## GREATER EAST GRAND REGION BROADBAND PROJECT AUGUST 8, 2022

# Welcome!

#### **GEGR Broadband Committee**

Dwayne Young, Chair Sarah Strickland, Project Manager

#### Members

David Apgar, Jessica Comeau, Mike Comeau, Angela Cowger, Constance Curtis, Dan Daggett, Scott Hanington, Ron Hickman, Caroll Randall, David Taylor, Van White, Heather Zakupowsky

The Committee's purpose is to work on behalf of these communities to develop and recommend specific strategies for securing affordable, universal, reliable and futureready broadband service. The Committee is empowered by participating communities to engage with internet service providers (ISPs) and other technical advisors to produce plans, budgets, and funding strategies for consideration and action by town select boards and County governments. Mission Broadband Regional Consultant

To bring equitable broadband access to every citizen by helping communities navigate the process of expanding and enhancing broadband connectivity.

John Dougherty, VP and General Manager Mark Van Loan, Network Engineer

## Maine Connectivity Authority (MCA)

Established in 2021, the Maine Connectivity Authority (MCA) is a quasi-governmental agency charged with achieving the universal access of affordable high-speed broadband in Maine.

Kendra Jo Grindle Community Capacity Manager

# Greater East Grand Region

- Citizen-designated based on heritage, demographics, businesses, and economic interests
- EGS student distribution
- East Grand Health Center patient distribution
- Danforth as service center and distance from Lincoln, Houlton, Calais
- River, lake, forest and farmland enterprises

#### GREATER EAST GRAND REGION ECONOMIC PLANNING AREA – 500,000 ACRES



## The GEGR Vision

The people who live in this region have a quality of life that ensures their economic self-sufficiency and their family's well-being across generations.

- New business and employment opportunities through investment and peer-to-peer support for existing businesses and entrepreneurs.
- Existing business are transitioned successfully to new owners.
- Four-season recreational tourism is a positive economic driver and supporter of existing businesses.
- Investment in new infrastructure to support quality of life and work.

- Youth are supported to pursue their aspirations and become actively involved in the community.
- Young adults have chosen to remain or return "home" because of the region's positive support and career opportunities.
- New families have moved to the region because of the excellent education, welcoming community and job opportunities.
- Elders are able to successfully "thrive in place."

## High-speed, affordable broadband is one of the most important infrastructure investments to attract and retain people and businesses to the region.

#### **Broadband Community Planning Model**



# GEGR Broadband Planning History

Project funding received to date: \$65,000

- 2020 Phase 1
  - Community need survey
  - Preliminary mapping
  - Speed testing
  - Vendor/ISP meetings
- 2021 Phase 2
  - Mission Broadband retained
  - Understand feasibility through RFP and Vendor proposals
  - Invite towns to participate in broadband committee

- January July 2022
  - Review ISP proposals
  - Meetings with CCI, Sertex, Axiom and DBU
  - 2<sup>nd</sup> Community Survey
  - Household Count verification
  - Infrastructure cost update from ISPs
- August September
  - Committee prepares final recommendations and meets with town select boards and residents.



# WHY HIGH-SPEED BROADBAND? AND WHY NOW?

# Broadband Service Goals for the Region

- **Universal Service** internet service available to everyone who wants it and is currently on the electrical grid. If there is a utility pole, we want fiber access on it.
- Affordable Service Affordable is a relative term. The cost of internet service is connected with upload and download speeds. Having a speed/price option that is affordable for everyone is the goal. Choosing a provider who can deliver speeds that are eligible for federal/state grants is necessary.
- Future-ready Like affordable, future-ready is a relative term. For something to be future-proof or future-ready, it must retain value into the distant future and not become obsolete. In particular, it should be able to keep up with demand for and deliver faster speeds over time. The technology that is deployed should last for 20+ years and not need to be replaced.
- Reliable The Task Force wants to ensure that children can access the internet at home to do their homework, telehealth is available to everyone who needs it, businesses can use the applications and software they need to operate without service slowing down, dropping off or otherwise being unavailable when it is needed.

## Factors being used to evaluate the region's options.



## What is a Municipal Utility District (MUD)?

Municipal or community utilities are utilities that are owned and operated by the local government or another body to provide a service to the public. It is common to see these in different parts of the country providing many services; among them electricity, water, gas, internet, telephone services, and garbage removal, and now broadband.

Examples in this region are:

- Eastern Maine Electric Cooperative
- Emergency Response District (Danforth, Weston)
- Downeast Broadband Utility (Calais, Baileyville, Princeton, etc)

# **Questions to Consider about Ownership**

## Would you prefer:

- More competition and choice of Internet Service Provider (ISP) or, having an existing ISP expand services to more people?
- More local control over internet services (customer service, maintenance, operations) <u>or</u>, having an existing ISP maintain control and responsibility of the internet service?
- To invest federal/state funds in a locally-owned asset <u>or</u>, invest these funds in expanding a private, internet service network.

# Proposals are for a Regional Network can be grouped into 3 Categories

- Expand Existing Private ISP Network work with existing (incumbent) ISPs to expand service to unserved and underserved areas.
  - Spectrum, CCI, Pioneer, Wireless Partners
- 2. Establish a new Municipal Utility District (MUD) fiber to the home (FTTH) network built by a private ISP.
  - Sertex, Axiom
- **3. Join Downeast Broadband Utility (BDU)** Explore joining the Calais/Baileyville fiber to the home (FTTH) network.

