

# Houston-Galveston Area Council Presentation

January 29, 2021





"Our mission is to improve lives by providing innovative solutions that expand the access, adoption, and use of high-speed internet and its related technologies to all people. Everyone belongs in a Connected Nation."

Core competencies include:

- Network mapping, validation, and analysis
- Residential and business technology research
- Local, state, and national policy analysis and capacity building
- Community technology planning



## **Mission-**

To change lives through technology.

CN Texas is leading the effort to increase high-speed internet access, adoption to diversify the economy, improve healthcare access, expand online education and training, create telework jobs, and more.

## **Activities-**




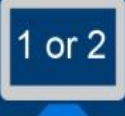
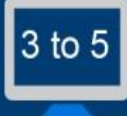
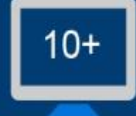
Broadband mapping and analysis

Statewide outreach and education on broadband

Community Technology Planning

# BROADBAND DEFINED

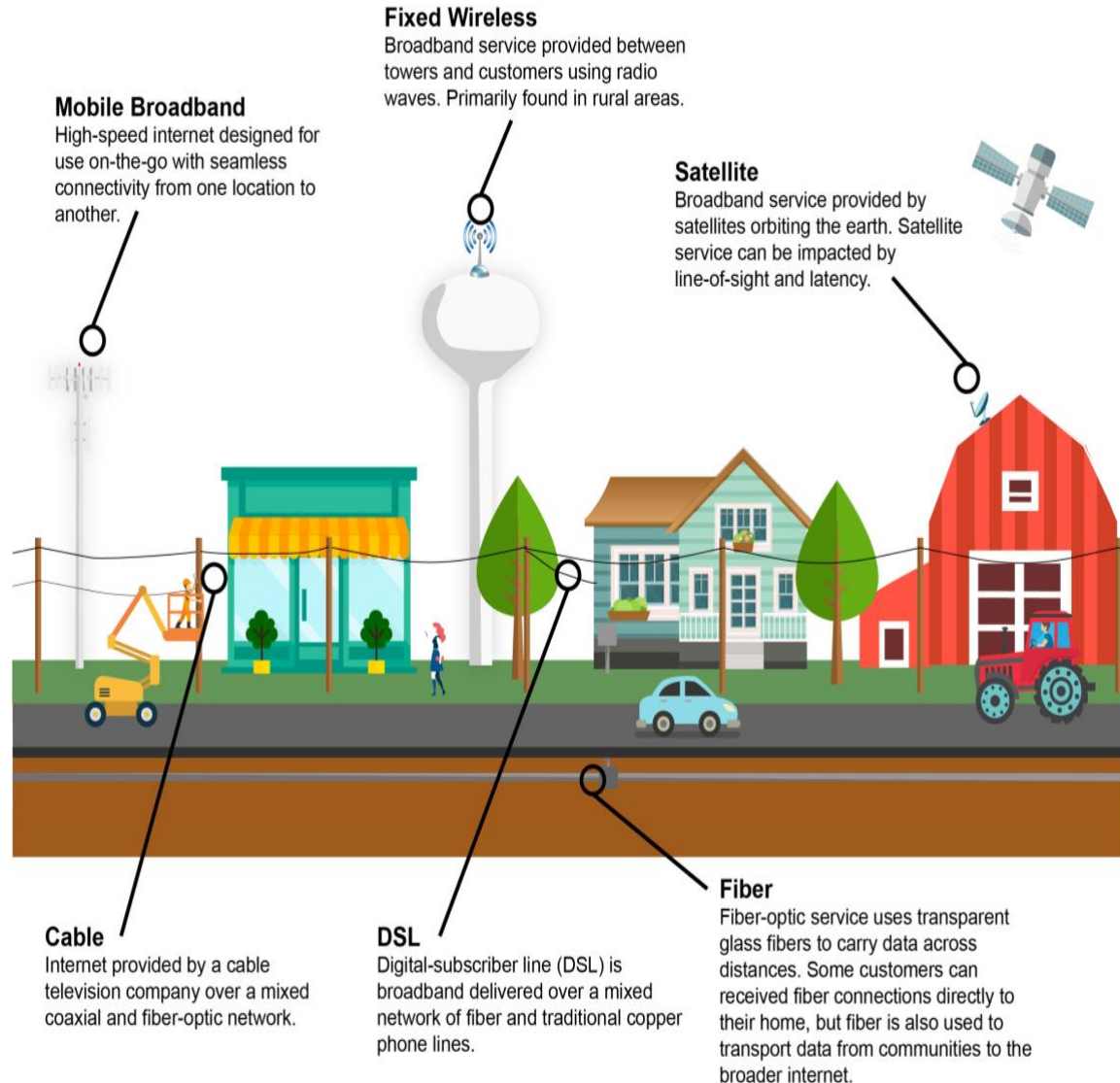


	10 Mbps	25 Mbps	1 Gbps
Estimated time to download 2 GB file:	 29 minutes	 11 minutes	 17 seconds
Devices Supported:	 1 or 2	 3 to 5	 10+
Activities Supported:	Web surfing, e-mail, & moderate HD streaming	Heavy HD streaming, video conferencing, large file transfer	Extreme HD, real-time streaming, frequent & huge file transfers
Primarily used by:	Homes & Some Businesses	Homes & Businesses	Businesses & Some Homes

# BROADBAND DEFINED



- **Fixed, terrestrial broadband:** Service designed for permanent, stationary use at a home, business, or institution
- **Mobile broadband:** Wireless internet service designed for continuous use on a portable device
- **More commonly referred to as high-speed internet access,** technically, any kind of connection other than dial-up. Connection is always on.



