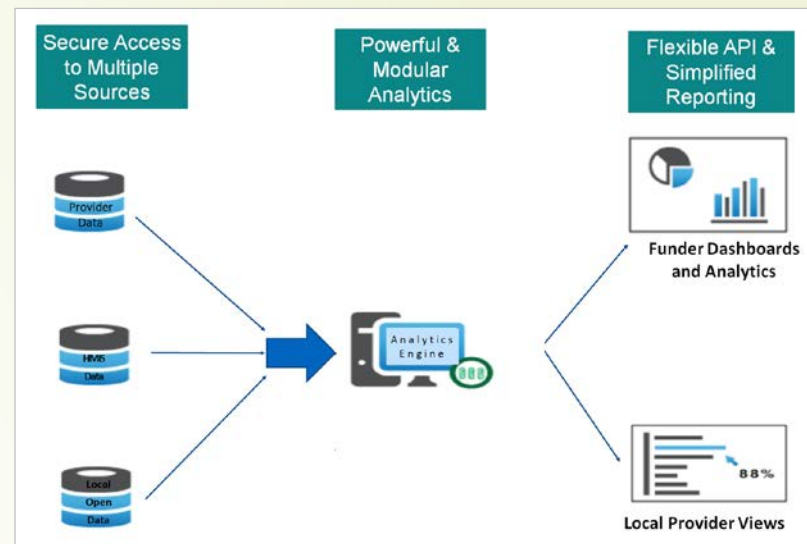


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HUD HMIS - CJ DATA INTEGRATION PROJECT

Cloudburst is supporting HUD and the Data Driven Justice Initiative to connect homelessness and criminal justice data, improving system capacity to:

- Identify the frequent user population to improve timely connection of housing and services to high-need population
- Improve system coordination cooperation and data linkage across cross-sector Homelessness and Criminal Justice systems
- Drive data-driven decision-making to decrease homelessness and recidivism





**Community-Based Data Dashboards
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HMIS Community Cloud Product Deliverables

HHS System Dashboards
for Administrators, Providers,
Funders, & Public



Client Tracking Tools
for case managers



Housing App for Housing Locators



Data Action Cycle Playbook

Data Utilization Trainings / Data Maturity Framework for project staff and administrators

