Leveraging Technology to Amplify Impact in Housing & Homelessness

A research report highlighting opportunities and insights for leveraging technology to address challenges in affordable housing and homelessness.
This report outlines insights and opportunities for the affordable housing and homelessness sector to improve the journey for people who have experienced homelessness across the lifecycle of entering homelessness to stabilizing and finding housing.

It includes findings from organizations in the San Francisco Bay Area and is intended to support organizations in the sector in understanding challenges and opportunities where technology can support improvements. Given the mission of Salesforce.org Impact Labs, this report specifically focuses on where technology can play a role; however, additional housing and policy change is necessary to fully address homelessness.

Insights include:
- Opportunities to leverage technology for improvement
- Design best practices to guide tech solutions

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Introduction

Challenges in affordable housing and homelessness are complex and require cross-sector participation to address. In collaboration with community stakeholders across the San Francisco Bay Area, Salesforce.org Impact Labs took a design thinking approach to understand opportunities where technology can amplify the impact of governments, nonprofits, and educational institutions who are tackling homelessness.

It is important to note that there are limits to what technology can do. Ultimately, more affordable housing options and upstream interventions are needed to meet the needs of those who are experiencing homelessness.
Homelessness in the United States and the San Francisco Bay Area

According to a report on The State of Homelessness in America, half a million people are homeless on a given night in the United States. California alone is home to 47% of all unsheltered homeless people in the country, with San Francisco having the highest rate of unsheltered homelessness and fourth highest rate of sheltered homelessness.¹

People experiencing homelessness are often required to make choices amongst limited options while under immense stress or unmanageable health issues. In addition to being faced with extreme hardship, they must also navigate a complex system of services, policies, and stakeholders in order to get the help they need to stabilize. Families and individuals face structural barriers like navigating disparate systems, completing multiple applications, and getting lost on a waitlist.² This is only made more complicated in resource dense communities like the San Francisco Bay Area.

In response, experts in the field like The National Alliance to End Homelessness argue that by coordinating systems and collaborating across organizations, communities can help individuals move through the system faster and with more ease. For example, a shared data system, or Homeless Management Information System (HMIS), can support accurate data analysis at a system-level in addition to directly strengthening the care for an individual who is experiencing homelessness.³ Cities like San Francisco and others have taken steps to implement housing-first policies and coordinated entry systems which leverage a shared HMIS to ease some of this friction.⁴

This report unpacks opportunities surfaced during the Salesforce.org Impact Labs research and collaboration on identifying ways technology can support challenges in homelessness and design considerations for technology solutions created.

Note: Technology alone will not solve homelessness. Technology can help reduce friction in the system and improve the experience when moving from unhoused to housed. This report outlines these tech opportunities, with tech innovation occurring alongside and in support of other critical interventions like housing and policy change.

⁴Department of Homelessness and Supportive Housing, City and County of San Francisco. 2017. “Five-Year Strategic Framework Executive Summary.”
Opportunities to transform the path from unhoused to housed

The journey of moving from unhoused to housed is nonlinear and often circuitous, especially in areas where a key reason for homelessness is insufficient inventory of homes and shelters to meet the demand.5 Outlined on the next page is an experience map compiled through interviews with experts that encompasses the hurdles people experiencing homelessness and those supporting them must jump through in order to receive the care they need. While technology cannot solve these challenges on its own, there are opportunities to reduce friction and repeated barriers in the process that send those looking for housing and services back to the beginning of their process.

Through interviews with case managers, service providers, people who have experienced homelessness, and industry experts, the Salesforce.org Impact Labs cohort identified three opportunity areas for technology’s role in addressing homelessness. In collaboration, governments, nonprofits, and private sector organizations can work together to leverage the insights listed below to make a stressful, challenging, circuitous experience a little more streamlined and user-centered.

Opportunities for Technology:

1. / Create a connected experience
2. / Improve findability of available housing and human services
3. / Capture and leverage data to predict success

Map of Homelessness Experience

Person Experiencing Homelessness (PEH)

Unhoused

- **Activities**
  - Calling 211 for local services, searching online, asking friends and family for help
- **Challenges**
  - Embarrassing to ask for help
  - Overwhelmed and often in crisis
  - Disparate sources of information
  - Unclear eligibility requirements

Housed

- **Activities**
  - Working with Case Managers, seeking additional support services
- **Challenges**
  - Stressful repeat experience if subsidy ends and not stabilized
  - Difficult to get Case Manager support, due to high case loads

Service Provider (i.e. Intake Specialist, Case Manager)

- **Activities**
  - Receiving phone calls, walk-ins, and inquiries about availability and eligibility
  - Intake paperwork, tracking down referral options, problem solving to find supports
  - Completing additional paperwork, contacting PEH to notify acceptance
  - Quarterly assessments, immediate crisis support, documentation of visits and reporting
- **Challenges**
  - Retelling of traumatic stories
  - Waiting while in crisis
  - Locating personal documents
  - Time consuming paperwork
  - Retelling of traumatic stories
  - Time consuming paperwork