# CONNECTED NATION-TEXAS



## Access

The physical connection to high-speed infrastructure

## Adoption

Recognizing the value of broadband and subscribing either at home, work, or via public institutions

## Use

Skills and applications to leverage technology to improve quality of life and community/economic development

**Supply**

**Demand**

# Operation Connectivity



A statewide initiative launched by Governor Greg Abbott, the Texas Education Agency (TEA), and Dallas Independent School District in May 2020 to deliver internet connectivity and device solutions for school districts, families, and students in Texas.

**Operation Connectivity** was originally started in Dallas to address the lack of high-speed internet and/or home laptops for many DISD students which caused an interruption to their learning, as education in the classroom transitioned to at-home digital instruction due to COVID-19. This initiative ultimately aims to provide internet connectivity to hundreds of thousands of students statewide.

On July 17, it was announced that the State of Texas will allocate \$200 million in Coronavirus Aid, Relief, and Economic Security (CARES) Act funding to TEA for the purchase of eLearning devices and home internet solutions to enable remote learning during the COVID-19 pandemic for Texas students that lack connectivity.

**Operation Connectivity** has a longer-term goal to connect all students with high-speed internet and devices by the 2021-2022 school year.



# Broadband Coverage: Understanding the Maps



- CN Texas creates broadband availability maps through a proven, robust process
- CN Texas works directly with broadband providers to gather the most detailed information possible on the areas which can be served and at what
- CN Texas employs a confidence methodology to identify areas that are likely to be overstated and attempt to work with providers in those areas to refine their coverage areas.
- CN Texas also conducts on-the-ground field validation of broadband coverage and wireless availability when possible using drive testing and field validation to create a more accurate map.
- Ultimately, maps and tabular data are developed from a combination of direct provider outreach and data collection, supplemented by FCC Form 477 filings when necessary, and independent research conducted by CN Texas. As such, broadband availability at an exact address location cannot be guaranteed, and household availability statistics are estimates made using the most up-to-date and accurate information available.
- Current maps indicate broadband availability as of December 2020

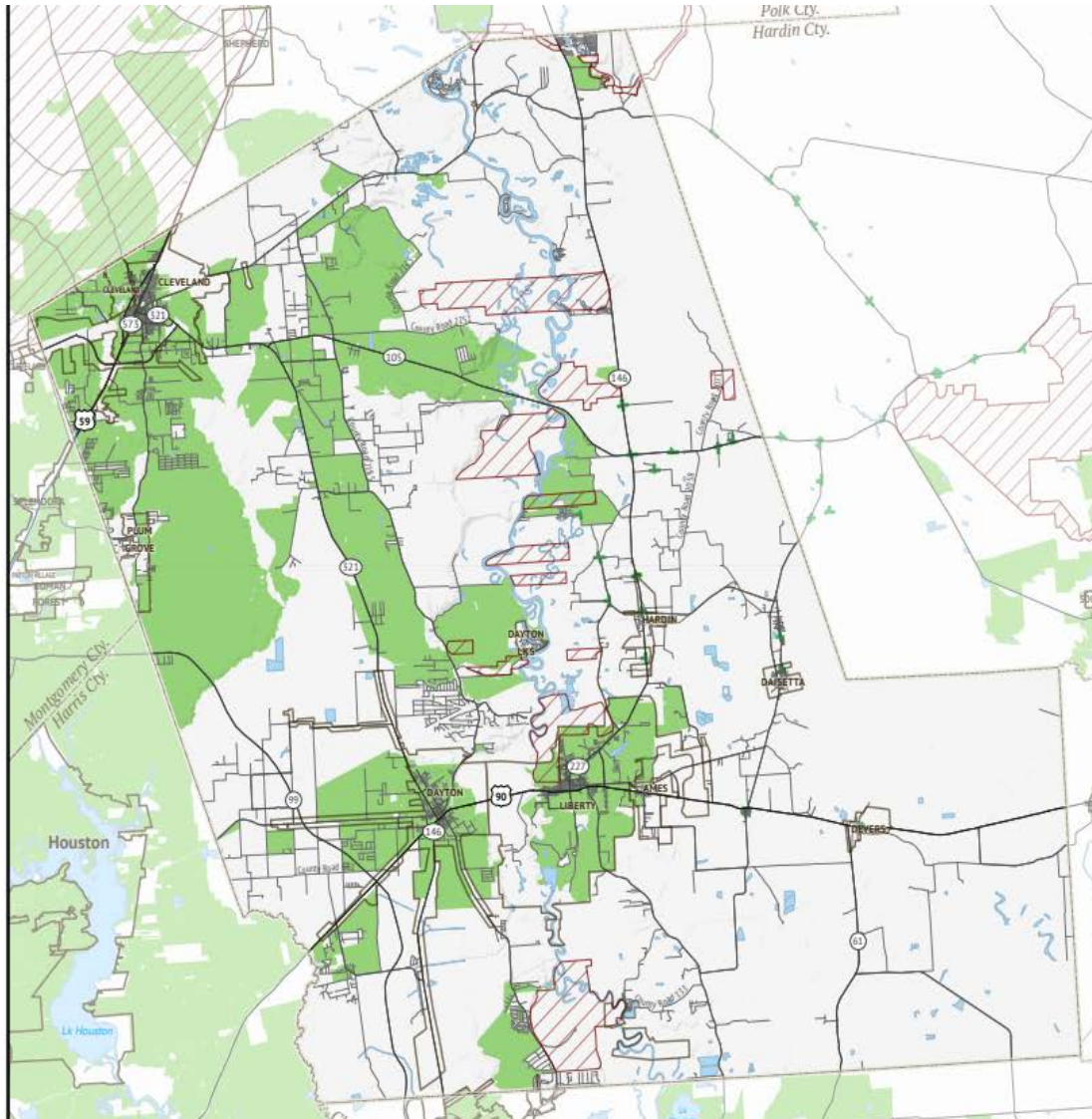
<https://connectednation.org/texas/feedback>



