“Dismantling Digital Deserts to Increase Equitable Outcomes”
Office of the Mayor
City of Houston, TX

Project context:
While access to high-speed Wi-Fi is something most people take for granted, in the City of Houston over 142,500 households do not have a computer and twice that amount, over 267,000 households, lack broadband internet access. These digital deserts – so to speak – are often located in historically underinvested neighborhoods where communities of color live. This digital divide presents significant hurdles for these underserved communities, preventing them from harnessing the power of the internet to further their education, develop career skills, apply for jobs, and access healthcare options. From a widening academic achievement gap for opportunity youth, especially for young Black and Latino men, to the lack of access to telehealth options for elderly and vulnerable patients, the COVID-19 pandemic has only exacerbated the effects of this digital divide. The City of Houston is faced with three simultaneous crises: a public health crisis, an economic crisis, and a digital inclusion crisis.

Nevertheless, the City of Houston made significant strides to close the gaps faced by its most vulnerable residents. The Mayor’s COVID-19 Health Equity Response (HER) Task Force has prioritized technology access and digital inclusion and has been working with partners to expand programs that support this work during the COVID-19 crisis. The Houston Independent School District has adopted a new budget to spend $31 million on digital devices, with plans to have distributed 125,000 devices and hotspots to students by January. The Houston Public Library has also bolstered its existing services, increasing hotspot and laptop check out options, and the City has designated City facilities, including libraries and other public facilities, as ‘super-hotspot’ areas for public use. Additionally, telecom companies have pledged their support for closing the digital divide, with Comcast launching computer labs in the City and providing students and seniors with laptops.

The City built upon these COVID-19 response efforts and existing programs by partnering with FUSE Corps to host an Executive Fellow for one year (2021-2022). The Executive Fellow provided support in determining where digital deserts exist; collating, evaluating, and prioritizing the expansion of existing digital divide programs; and developing a sustainable plan to institutionalize digital inclusion in the City. The Executive Fellow continues to play an essential role in delivering internet into the hands
of every Houstonian and increasing equitable outcomes for those low-income neighborhoods and communities of color most impacted by this crisis.

Year One Project Summary & Potential Deliverables:
The following provides a general overview of Year One of the Executive Fellowship project. This summary and the potential deliverables will be collaboratively revisited by the host agency, the Executive Fellow, and FUSE staff during the first few months of the Executive Fellowship, after which a revised scope of work will be developed and agreed upon by the FUSE Executive Fellow and the host agency.

Starting February 1, 2021, the FUSE Executive Fellow engaged with key stakeholders, including staff at the Mayor’s Office, other City departments, public school district leadership (superintendents’ network), private and social sector leaders, and community members, to conduct a landscape analysis. The Executive Fellow developed an inventory of existing digital inclusion programs and policy that is being implemented – with particular focus paid to projects that were developed in light of the pandemic. Simultaneously, the Executive Fellow completed an analysis of current gaps, including determining where digital deserts are most prevalent in the City, and identify several key areas for concrete action along with potential implementation partners. The Executive Fellow will collate best practices of other smart cities around the nation that have achieved results in closing gaps on the digital divide.

The Executive Fellow worked with community members involved in the Complete Communities Initiative, strategic technology partners, as well as internal stakeholders, to develop a digital inclusion strategic plan with an emphasis on dismantling digital deserts. The Executive Fellow cultivated relationships with leaders in the telecom community to explore new partnerships and wireless technology expansion throughout the City. This also included an analysis of the technology and broadband supply chain. With an emphasis on innovation and inclusion, the Executive Fellow explored creative public-private technology and funding partnership models to deliver a sustainable digital inclusion program.

Year One Deliverables and Results:
Deliverable 1:
• Collect home internet access data and create an interactive map that highlights needs for connectivity, opportunities for connectivity, and assets/infrastructure available for connectivity.
  o Results:
    o Collaborated with the Planning & Development Department’s GIS team to create an interactive map designed specifically for Complete Communities.
- Gained access to 2 additional interactive maps available via Connected Nation and the National Telecommunications and Information Administration (NTIA).

- Partnered with the Texas Metro City/County Broadband Collaborative to improve data tracking and digital inclusion mapping on a statewide level.