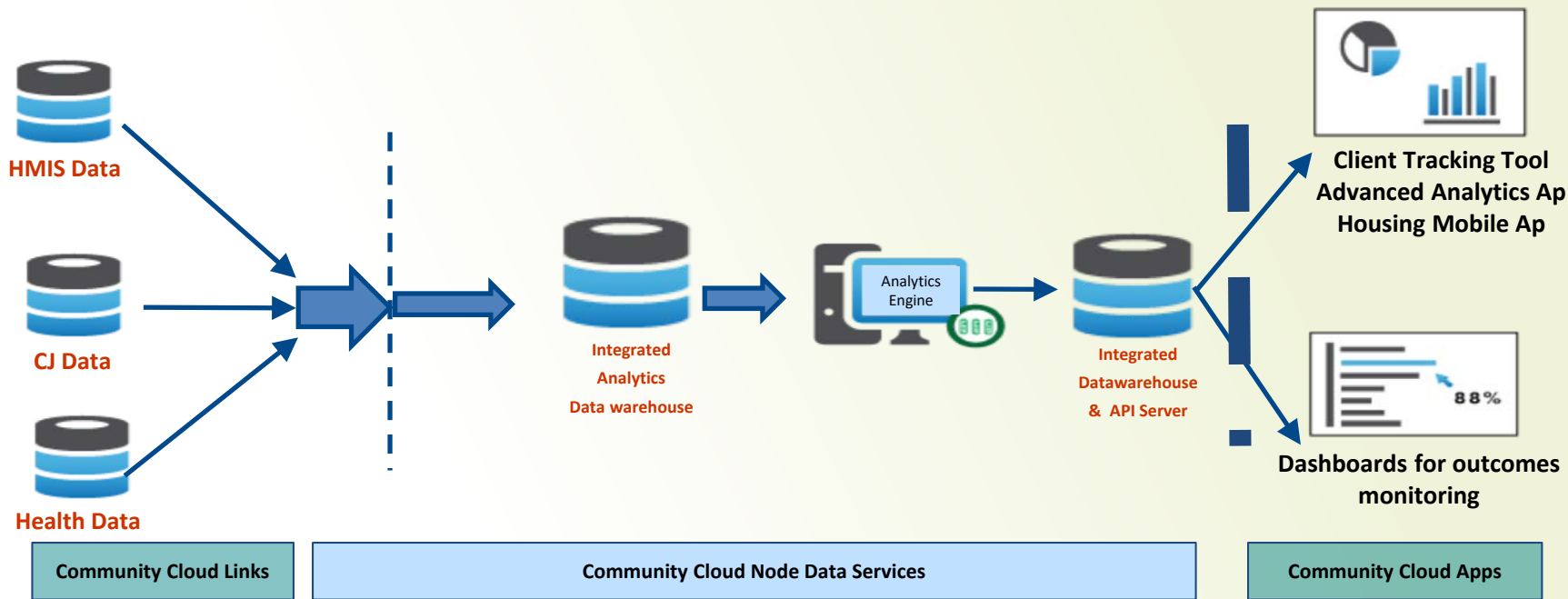




Community-Based Data Dashboards

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- Automated Access to Multiple Sources
- Intelligent Integration & Cleaning
- Standard, Scalable Storage
- Modular Analytics
- Common APIs
Privacy-preserving Aggregation, Authentication & Authorization Layer
- User-centric Applications, Dashboards & Simplified Reporting



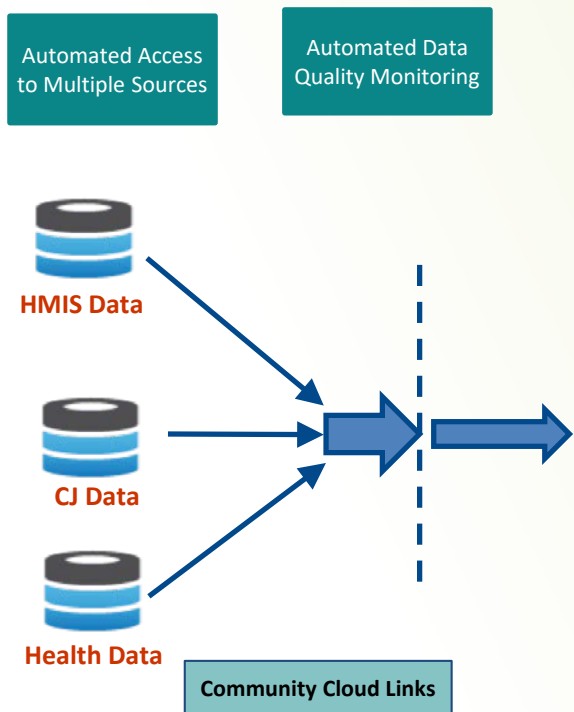
Community Cloud Links Community Cloud Node Data Services Community Cloud Apps





Features of a **Community Cloud Link**

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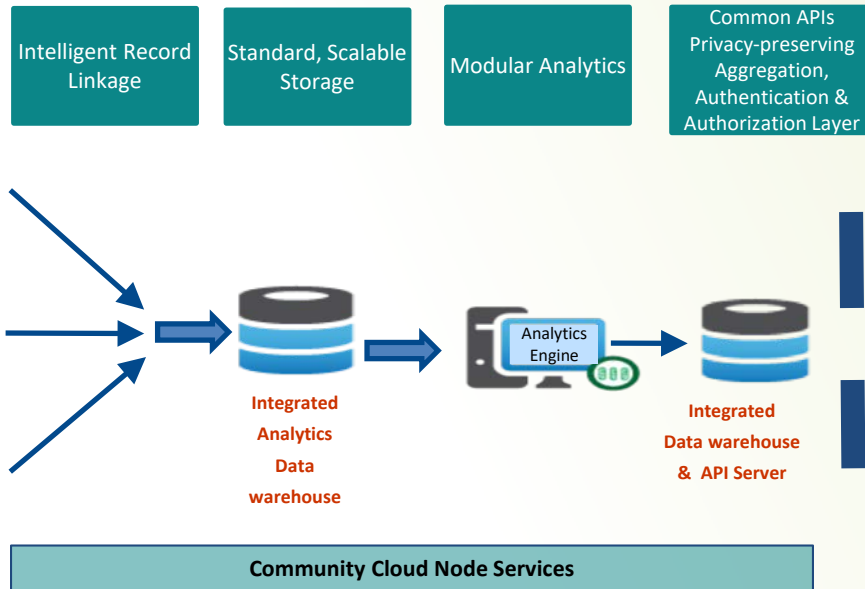