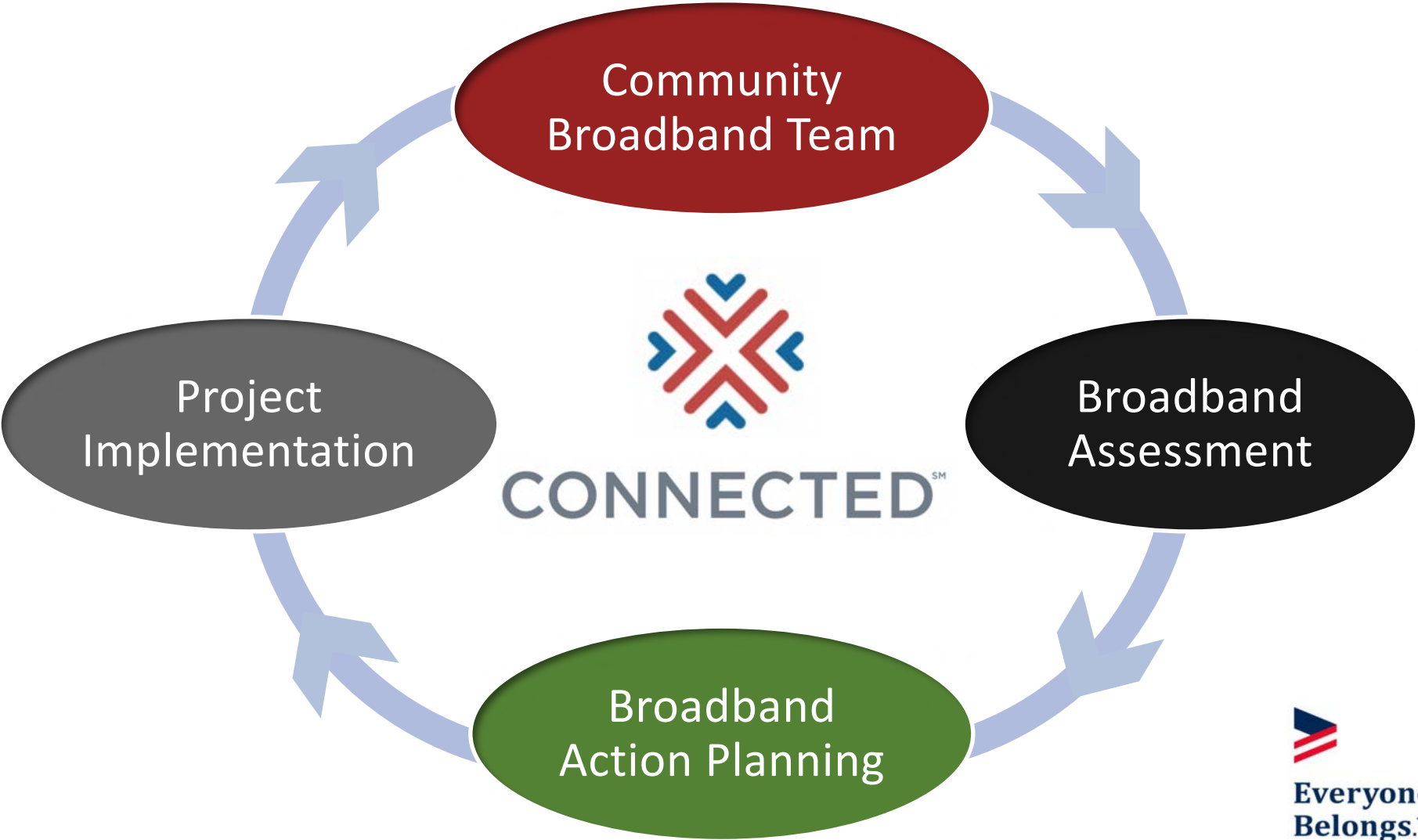
# Liberty County Broadband Coverage

## 100 Mbps / 10 Mbps

### 10,987 Households Unserved @100/10



# What is “CONNECTED” ?



# Project Deliverables

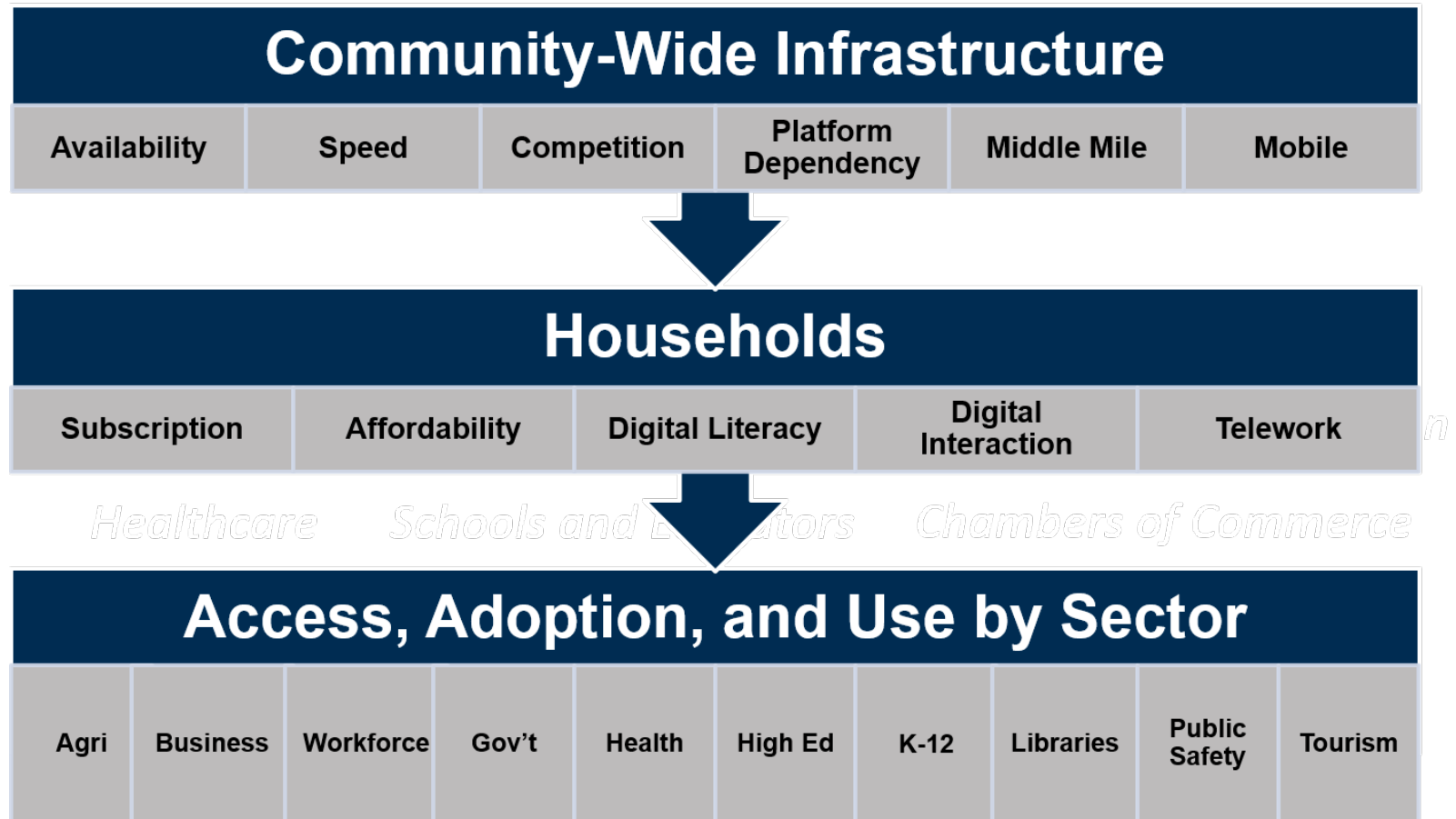


- ❑ County Technology Action Plan
  - Assessment results and findings
    - Community-wide Infrastructure
    - Households
    - Sectors Assessment
  - Interactive map of survey results integrated with broadband coverage across the county
  - Connect Texas's recommended actions
  - Tailored County action plan
- ❑ Policy and Research Support
- ❑ Inclusion in CN's "Community of Communities"

# The “CONNECTED” Community Broadband Assessment



Survey results will provide important data on broadband in Liberty County



# Survey Home Page



## Walker County

Data gathering is the first step for improving your internet connection. Choose a survey below that best represents your role in your community. You may take more than one survey if you have more than one role in the community, (e.g. you own a home in the community and own a small business, or you own a home in the community and work at the library, etc.).



Household



Business



Agriculture



Health



Higher Education



K-12



Libraries &  
Organizations



Public Safety



Government

# Liberty County Survey Project



Survey results will be reported on a weekly basis and sent to key members of the team to be then distributed to the rest of the team, below is the **final** survey report

Liberty County Survey Sector	Suggested <b>Min.</b> Total Response Target	Total Responses as of 1-Jun	Total Responses as of 8-Jun	Sum of weekly Change	Percent of Target Achieved
Residential	920	882	882	0	96%
Business	75	34	34	0	45%
Public Safety	17	7	7	0	41%
Library & Community Org	5	6	6	0	<b>100%</b>
Agriculture	30	6	6	0	20%
Higher Education	1	0	0	0	0%
K-12 Education	25	8	8	0	32%
Healthcare	9	1	1	0	11%
Government	5	2	2	0	40%
<b>Totals</b>	<b>1087</b>	<b>946</b>	<b>946</b>	<b>0</b>	<b>87%</b>

# Walker County Survey Project



Survey results will be reported on a weekly basis and sent to key members of the team to be then distributed to the rest of the team, below is the **final** survey report

