



CONNECTMAINE

ConnectMaine Authority Members: Nick Battista, Jasmine Bishop, Fred Britain, Susan Corbett, Heather Johnson, Jeff Letourneau, Liz Wyman

January 2022

Clerk to the Energy, Utilities and Technology Committee
c/o Legislative Information Office
100 State House Station
Augusta, ME 04333
EUT@legislature.maine.gov

Dear Honorable Lawrence and Honorable Berry:

Please find attached the required report pursuant to 35-A M.R.S.A §9208 from the ConnectMaine Authority, including:

- Budget
- Activities
- Investments
- Market conditions

Sincerely,

A handwritten signature in cursive script that reads "Peggy Schaffer".

Peggy Schaffer
Executive Director

ConnectMaine Authority

CONNECTMAINE

Annual Report to the Maine State Legislature
Joint Standing Committee on Energy, Utilities and Technology

January 2022

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Introduction

The ConnectMaine Authority (ConnectMaine) is pleased to submit to the Joint Standing Committee on Energy, Utilities and Technology Committee its annual report for 2021. The report includes the budget, activities and investments of ConnectMaine, as well as market conditions and observations.

In recognition of the critical importance of modern technology for education, healthcare, and business success in Maine, the legislature created the ConnectMaine Authority in 2006, as a public instrumentality of the state, to develop and implement a broadband strategy for Maine.

ConnectMaine is governed by seven members appointed by the Governor or specifically identified and designated by statute.¹

The legislature established ConnectMaine to achieve these statutory goals:

- Broadband service being universally available to all residential and business locations and community anchor institutions in Maine;
- Broadband infrastructure being secure, reliable, competitive and sustainable, and meeting future broadband needs; and
- All Maine residents, businesses and institutions being able to take full advantage of the economic opportunities available through broadband service.

Having up to three staff in the past, currently ConnectMaine is supported by two employees, an executive and assistant director. In 2015, the legislature modified the duties of and added members² to ConnectMaine. The Maine Legislature also recently established the Maine Connectivity Authority to achieve the same statutory³ goals as ConnectMaine, with additional authority or options around investing in middle-mile or backbone infrastructure. The ConnectMaine Authority has already started collaborating with the Maine Connectivity Authority, both of which have adopted guiding principles for future joint work in achieving statewide broadband.

Based on its statutory goals, ConnectMaine envisions a state where all residences, businesses and community institutions have broadband service available that is reliable and competitive, with future-looking infrastructure that is secure and sustainable, and where all residents, businesses and institutions are able to take full advantage of broadband service for economic and social opportunities.

A primary asset of ConnectMaine are the grant programs that support broadband investment. ConnectMaine instituted mechanisms to achieve those goals through a refined project evaluation process and by creating a Broadband Intelligence Platform that integrates mapping activities, grantmaking and reporting. Comprehensive programming will situate Maine to maximize future financial commitment from public and private sources. Beyond assets, ConnectMaine possesses regionally and nationally recognized leadership in bringing together people and resources. ConnectMaine uses an extensive stakeholder engagement process for activities like refining the grant programs, uses interagency collaboration for activities like deploying federal coronavirus relief funds, and leverages national and private-sector partnerships for attracting additional federal funds.

¹ The ConnectMaine Authority statute, 35-A M.R.S.A. Ch. 93, is hereafter referred to as the statute.

² Members are listed on the ConnectMaine website: <https://www.maine.gov/connectme/board-meetings/members>

³ The Maine Connectivity Authority statute, 35-A M.R.S.A. Ch. 94.

Budget

The ConnectMaine Authority is funded primarily through two assessment fees on communications services. The first assessment is one quarter of one percent (0.0025%) of Communications Service Provider State revenues, and the second is ten cents per phone number. This is anticipated to generate up to \$3 million per year beginning state fiscal year 2023. These revenue sources decline year-over-year as subscribers discontinue landline-based services and migrate to wireless services that have not been assessed these fees. The 2021 rulemaking expanded the second fee from only landline telephone numbers to all phone numbers.