# Provider by Goal

| ISP                                 | Universal<br>Access                   | Future-Ready<br>for 20+ year  | Reliability<br>(highest speed) | MUD* Ownership<br>Option?          |
|-------------------------------------|---------------------------------------|-------------------------------|--------------------------------|------------------------------------|
| Wireless Partners                   | Yes                                   | No<br>Wireless cell dependent | 100/20                         | No                                 |
| Spectrum                            | No<br>Missing Drew,<br>Reed, Glenwood | No<br>Partial cable dependent | 1G/500                         | No<br>10 yr franchise by each town |
| CCI                                 | Yes                                   | Yes                           | 1G/1G                          | No                                 |
| Sertex                              | Yes                                   | Yes                           | 1G/1G                          | Yes                                |
| Axiom                               | Yes                                   | Yes                           | 1G/1G<br>as demand grows       | Yes                                |
| Downeast Broadband<br>Utility (DBU) | Yes                                   | Yes                           | 1G/1G                          | It is a MUD                        |
| Pioneer**                           | Yes                                   | Yes                           | 1G/1G                          | Unclear                            |

\* MUD – Municipal-Owned Utility District.

\*\* Pioneer and DBU information needs to be verified

| ISPs that responded to RFP          | Pros  | Cons  |
|-------------------------------------|---|---|
| Spectrum                            | <ul> <li>Very large experienced company.</li> <li>Lowest cost option to expand service.</li> <li>Complete turnkey solution (non-bulk)</li> </ul>  | <ul> <li>Does not provide 100% coverage.</li> <li>Existing network is not future facing.</li> <li>Bulk deal on individual town basis only.</li> <li>No control over quality of service.</li> </ul>  |
| ССІ                                 | <ul> <li>Full fiber network to every structure.</li> <li>Complete turnkey solution.</li> <li>Large experienced company.</li> <li>Lowest cost for full fiber network.</li> <li>12-24 month build out once funded</li> <li>RDOF communities included in build-out</li> </ul>                    | <ul> <li>CCI will own the infrastructure and access to homes.</li> <li>Possible future sale of CCI.</li> <li>No open access possibility.</li> <li>No control over quality of service.</li> </ul>  |
| Pioneer                             | <ul> <li>Well respected local company.</li> <li>Familiar with region and people.</li> <li>Supports open access</li> </ul>   | <ul> <li>Initial response provided no cost details to compare.</li> <li>Did propose a \$150,000 feasibility study to determine cost of network.</li> <li>\$93M estimate provided in 2<sup>nd</sup> conversation which is 6 times more than other proposals</li> </ul> |
| Sertex                              | <ul> <li>Full fiber network to every structure.</li> <li>Complete turnkey solution.</li> <li>Future facing technology.</li> <li>Strong construction experience.</li> <li>Crocker (ISP) has excellent customer service ratings and may be the lowest cost provider.</li> </ul>                 | <ul> <li>Most expensive proposal.</li> <li>No local presence.</li> <li>Requires an MUD and municipal bonding.</li> </ul>  |
| Axiom                               | <ul> <li>Full fiber network to every structure.</li> <li>Complete turnkey solution.</li> <li>Focus is on rural Maine communities.</li> </ul>  | <ul> <li>Per subscriber costs are very high.</li> <li>Limited experience with project this size.</li> </ul>   |
| Downeast Broadband<br>Utility (DBU) | <ul> <li>It is an existing MUD.</li> <li>Has been in operation in Baileyville, Calais for 4+ years</li> <li>Adding other communities – Princeton, Indian TWP,<br/>Cooper, Alexander</li> </ul>  | <ul> <li>Will require new feasibility study for and estimated \$52,000</li> <li>Unsure of Pioneer's capacity and timing to build out region.</li> <li>Unsure of how long it will take to reach an agreement and secure funding.</li> </ul>                            |
| Wireless Partners                   | <ul> <li>Lowest cost option for full coverage.</li> <li>Complete turnkey solution.</li> <li>Faster rollout than fiber.</li> <li>Very experienced wireless provider.</li> <li>Has applied to upgrade existing service in Orient,<br/>Danforth and Brookton through a pilot project.</li> </ul> | <ul> <li>Highest speed offered is 100/20.</li> <li>Prices are high in comparison.</li> <li>Not future-facing; will require upgrade within a few years.</li> <li>Cell Tower placement may be a line-of-sight, aesthetic problem for some people.</li> </ul>            |

# **Estimated Project Costs and Funding**

## What is the total project cost to have universal access?

- The total project cost will be between \$8 \$17 million depending on the selected ISP/provider.
- Federal/state grant funds will be requested to cover the ISP's cost to build the network.

## What is it going to cost towns?

- Scoring for federal/state grant funds will likely include a regional investment per household.
   Based on 1800 households, and a maximum per household rate of \$700, a preliminary estimate is \$1.26 million.
- The per household rate has not been decided yet for the next grant round through MCA.

## How likely will we be able to get grant funding to cover the \$1.26M?

- Towns/Region will need to decide how to finance their contribution. The payback of a longterm bond will be by the subscribers of the service.
- A regional inter-local agreement will be the best way to secure long-term financing.

Committee to secure final estimates from preferred ISPs and DBU on project costs and complete final financial review for report.

Committee to prepare a draft interlocal agreement for review by legal counsel and town select boards.

# **Next Steps**

Committee to finalize all its recommendations about local ownership and ISP. Prepare a written report for the town select boards and residents to review and discuss.

Committee members will meet with each town's select board to review recommendations and discuss the timeline and decisions needed to pursue state and/or federal grant opportunities in late Fall 2022 and/or Spring 2023.