Walker County Survey Sector	Suggested <b>Min.</b> Total Response Target	Total Responses as of 18-May	Total Responses as of 26-May	Sum of weekly Change	Percent of Target Achieved
Residential	650	986	987	1	152%
Business	35	34	34	0	97%
Public Safety	5	7	7	0	100%
Library & Community Org	3	3	3	0	100%
Agriculture	25	13	14	1	52%
Higher Education	1	2	2	0	100%
K-12 Education	10	10	10	0	100%
Healthcare	8	4	4	0	50%
Government	5	11	11	0	100%
<b>Totals</b>	742	1070	1072	2	144%



# Liberty County Community Portal

<https://www.myconnectedcommunity.org/liberty-county/>



Household



Business



Agriculture



Health



Higher Education



K-12



Libraries & Organizations



Public Safety



Government



Infrastructure



Plan Summary



Solutions

# Liberty County Adoption Rate

<https://www.myconnectedcommunity.org/liberty-county/>



Home

Communities

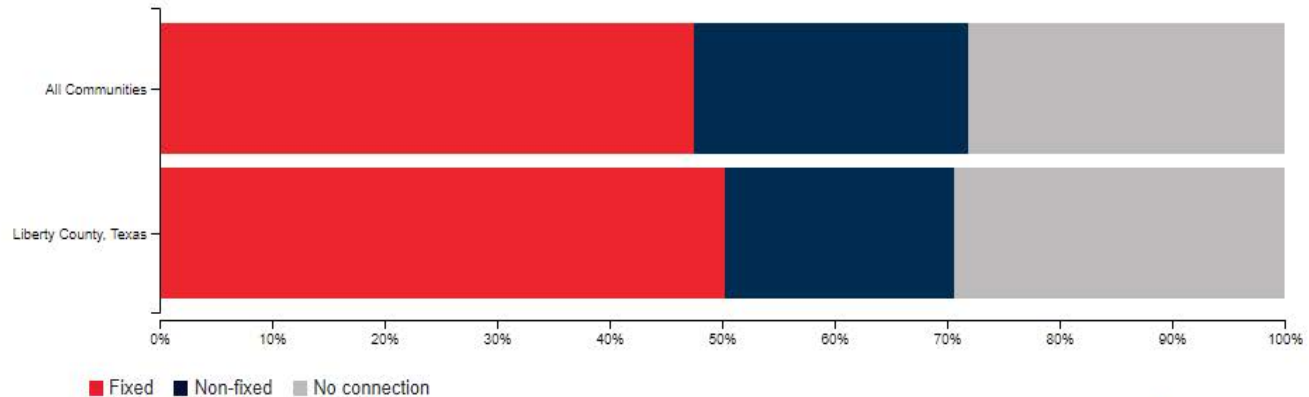
gathered through surveys distributed in the community.

Date Range ▾

## Broadband Adoption

This chart shows the percent of households that subscribe to various types of broadband services or that are without a connection. Fixed connections are those provided by cable, DSL, fiber, or fixed wireless technology while Non-Fixed connections include dial-up, satellite, and mobile-only services. These non-fixed types of internet services, while providing basic access, can often be plagued by connection latency, have costly monthly data plans, or can be impacted by weather, terrain, large expanses of open water, and other environmental factors.

- Adoption
- Average Cost
- Barriers
- Download Speed
- Mobile Use
- Devices
- Interaction
- Satisfaction



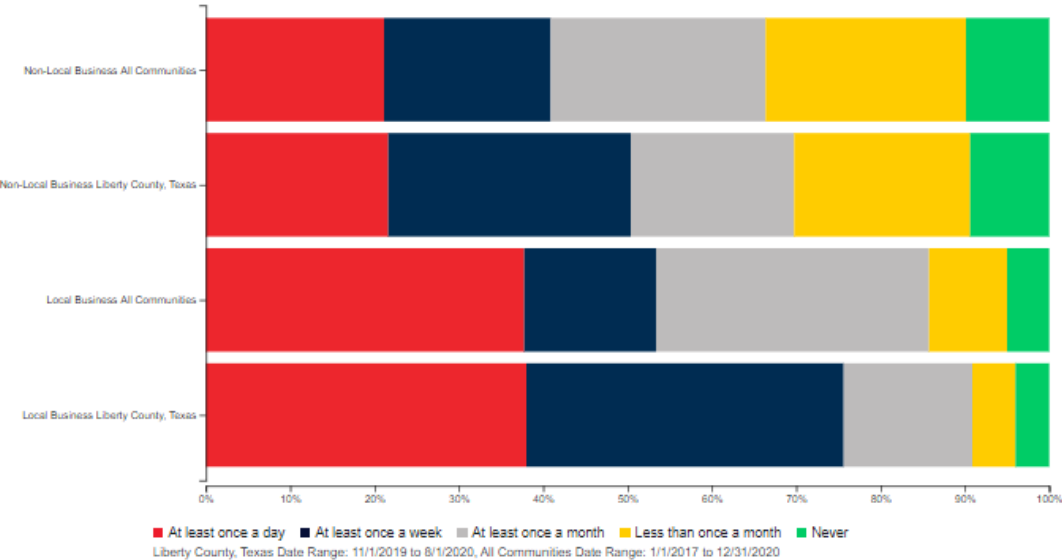
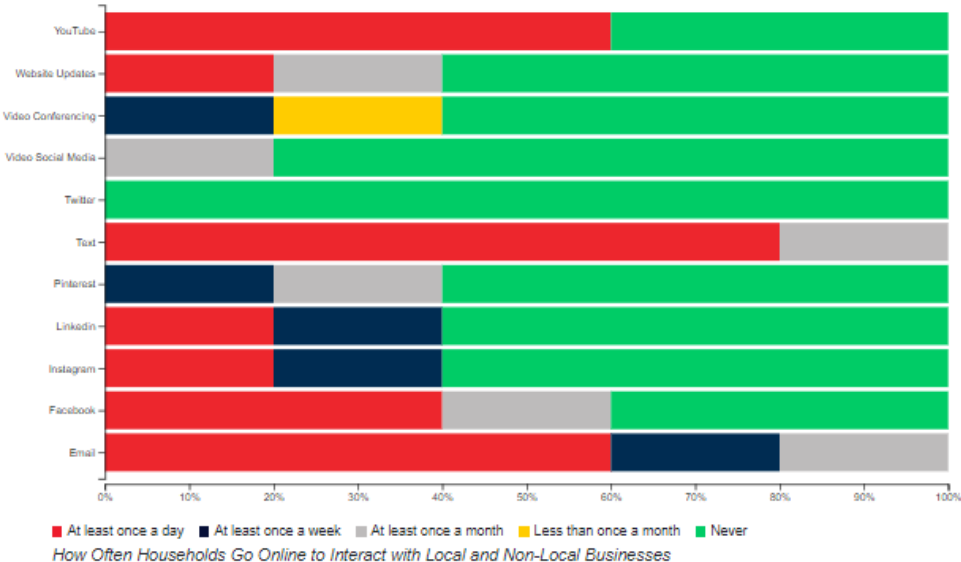
Liberty County, Texas Date Range: 11/1/2019 to 8/1/2020, All Communities Date Range: 1/1/2017 to 12/31/2020