Assessment fees are paid on a quarterly basis to the ConnectMaine Fund, which is managed by an independent fiscal agent. Allocations are directed by ConnectMaine, and unused funds are invested by the fiscal agent. Interest generated by the Fund are added to the Fund balance. Solix is currently the contracted fiscal agent for the ConnectMaine Fund.

The starting balance for the fiscal year was \$1,927,088, with \$434,532 in encumbered contracts and awarded grants. ConnectMaine administers grant programs, in accordance with the statute: The Broadband Infrastructure Grants program supports investments in expanding the availability of broadband service; the Community Broadband Planning Grants program develops plans for expanding the availability of broadband service. In 2021, ConnectMaine awarded \$155,300. Another \$8,671,323 was awarded from the July 2020 state broadband bond.

Additionally, ConnectMaine collaborated with other state agencies to administer coronavirus relief funds in late 2020. About \$30,000 in mobile hotspot devices for student households were deployed. ConnectMaine awarded \$6,201,842 to communications service providers to expand broadband availability to student and teacher households.

The following annual budget also captured revenue and expenses for project work under a Northern Borders Regional Commission grant. ConnectMaine anticipates awarding grants from the remaining bond funds before July 2022.

ConnectMaine Authority Financials

Includes ConnectME Fund and State Account

FY22 Administrative Budget

Rev. 06.23.21

BUDGET	DETAIL	FY20	FY21	ACTUAL	PROJECTED	INITIATIVES	PROPOSED
REVENUE	Carryforward	\$0.00	\$1,451,280.05	\$1,469,620.69	\$886,455.65	\$0.00	\$886,455.65
Fund	Assessment Fees, interest & NBRC	\$2,975,000.00	\$1,800,000.00	\$1,630,122.61	\$3,050,000.00	\$0.00	\$3,050,000.00
State	Refunds, excluding Assessment Withdrawals			\$525.00	\$0.00	\$0.00	\$0.00
SUBTOTAL		\$2,975,000.00	\$3,251,280.05	\$3,100,268.30	\$3,936,455.65	\$0.00	\$3,936,455.65
EXPENSES							
Financial	DAFS, Solix, audit, bank charges	\$35,951.00	\$28,296.00	\$33,696.00	\$81,600.00	\$0.00	\$81,600.00
Website	InforME, OIT & Sewall	\$81,234.68	\$34,992.00	\$36,162.42	\$79,275.00	\$0.00	\$79,275.00
Administration	Salaries, etc.	\$258,700.17	\$232,910.22	\$214,583.58	\$263,563.00	\$0.00	\$263,563.00
Cellphones		\$830.24	\$1,124.74	\$983.22	\$1,080.00	\$0.00	\$1,080.00
Travel	Central Fleet	\$7,278.85		\$630.02	\$3,000.00	\$0.00	\$3,000.00
Operational Services	subscriptions, conferences	\$3,536.33	\$15,000.00	\$2,700.00	\$1,300.00	\$20,000.00	\$21,300.00
Support Services	excluding technical and intelligence		\$133,030.00	\$48,874.25	\$75,500.00	\$301,000.00	\$376,500.00
Technical Services	grants verification & validation		\$86,970.00	\$22,225.00	\$277,775.00	\$0.00	\$277,775.00
Broadband Intelligence	data collection, analysis & mapping			\$0.00	\$940,000.00	\$0.00	\$940,000.00
Planning Grants			\$285,410.00	\$64,375.00	\$46,125.00	\$200,000.00	\$246,125.00
Planning Services				\$0.00	\$0.00	\$200,000.00	\$200,000.00
Digital Inclusion			\$70,000.00	\$10,000.00	\$0.00	\$100,000.00	\$100,000.00
Grant Matches		\$50,000.00	\$1,000,000.00	\$75,000.00	\$0.00	\$750,000.00	\$750,000.00
Infrastructure Fund	separate from restricted grants	\$932,128.68	\$762,790.85	\$420,937.50	\$125,312.50	\$100,000.00	\$225,312.50
Miscellaneous	covers likely deviations		\$20,000.00	\$1,452.34	\$50,000.00	\$0.00	\$50,000.00
TOTAL		\$1,369,659.95	\$2,670,523.81	\$931,619.33	\$1,944,530.50	\$1,671,000.00	\$3,615,530.50
BALANCE		\$1,605,340.05	\$580,756.24	\$2,168,648.97			\$320,925.15