**Deliverable 2:**
- Explore free and/or low-cost, community-wide internet options to connect residents in Complete Communities.
  - **Results:**
    - Established a partnership with Information Technology Disaster Recovery Center (ITDRC) to provide free community Wi-Fi installations to 23 apartment complexes and 12 parks for a value-add of $145,000 at no cost to the City.
    - Authored a digital inclusion grant proposal for the City; through the rewarded grant via Kajeet Wireless Solutions, the City distributed 20 Smartspots to 20 underserved families by partnering with the non-profit Bridging the Digital Divide Houston.
    - Facilitated the completion of the City's Digital Equity RFI, designed to build public/private partnerships that will provide free/low-cost internet to 3 target areas before expanding citywide.
    - Oversaw the completion of the City's Digital Equity Services RFP designed to enhance digital equity for over 14,000 underserved Houstonians.
    - Coordinated the completion of the City’s 22 Comcast Lift Zone installs for community centers located in Complete Communities.

**Deliverable 3:**
- Build/Join a Digital Inclusion Coalition to establish strategic partnerships that will increase the sustainability of digital inclusion efforts.
  - **Results:**
    - Led the City’s Digital Equity Workgroup established that consists of Dept. of Innovation, Houston Information Technology Services (HITS) Dept., Houston Parks and Recreation Dept., and Burns Engineering.
    - Collaborated on a statewide level in the Texas Metro City/County Broadband Collaborative.
    - Collaborating with multiple internal and external partners in the Harris County Digital Task Force.
    - Represented Houston at the FCC Connecting the Disconnected Forum; planning to create a national digital inclusion coalition consisting of participants of the forum.
• Partnered with over 50 external entities to advocate for affordable broadband access.

• Engaged with 70 internal stakeholders and 50 local leaders in digital inclusion initiatives.

• 13 collaborations between Cities/Counties on digital inclusion initiatives.

• 50 local leaders and public figures engaged in digital inclusion initiatives.

**Deliverable 4:**

- Identify funding to support connectivity efforts and establish a Digital Inclusion Fund.
  - **Results:**
  - Educated the City on grants available via NTIA (Broadband Infrastructure Grant, Connecting Minority Communities Grant).
  - Authored a digital inclusion grant proposal for Kajeet’s Digital Inclusion Grant.
  - Overseeing the completion of the RFI/RFP and Internet Master Plan; completion will position the city to apply and take advantage of federal funding.

**Year Two Project Summary & Potential Deliverables:**

During Year Two of the project, the Executive Fellow will build on Year One deliverables to enhance the City’s comprehensive digital inclusion strategy. This plan will identify and coalesce all programs and efforts into a unified set of activities that provides clear guidance to the city, community partners, and private telecom and technology partners. Building on the momentum of projects executed during Year One, the Executive Fellow will work to prioritize recommended programs, and identify initiatives that are most urgent and/or can be acted upon most quickly to support providing internet and technology, such as broadband and computer, to the historically underinvested neighborhoods where communities of color currently live in digital deserts.

**Deliverable 1:**

- Coordinate completion of the COH Digital Equity RFI; consult Digital Equity Workgroup during the transition from RFI to an RFP.
  - Oversee proposals and contracts for public/private partnerships between the City and ISPs as a result of the RFP.

**Deliverable 2:**

- Oversee completion and implementation of the Digital Equity Internet Master Plan. Collaborate with Digital Equity Workgroup to create sustainability plans for all programs created as a result of the Digital Equity Internet Master Plan.
Deliverable 3:
• Facilitate spending of federal funds awarded to the City for broadband and infrastructure deployment, computer devices, and digital inclusion programming.

Deliverable 4:
• Create a plan to establish the City’s first-ever Office of Digital Inclusion and present to key stakeholders.

Deliverable 5:
• Build/Join a Nationwide Digital Inclusion Coalition to continue increasing awareness and advocacy of digital inclusion.

Key Stakeholders
• Jesse Bounds, Director of Innovation, Mayor’s Office
• Shannon Buggs, Director of Complete Communities, Mayor’s Office
• Olivera Jankosvka, Director of Education, Mayor’s Office
• Lisa Kent, Chief Information Officer, Houston Information Technology Services

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