## Average Monthly Cost of Internet Service

The cost of service can prevent some from being able to access the internet. This chart shows the average reported

# Recommend Action: Host Website and Social Media Classes for Local Businesses



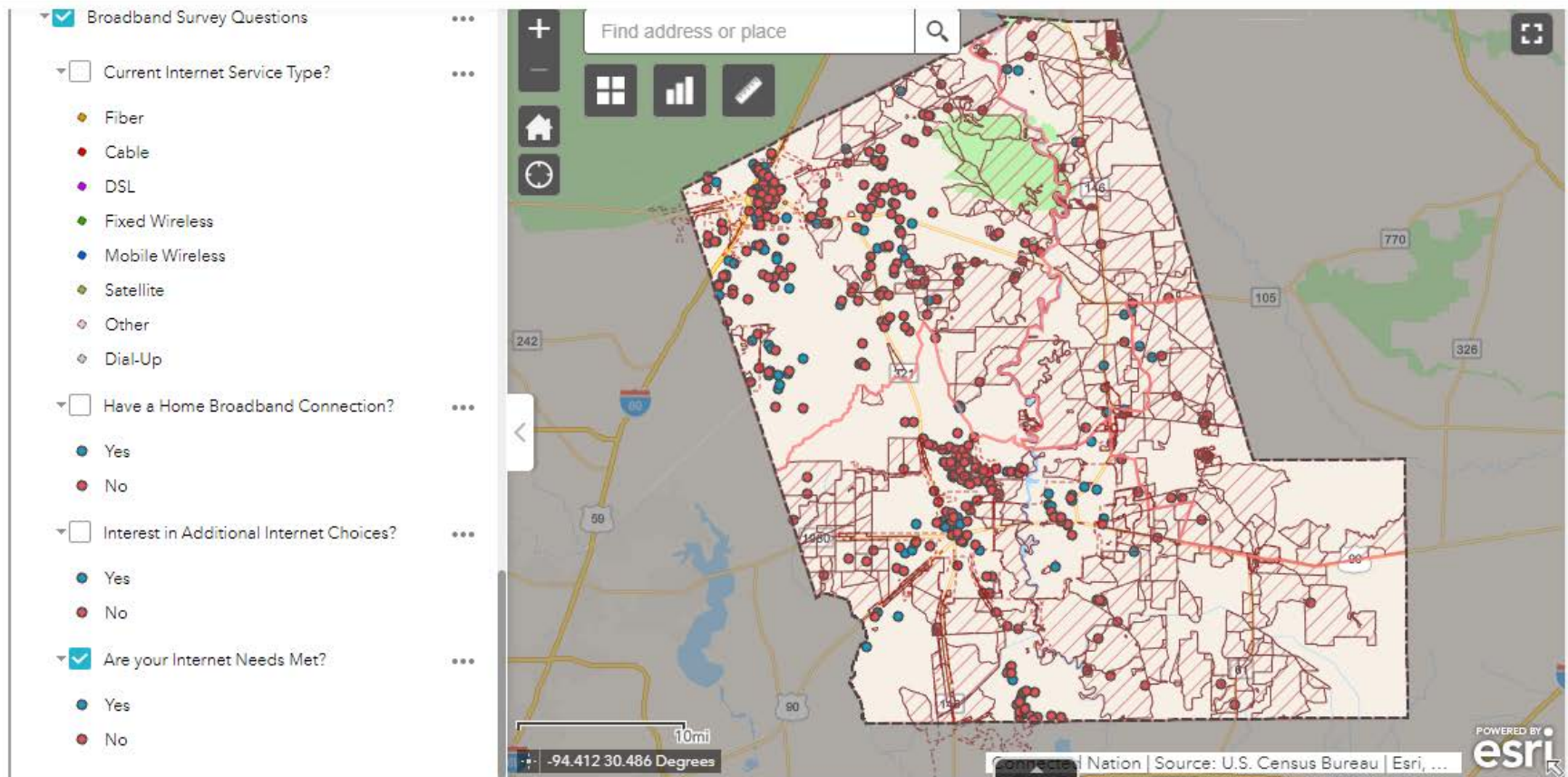
# Interactive Map/RDOF/CAF 2

Perform a Broadband Build-Out Analysis and Validate Demand for Broadband Service in Underserved Areas