- **Automated Extraction, Transformation, and Loading** keeps data up to date
- **Automated data quality monitoring**
- **Authorization and authentication** for parent nodes to ensure sensitive data
- Optional **manual data uploader & validation** service for excel-based data ingestion





Features of a **Community Cloud Node**



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- **Integrated data warehouse** with a common schema
- **Public APIs** for Open Data Reporting
- **Private and Secure APIs** for Application Development
- **Automated Extraction, Transformation, and Loading (ETL) engine**
- **Deduplication engine**
- Automated **data quality monitoring** services
- Ability to add future **OpenHMIS instances** (at reduced cost)





Features of **Community Cloud Apps**

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User-centric Applications,
Dashboards & Simplified
Reporting



Housing App &
other provider-facing applications



System-wide outcomes
dashboards for monitoring time
to housing

Community Cloud Apps

Supports a wide variety of applications through well documented API.

Apps include:

- **System Dashboards** for performance monitoring
- **Client Tracking Tools** to identify frequent users and match solutions
- **Advanced Analytics App**
- **Housing Mobile App** and other provider facing applications

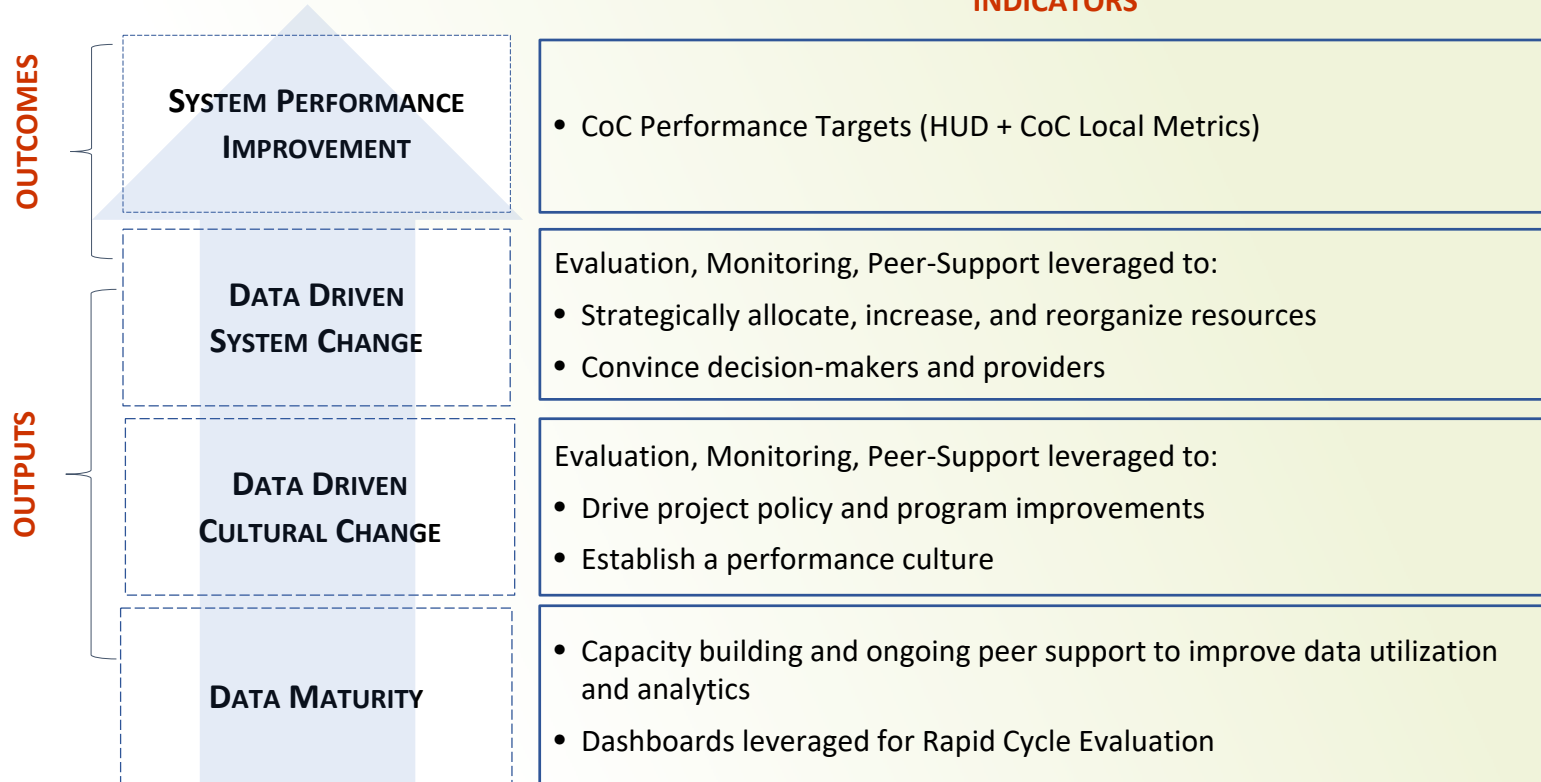




**Community-Based Data Dashboards
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HMIS Community Cloud Benefits

INDICATORS





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Data Maturity Framework

Improved resource targeting, service collaboration, client outcomes

Build Local Capacity

HUD Sponsored:

- ✓ Data Maturity Training
- ✓ Community of Practice
- ✓ Peer-Leadership and Mentoring (ongoing)

Ecosystem
Readiness

Data and Technical
Readiness

Change
Management
Readiness

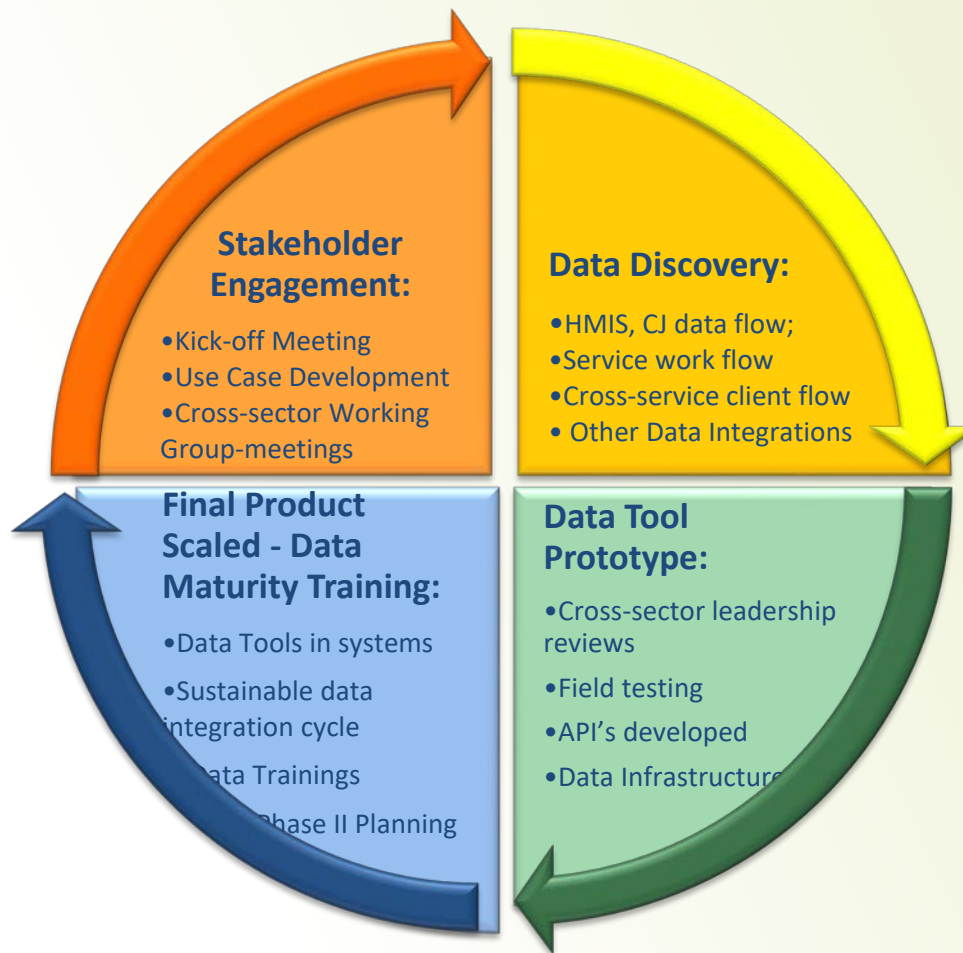
Move Data into Action





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Data Integration Project Cycle