ConnectMaine Authority Financials

FY21 into FY22

Coronavirus Relief Funds

Rev. 06.23.21

BUDGET	DETAIL	FY20	FY21	ACTUAL	PROJECTED	INITIATIVES	PROPOSED
REVENUE	Carryforward				\$922,548.96		\$922,548.96
Coronavirus Relief	CARES	\$12,000,000.00	\$6,201,842.08	\$6,151,362.25	\$5,000.00		\$5,000.00
SUBTOTAL		\$12,000,000.00	\$6,201,842.08	\$6,151,362.25	\$927,548.96	\$0.00	\$927,548.96
EXPENSES							
Financial	pro rata share of audit	\$0.00	\$0.00	\$0.00	\$5,000.00		\$5,000.00
Digital Inclusion	affordability program	\$2,000,000.00	\$0.00	\$0.00			
Infrastructure	Connect Kids Grants	\$10,000,000.00	\$6,201,842.08	\$5,228,813.29	\$922,548.96		\$922,548.96
TOTAL		\$12,000,000.00	\$6,201,842.08	\$5,228,813.29	\$927,548.96	\$0.00	\$927,548.96
BALANCE		\$0.00	\$0.00	\$922,548.96	\$0.00	\$0.00	\$0.00

ConnectMaine Authority Financials

NECEC Broadband Fund

Rev. 06.23.21

BUDGET	DETAIL	ACTUAL	PROJECTED	INITIATIVES	PROPOSED
REVENUE	Carryforward		\$1,000,333.94		\$1,000,333.94
NECEC		\$1,000,000.00	\$2,000,000.00		\$2,000,000.00
Interest		\$333.94			\$0.00
SUBTOTAL		\$1,000,333.94	\$3,000,333.94	\$0.00	\$3,000,333.94
EXPENSES					
Planning Assistance					
Digital Inclusion	affordability program				
Infrastructure Grants	matches or direct allocations	\$0.00	\$1,000,000.00		\$1,000,000.00
Infrastructure Loans					
Miscellaneous	covers likely deviations				
TOTAL		\$0.00	\$1,000,000.00	\$0.00	\$1,000,000.00
BALANCE		\$1,000,333.94	\$2,000,333.94	\$0.00	\$2,000,333.94
ALLOTMENT	Deposits to Solix account	\$1,000,000.00	\$3,000,000.00		\$3,000,000.00

ConnectMaine Authority Financials

FY22 State Bond

Rev. 06.23.21

BUDGET	DETAIL	FY20	FY21	ACTUAL	PROJECTED	INITIATIVES	PROPOSED
REVENUE	Carryforward				\$2,000,000.00		\$2,000,000.00
Bonds	FY21	\$0.00	\$15,000,000.00	\$2,000,000.00	\$13,000,000.00		\$13,000,000.00
SUBTOTAL		\$0.00	\$15,000,000.00	\$2,000,000.00	\$15,000,000.00	\$0.00	\$15,000,000.00
-							
EXPENSES							
Bond Fees		\$0.00	\$10,000.00	\$0.00	\$0.00	\$10,000.00	\$10,000.00
Infrastructure Bond		\$0.00	\$14,990,000.00	\$0.00	\$8,671,323.16	\$6,318,676.84	\$14,990,000.00
TOTAL		\$0.00	\$15,000,000.00	\$0.00	\$8,671,323.16	\$6,328,676.84	\$15,000,000.00
-							
BALANCE		\$0.00	\$0.00	\$2,000,000.00			\$0.00
-							
ALLOTMENT	excludes fees			\$500,000.00	\$2,000,000.00		

Activities

ConnectMaine updated the designation of broadband service as 100mbps download and 100mbps upload; while using 50mbps/10mbps for the designation of unserved areas. Areas where 50mbps/10mbps is available but broadband service isn't available, were designated as underserved. While the build-to standard for broadband service, using ConnectMaine funds, is 100mbps/100mbps, preference is given to projects proposing 1000mbps/1000mbps.