Tools and Resources

- **Service Provider**
  - Service Directories (i.e. 211)
  - Local Government Website
  - Mobile Phones
  - Google, Craigslist
  - Paper Flyers
  - System of Record (i.e. Salesforce)
  - HMIS
  - Paper Forms
  - Library Computers
  - System of Record (i.e. Salesforce)
  - HMIS
  - Paper Applications
  - Binders of Paper Copies

Opportunity Areas

- **01. / Create a connected experience**
- **02. / Improve findability of available housing and human services**
- **03. / Capture and leverage data to predict success**

Key:
- Emotional Burden
- Opaque, Disconnected Information
- Excessive, Manual Paperwork

- **Unstabilizing Activities**
  - Calling 211 for local services, searching online, asking friends and family for help
  - Receiving phone calls, walk-ins, and inquiries about availability and eligibility
  - Working with clients in crisis
  - Finding available housing/services
  - Unclear eligibility requirements

- **Unstabilizing Challenges**
  - Embarrassing to ask for help
  - Overwhelmed and often in crisis
  - Disparate sources of information
  - Unclear eligibility requirements

- **Stabilizing Activities**
  - Completing additional paperwork, adjusting to new requirements of program or housing
  - Completing additional paperwork, contacting PEH to notify acceptance
  - Completing additional paperwork, adjusting to new requirements of program or housing
  - Completing additional paperwork, contacting PEH to notify acceptance

- **Stabilizing Challenges**
  - Retelling of traumatic stories
  - Waiting while in crisis
  - Locating personal documents
  - Time consuming paperwork

- **Stabilizing Key**
  - Emotional Burden
  - Opaque, Disconnected Information
  - Excessive, Manual Paperwork
Automate workflows to free up time for high impact human interactions
With disparate systems and providers, case managers undertake a bevy of manual processes to track down and capture information. This includes duplicate data entry, repeated phone calls to track down help, filing paper documents, and more. These manual processes take a considerable amount of time, which is precious time away from counseling their clients. Homeless Management Information Systems (HMIS) are a step in the right direction, but many are used in conjunction with other systems of record at the organization level, which only amplify duplicate and triplicate data entry.

Integrate data across counties to provide a more complete picture
People experiencing homelessness are transient within the San Francisco Bay Area region. Today, each county and city captures information in their own HMIS. However, people experiencing homelessness move across counties and cities to find more affordable options, making it difficult to track overall outcomes as well as individual well-being.

Leverage integrated systems to limit retelling of a traumatic stories
Not only is data capture repetitive and time consuming because systems are not integrated, it requires people experiencing homelessness to retell their often traumatic story over and over again. This enhances chronic stress and disillusionment with the system.

Paperwork and crisis takes up all my time. Either I'm entering information in a database, collecting the information from families, or dealing with a crisis. That doesn't leave time to support long-term needs.”
- Case Manager

Maybe one system is unrealistic. But, can we build systems with others in mind so they talk to each other?”
- Impact Labs Community Fellow

Being able to open up was hard – I've never had to do that before. I didn't know where to start and how to make sense of my story to an outsider.”
- Person who formerly experienced homelessness
02. Improve Findability of Available Housing and Human Services

**Integrate and promote service directories**

Searching for services is manual, unreliable, and often paper-based, leading to stress in a time of crisis for both service providers and people experiencing homelessness. This is due to a lack of a trusted source for services and housing options, ever-changing eligibility requirements, and the expansiveness of the region. Many organizations are chipping away at this challenge by developing rich directories of services for people who are experiencing homelessness. Continued collaboration and data sharing between these directories could amplify impact by streamlining the capture of ever-changing service information and eligibility criteria.

I wish there was a centralized place for all information on programs. Right now, there’s one big binder of resources. It’s easy to lose and I can’t find information online. The nonprofit websites look like an ad [for donors] – they’re not for me to understand available services.

– Person who formerly experienced homelessness

**Provide transparency into selection processes**

Case managers expressed not understanding why their clients did not receive housing or services. In many instances, they spoke of scenarios where their clients were “stuck” – on the verge of being homeless or recently became homeless – and not able to get the support they needed that could keep them from experiencing homelessness all together.

That information and referral process part can be really stressful. San Francisco is a resource dense community… it’s really, really hard to know about everything.

– Impact Labs Community Fellow

**Systematically capture institutional knowledge**

Service providers rely on institutional knowledge to fill gaps, yet there is high turnover and burnout amongst staff like case managers. Nonprofit organizations state that direct services staff are the hardest to retain. There is a constant cycle of getting up to speed and losing important knowledge with each departure.

Providing insight into prioritization processes and eligibility criteria helps set expectations for people who are experiencing homelessness, reducing false hope and let-down if services fall through.