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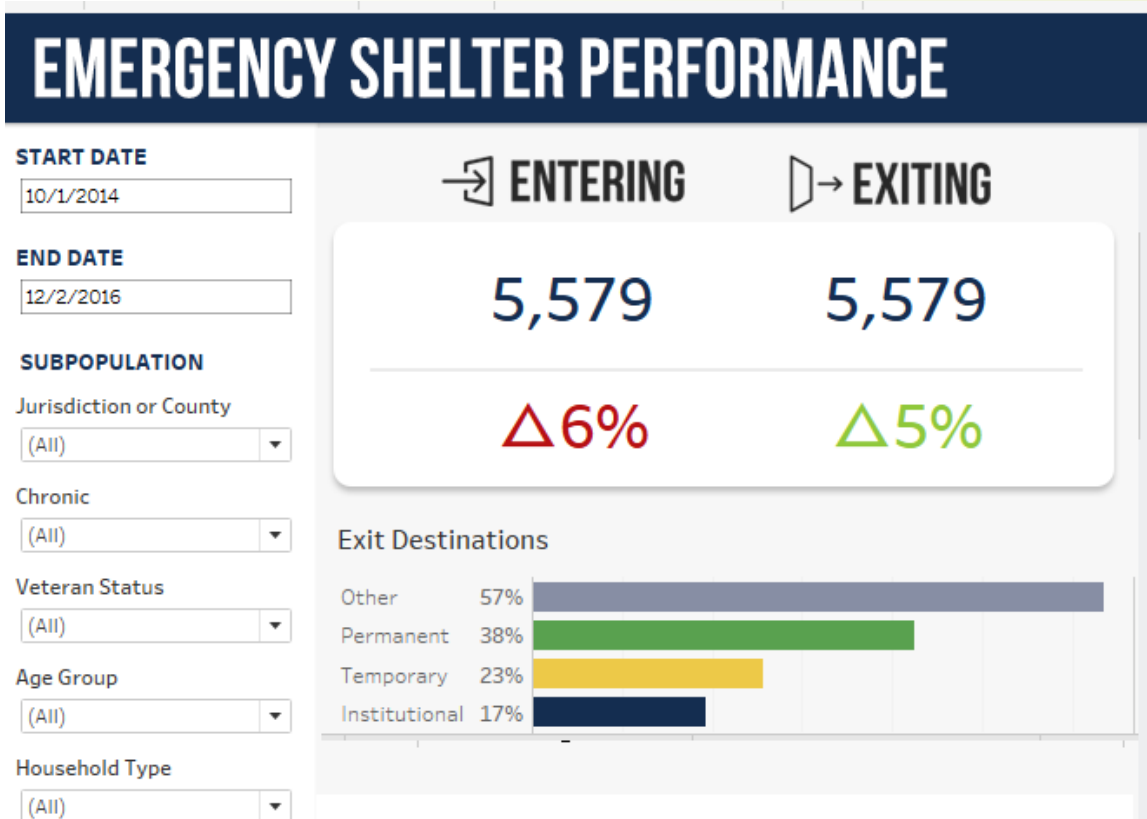
Community Partners

- Richmond, VA
- Prince George's County, MD
- Central Florida (Orlando, FL)
- San Diego, CA
- Utah



**Using Data Tools to Improve Outcomes
Taylor et. al**

Dashboard Data Discovery Exercise





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Data Maturity: Improved resource targeting, service collaboration, client outcomes

Ecosystem Readiness

- System leadership/commitment to implementation of change
- Environment conducive to data-driven decision making
- Active and effective system partnerships between stakeholders

Data and Technical Readiness

- Ongoing commitment to data linkage and data usage
- Comprehensive MIS networks
- Staff capacity to analyze data
- Data comprehension

Change Management Readiness

- Organization readiness and capacity for collaboration
- Active participation in change planning
- Shared knowledge of best practices
- Ongoing data review to monitor and evaluate impacts



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For more information

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