Rulemaking in part due to an Appropriations Act, LD 122 of the 130th Legislature commenced in September. While deemed routine technical, a public hearing on the proposed rule⁴ was held on October 4. A substantial revision to Section 5 was warranted, requiring the rule to be reposted. The public comment period ended on December 3, and the ConnectMaine Authority voted to adopt the reposted rule on December 8.

To improve understanding of broadband service in Maine and target its investments, ConnectMaine also supported a speed testing initiative launched in late 2020 by the Maine Broadband Coalition. A speed test measures real-time speeds of an internet connection between a device, such as a computer, and a server, through which data flows. Over 31,000 tests from over 24,000 unique locations are being considered in the development and use of the Broadband Intelligence Platform, which integrates mapping activities, grantmaking and reporting.

The community broadband planning support program includes technical assistance through Connectivity Boosters and analytical tools from consultant partners, and the evolution of more digital inclusion work. Connectivity Boosters are trained volunteers with the dedicated and explicit role of providing flexible support to local and regional planning efforts. This technical assistance supports community organizing, helps assemble financing and establishes public-private partnerships. The Connectivity Boosters and other broadband leaders are part of a community of practice, which involves shared learning, resource sharing and technical assistance for these volunteers. The community of practice is also a centralized place for expanding educational and training offerings, and for accessing community broadband mapping and other analytical tools.

In 2021 ConnectMaine awarded 18 planning grants, eight of which are startup grants, a new process for getting communities started in broadband planning. This program was refined to encourage and reward regionalization. While 19 infrastructure grants were awarded, four of these were declined by two internet service providers who opposed the post-award audit process. The grants verification and validation process is substantially less involved than federal auditing requirements.

With the Maine Connectivity Authority getting set up, staff and board members of both our authorities aim to ensure processes and systems are started, transitioned or continued as smoothly as possible. A set of shared principles were adopted by both authorities to help guide and support these new systems and transitions, contributing to the strategic planning and legislative reporting in 2022.

⁴ Proposed rule may be downloaded from the ConnectMaine website: www.maine.gov/connectme/about/statutes-rulemaking

Investments

Through its grant programs, ConnectMaine invests in expanding the availability of broadband service in the state. Grants toward infrastructure projects that contribute to the state's broadband goals result in expanded broadband service to 15,626 potential subscriber locations.

Broadband infrastructure grants of 2021 result in expanded broadband service to at least 8,086 potential subscriber locations in previously unserved areas of the state. This \$8.1 million investment represented 49.6% of the total costs of these 15 projects.

The Broadband Intelligence Platform was critical in submitting and defending an application to NTIA for a \$28 million grant to NTIA. If awarded, three partner internet service providers would expand broadband to about 15,000 potential subscriber locations in seven project areas across the state, and three of the infrastructure projects would be community owned.

Whether the Broadband Infrastructure Grants Program or opportunities like the NTIA Grant, requests for funds continue to be two to four times what is available. The State of Maine Broadband Action Plan stated a goal of investing \$200 million of public funds, on the low end, toward the \$600 million cost of expanding broadband statewide, which is less than half of what the Maine Department of Transportation spends on the State highway and bridge system annually.