Home

Communities



# Proposed Recommended Actions



- 1. Become a Digital Ready Community**
- 2. Develop a Technology Action Committee**
- 3. Perform a Broadband Build-Out Analysis and Validate Demand for Broadband Service in Underserved Areas**
- 4. Develop Public-Private Partnerships to Deploy Broadband Service**
- 5. Host Website and Social Media Classes for Local Businesses**
- 6. Create a Telework Support and Attraction Program**
- 7. Promote Telemedicine in Remote Areas**
- 8. Explore 1:1 Device Programs**
- 9. Perform an Analysis of Local Policies and Ordinances**

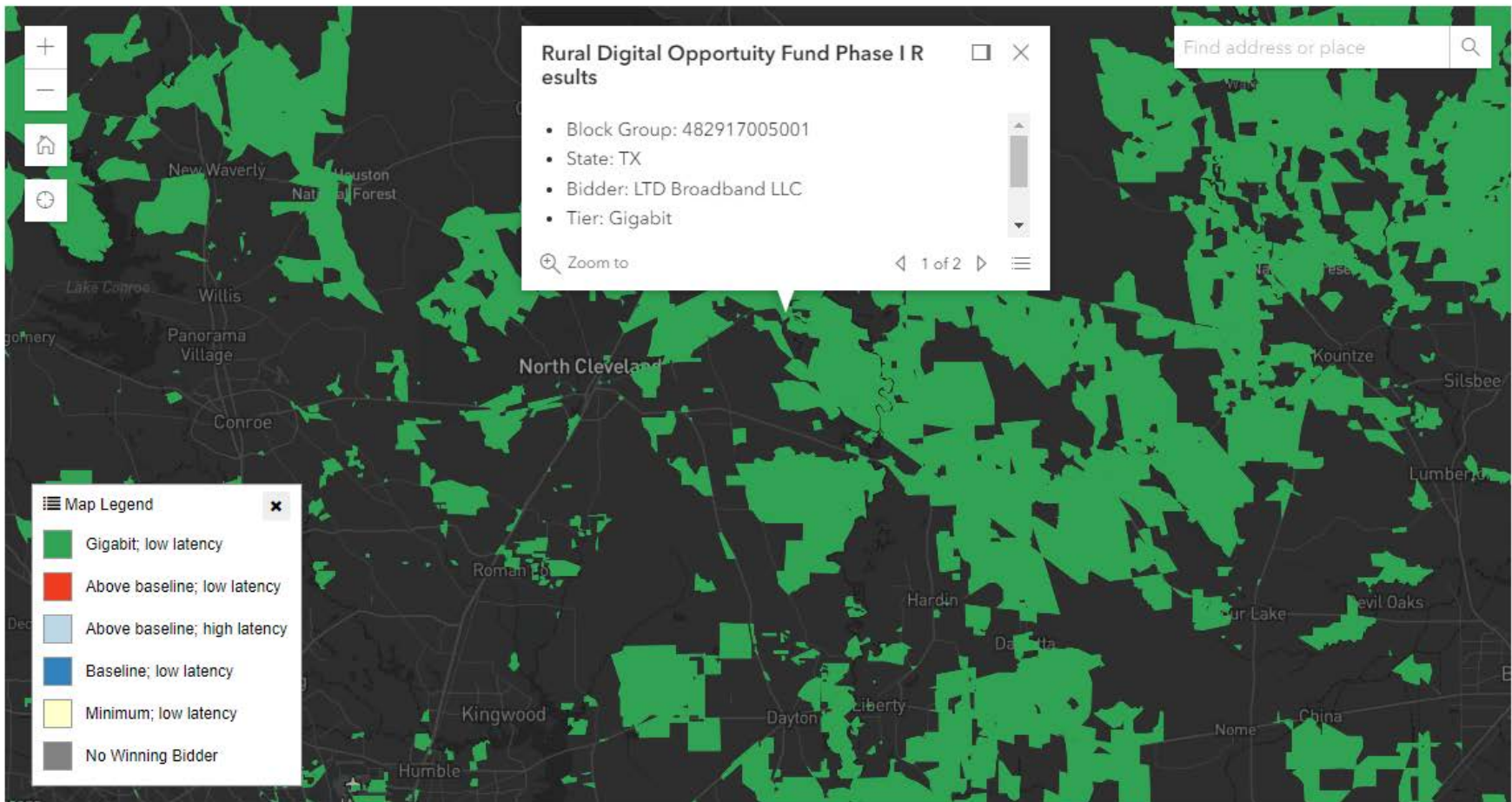


# RDOF 12-07-2020



## Rural Digital Opportunity Fund Phase I Results

Data as of 12/07/20



# Rural Digital Opportunity Fund (RDOF)/904 Auction

## [Auction 904 Final Eligible Areas \(fcc.gov\)](https://www.fcc.gov/auctions/904)



- 1. \$9.2 billion subsidy program/ \$16 billion offered for the 904 auction or Phase 1.**
- 2. Funding will be serving 5.2 million unserved homes and businesses**
- 3. 97.9% of the location will receive speeds of 100/20 Mbps**
- 4. 85% will be receiving gigabit speeds 1,000/500 Mbps**
- 5. Currently the providers are a 'Quiet Period' until the long forms are completed – January 29<sup>th</sup> (?)**
- 6. 6 year build out with a ten year payment schedule.**
- 7. 40% of the build by year 3 - 60% by year 4 – 80% by year 5 – finish the rest and addition locations in year 6.**
- 8. Phase 2 – \$11.2 billion for partially served areas is waiting for the DODC data collections which will delay the 905 Auction 18/24 months**