Create a feedback loop, rather than one-way reporting
While a lot of data is captured and reported, the feedback loop back to service providers and case managers is minimal. Service providers want to understand how the data that their staff spends hours reporting is supporting the overall sector. They also want to understand their data in aggregate and compared with others, so they can improve services overall.

Understand the potential for long-term success from the start
Service providers and housing specialists struggle to track clients’ risk factors and predictors of success in the search for housing and related services. They need cross-system tools that can help track clients’ journeys in ways that forecast housing and stability success for future users. People need housing that meets their specific needs. Data can help predict what type of housing will lead to successful outcomes and stability.

“Everyone has different motivations, life experiences...It’s important someone knows the story of each person and can tailor services to meet their needs.”
- Person who formerly experienced homelessness
Best Practices For Designing Digital Solutions

Technology is poised to tackle the disconnected systems and lack of transparency in the affordable housing and homelessness sector; however, at the end of the day, these issues tie back to real people at the center of the ecosystem. Based on insights from interviews with case managers, service providers, and people who have experienced homelessness, Impact Labs identified five design principles to guide a solution with these stakeholders’ best interests in mind.

1. **All of us are better than any of us**
   
   There are countless organizations whose missions are to tackle the various challenges surrounding homelessness. Solutions need to incorporate the collective mindshare of these diverse groups toward a common goal. No concept will succeed without buy-in and facilitation from this ecosystem.

2. **Honor human interactions**
   
   Supporting people experiencing homelessness takes a great amount of empathy, and any effective solution should preserve the human-to-human relationships that are the foundation of success. Solutions should prioritize reducing the number of times anyone has to relive and retell their trauma.

3. **Do it with me, not for me**
   
   Helping people apply for and select services makes the process both transparent while giving them autonomy. Balance empowering people to make their own decisions with support that accelerates and optimizes toward positive outcomes.

4. **Streamline and simplify**
   
   Case managers and people experiencing homelessness are inundated with the number of steps, places, and portals they have to go through to access information or services. Provide the necessary information in systems where they are already working. Streamline processes and simplify steps to encourage behavior change.

5. **Optimize roles for high impact work**
   
   Case managers and other types of service providers also feel disempowered by the amount of paperwork and repetitive data entry that consumes their time. Create a solution that frees up a provider’s time so that they can focus on the high-impact work of counseling.
Action Beyond Technology

Outlined in this report are three core opportunities for technology intervention and five principles for designing these interventions to support housing and homelessness. Continued collaboration and cooperation across fragmented providers is needed to create a truly cohesive end-to-end and frictionless experience for people experiencing homelessness and those serving them. It is important to recognize that technology is not a silver bullet. There is a lot of work still to be done to address the lack of affordable housing and shelter availability to meet the needs of those experiencing homelessness.

While there are many challenges ahead, the opportunities here are addressable through providing more housing options, collaboration, and coordination. By leveraging the collective expertise of people with lived experiences, nonprofit organizations, government agencies, and technology providers the barriers preventing the unsheltered from finding a home can be untangled and chipped away.
As the social impact center of Salesforce (headquartered in San Francisco), Salesforce.org believes the purpose of business should be to improve the state of the world by providing access to powerful technology, supporting strategic community partnerships, and making impactful investments that empower changemakers to build a better world.

The social issues facing our world today are complex and require multiple stakeholders to collaborate to make lasting change. Salesforce.org Impact Labs brings community members together to navigate this complexity and collaborate with peers to drive social change. The goal of Impact Labs is to couple the expertise of community members with the technology and talent of Salesforce. By combining the two, the program de-risks innovation and provides technology investment where otherwise there may not be resources to take a risk.

In the Fall of 2019, Impact Labs launched with an open call for challenges to its community of nonprofits, educational institutions, partners, and employees to solicit input on where value could be had in a collaboration with Salesforce.org.

The cause area that rose to the top for the inaugural Impact Lab was addressing housing and homelessness in the San Francisco Bay Area. This topic area maps back to Sustainable Development Goal 11.1: Sustainable Cities and Communities, and aims to create a technology solution that promotes a more inclusive, safe, resilient, and sustainable San Francisco Bay Area for all. Hopefully, in addition to supporting the Bay Area, the ideal solution could potentially scale to other regions.
This report examines the housing and homelessness journey from the perspective of case managers, Impact Labs Community Fellows, and people who have experienced homelessness.

**Impact Labs Community Fellows**
In-depth interviews and a series of co-creative working sessions with 19 individuals representing service providers, government agencies, consultants, educational institutions and funders to understand challenges in affordable housing and homelessness in the San Francisco Bay Area.

**Case Managers and Intake Specialists**
In-depth interviews with case managers and intake specialists to understand the pain points in client intake, case management, service referral, and housing procurement.

**People Who Have Experienced Homelessness**
In-depth interviews and solution shaping sessions to understand experiences in navigating the system and receiving care from service providers.

**Secondary Research**
Examination of the scope of the problem and existing technology solutions by looking at previous reports and articles on the state of homelessness across the United States, the Bay Area context, and policy.