**ConnectMaine Authority
Awarded Infrastructure Grants**

Rev. 11.04.2021

Grant Titles	Communities	Firms	Premises	Unserved	Density of Project	Costs	Awards	Percent of Cost	Status
Alexander Community-Driven Broadband Project	Alexander	Pioneer Broadband	405	184	40.9	\$491,429	\$147,000.00	29.9%	Started
Alna Tidewater Round 14	Alna	LCI	155	130	9.1	\$273,173	\$92,500.00	33.9%	Done
Alton Round 14 & 11	Alton	OTELCO	362	293		\$887,230	\$338,000.00	38.1%	Done
Appleton & Hope Community-Driven Broadband Project	Appleton, Hope	LCI	1378	1034	18.9	\$1,764,380	\$705,752.00	40.0%	Started
Argyle OTELCO Round 15	Argyle	OTELCO	136	131	11.3	\$264,389	\$60,937.50	23.0%	Done
Plunkett Pond Benedicta	Benedicta, Stacyville	Pioneer Broadband	168	125	11.1	\$257,366	\$184,650.00	71.7%	Done
Somerset County Community-Driven Broadband Project	Big Moose, Harfords Point, Jackman, Long Pond, Misery Gore, Moose River, Moosehead Junction, Rockwood Strip T1 R1 NBKP, Sandwich Academy Grant, Sapling, Taunton & Raynham Academy Grant, Tomhegan	Premium Choice Broadband	2014	1735	21.4	\$5,068,500	\$1,824,660.00	36.0%	Started
Bowdoinham LCI Round 14	Bowdoinham	LCI	437	217	17.5	\$507,330	\$90,000.00	17.7%	Done
Bremen Tidewater Round 15	Bremen	LCI	400	100		\$532,366	\$120,000.00	22.5%	Done
Bristol Community-Driven Broadband Project	Bristol	LCI	2701	257	14.7	\$876,582	\$141,150.00	16.1%	Started
Lowell & Burlington; Fiber to the Premise Webb Cove Lowell	Burlington, Lowell	OTELCO	168	138		\$210,555	\$93,000.00	44.2%	Done
Cambridge Premium Choice Round 14	Cambridge, Parkman	Premium Choice Broadband	382	263	13.5	\$680,001	\$200,000.00	29.4%	Done
Islesford Cranberry Isles Round 11	Cranberry Isles	Axiom Technologies	210	180		\$742,640	\$69,066.00	9.3%	Done
Dedham Area Provider Expansion Project	Dedham, Ellsworth, Holden	Premium Choice Broadband	1234	1208	20.7	\$3,289,690	\$1,205,737.00	36.5%	Started
Plymouth & Dixmont Round 13	Dixmont, Plymouth	OTELCO	566	127		\$153,826	\$103,665.00	67.4%	Done
Dover-Foxcroft Area Provider Expansion Project	Dover-Foxcroft, Garland	Premium Choice Broadband	78	78	9.1	\$380,600	\$154,143.00	40.5%	Started
Eastbrook Community-Driven Broadband Project	Eastbrook	Consolidated Communications	460	410	19.2	\$1,162,500	\$410,000.00	35.3%	Started
Maple Grove Fort Fairfield Round 11	Easton, Fort Fairfield	Pioneer Broadband	34	10		\$104,824	\$59,824.00	57.1%	Done
Georgetown Community-Driven Broadband Project	Georgetown	Axiom Technologies	1044	1044	13.4	\$3,712,043	\$858,365.00	23.1%	Progress
Fiber to the Premise Notched Pond Area Gray New Gloucester	Gray, New Gloucester	OTELCO	146	36		\$60,000	\$45,000.00	50.0%	Done
Greenville Provider Expansion Project	Greenville	Premium Choice Broadband	196	196	14.6	\$652,600	\$313,248.00	48.0%	Started
Hudson Premium Choice Round 15	Hudson	Premium Choice Broadband	468	448	14.6	\$762,820	\$300,000.00	39.3%	Done
Indian Township Community-Driven Broadband Project	Indian Township	Pioneer Broadband	320	320	14.5	\$424,768	\$105,056.00	24.7%	Started
Long Island FTTP Community-Driven Broadband Project	Long Island	Consolidated Communications	416	216	22.6	\$731,317	\$388,800.00	53.2%	Started
Monson Provider Expansion Project	Monson	Premium Choice Broadband	336	324	14.0	\$1,156,800	\$577,243.00	49.9%	Started
Northport Provider Expansion Projects	Northport	GWI	334	334	21.0	\$840,877	\$657,909.00	77.9%	Started
Orland & Surry Provider Expansion Project; Newbury Neck Fiber Surry	Orland, Surry	Premium Choice Broadband	625	625	18.9	\$1,545,600	\$674,530.00	43.6%	Started
Burlock Road Presque Isle Provider Expansion Project	Presque Isle	Pioneer Broadband	89	89	9.5	\$248,189	\$161,322.85	65.0%	Started
Totals			15262	10252	16.7	\$27,782,394	\$10,081,558.35	36.3%	