# Rural Digital Opportunity Fund (RDOF)/904 Auction



Austin, TX	AMG Technology Investment Group LLC	1,478	\$570,276.80
Austin, TX	LTD Broadband LLC	3	\$2,862.00
Austin, TX	Resound Networks, LLC	340	\$236,019.00
Austin, TX	Unified Communications Inc.	6	\$724.00
Austin, TX Total		1,827	\$809,881.80
Brazoria, TX	NexTier Consortium	103	\$58,485.00
Brazoria, TX	Resound Networks, LLC	4,898	\$6,103,592.90
Brazoria, TX	Wisper-CABO 904 Consortium	26	\$3,737.60
Brazoria, TX Total		5,001	\$6,162,077.90
Chambers, TX	CCO Holdings, LLC	134	\$129,869.60
Chambers, TX	LTD Broadband LLC	35	\$23,184.00
Chambers, TX	Resound Networks, LLC	288	\$808,190.20
Chambers, TX	Windstream Services LLC, Debtor-In-Possession	7	\$1,477.00
Chambers, TX Total		464	\$962,720.80
Colorado, TX	Resound Networks, LLC	1,681	\$1,218,471.80
Colorado, TX	Rural Electric Cooperative Consortium	2	\$6,120.00
Colorado, TX Total		1,683	\$1,224,591.80
Fort Bend, TX	Consolidated Communications, Inc.	10	\$5,142.00
Fort Bend, TX	LTD Broadband LLC	82	\$50,259.00
Fort Bend, TX	Resound Networks, LLC	2,564	\$2,294,236.70
Fort Bend, TX	Windstream Services LLC, Debtor-In-Possession	114	\$52,158.00
Fort Bend, TX Total		2,770	\$2,401,795.70

# Rural Digital Opportunity Fund (RDOF)/904 Auction



Galveston, TX	LTD Broadband LLC	236	\$209,869.00
Galveston, TX	Resound Networks, LLC	2,312	\$1,243,544.30
Galveston, TX Total		2,548	\$1,453,413.30
Harris, TX	Altice USA, Inc.	15	\$364.00
Harris, TX	CCO Holdings, LLC	198	\$106,148.00
Harris, TX	Consolidated Communications, Inc.	5	\$1,140.00
Harris, TX	LTD Broadband LLC	10,337	\$9,709,988.00
Harris, TX	Rural Electric Cooperative Consortium	33	\$18,014.00
Harris, TX	Windstream Services LLC, Debtor-In-Possession	903	\$1,501,126.00
Harris, TX Total		11,491	\$11,336,780.00
Liberty, TX	LTD Broadband LLC	6,389	\$12,149,662.60
Liberty, TX	Windstream Services LLC, Debtor-In-Possession	186	\$165,796.00
Liberty, TX	Wisper-CABO 904 Consortium	2	\$1,152.00
Liberty, TX Total		6,577	\$12,316,610.60
Matagorda, TX	NexTier Consortium	5	\$3,642.00
Matagorda, TX	Resound Networks, LLC	5,362	\$1,395,756.40
Matagorda, TX	Wisper-CABO 904 Consortium	37	\$5,288.30
Matagorda, TX Total		5,404	\$1,404,686.70

# Rural Digital Opportunity Fund (RDOF)/904 Auction



Montgomery, TX	CCO Holdings, LLC	35	\$10,076.00
Montgomery, TX	Consolidated Communications, Inc.	184	\$134,682.00
Montgomery, TX	Frontier Communications Corporation, DIP	554	\$493,122.00
Montgomery, TX	LTD Broadband LLC	1,621	\$1,232,235.00
Montgomery, TX	Rural Electric Cooperative Consortium	852	\$648,186.00
Montgomery, TX Total		3,246	\$2,518,301.00
Walker, TX	CCO Holdings, LLC	428	\$71,727.00
Walker, TX	LTD Broadband LLC	819	\$1,671,040.00
Walker, TX	Rural Electric Cooperative Consortium	1,790	\$1,590,102.70
Walker, TX	Windstream Services LLC, Debtor-In-Possession	5	\$13,992.00
Walker, TX Total		3,042	\$3,346,861.70
Waller, TX	AMG Technology Investment Group LLC	356	\$108,196.70
Waller, TX	LTD Broadband LLC	4	\$3,487.00
Waller, TX	Resound Networks, LLC	1,001	\$232,623.10
Waller, TX	Rural Electric Cooperative Consortium	12	\$12,354.00
Waller, TX Total		1,373	\$356,660.80
Wharton, TX	NexTier Consortium	7	\$6,150.00
Wharton, TX	Resound Networks, LLC	3,526	\$1,802,711.40
Wharton, TX	Wisper-CABO 904 Consortium	24	\$2,303.80
Wharton, TX Total		3,557	\$1,811,165.20
HG-AC, Total		48,983	\$46,105,547.30

# QUESTIONS?

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