Market

As a private-sector service, broadband is available where the customer base is large enough for financial solvency of internet service providers. This kind of private-sector-driven expansion of broadband isn't economically viable in sparsely populated or remote areas of the state. These areas are too small or remote to attract or prioritize deployment of limited private resources there. Some communications service providers receive federal subsidies through the Universal Service Fund and FCC programs. The low density of potential customers can also affect the sustainability of ongoing operations. With the presence of one provider in an area, other providers can't justify investing in the same area, effectively limiting consumer choice.

The Broadband Intelligence Platform is being developed to help ensure accountability for completing projects on-time and within budget, and for reporting speeds provided, and to compare level and quality of service to federal standards, to track adoption or subscription rates, and to help improve the accuracy of mapping data. Having incorporated datasets from the industry, speed testing, NTIA, Census and FCC, and then comparing to purchased data from CostQuest about the likelihood of potential subscriber locations being connected to various technologies, ConnectMaine estimates 78,100 locations are in unserved areas of the state. Only about 118,000 of the 665,000 potential subscriber locations in the state are in areas where broadband service is available (served).

Based on FCC data, about 55% of Mainers subscribe to internet service of at least 25/3mbps, but the percentage of Mainers that can access this level of internet service is overstated; subscription is about 65% nationwide. Where take rates are lower, there is less financial incentive for private companies to invest in the expansion of broadband service. Given that the economic and social benefits of expanding broadband availability can only be realized with the use of broadband infrastructure, ConnectMaine is requiring subscription data from grant recipients for five years following project completion.

Experiences in connecting to the internet affects future demand for internet service. Internet users increasingly expect universal connectivity and seamless transitions between devices and locations. Broadband adoption is affected by aspects of digital equity and digital inclusion: affordability, digital education, accessibility, etc. Regardless of geographic location, or socioeconomic or citizenship status, all individuals and communities should be able to access information, create and share content, improve health outcomes, access learning and work from anywhere in Maine.

As part of its grants program, the ConnectMaine Authority considers the retail cost of service to the potential subscriber, including whether or not any data usage limits unreasonably hinder current internet uses. Service provided from funded projects must be equal to or less than the price per subscriber offered elsewhere in the state. This evaluation is increasingly important to ConnectMaine and stakeholders since the Ratewatcher Guide is no longer published by the Office of the Public Advocate.

Observations

ConnectMaine consistently receives more applications for infrastructure grants than can be awarded with available funds. This, along with outreach from the public and political leaders, clearly indicates the need for broadband throughout the state. Community Broadband Planning Grants have supported community surveying and organizing, broadband plans, feasibility studies and business modeling for over 250 of Maine's municipalities and townships. Looking to meet the current and future broadband needs of the community, and ensure equitable access, most local plans call for broadband service that is universally available. These large infrastructure projects seek to result in affordable and reliable connectivity. Most of these communities are actively seeking enough funds to implement projects.

ConnectMaine anticipates increased collaboration with the Maine Connectivity Authority, especially to make funds available for infrastructure, which remains the largest challenge to achieving state broadband goals. Activities of its next triennial strategic plan are being identified in anticipation of future collaboration and transition with the Maine Connectivity Authority. That plan is also being prepared in alignment with Maine Economic Development Strategy, the State of Maine Broadband Action Plan, the Governor's Economic Recovery Committee and the Maine Climate Action Plan.