Agenda

• Opening Remarks
• Statutory Requirements of Meeting & Broadband Expansion Act review
• Election of Chair/Vice Chair
• Broadband Overview
• Review of State’s Broadband Efforts and Administrative Information
• Financial Overview
• Recommended Qualifications and Salary Range for Executive Director
• Closing Remarks and Announcements
• Other Business
• Adjournment
Opening Remarks

State Chief Operating Officer – Steven Harpe
Statutory Requirements of Meeting and Broadband Expansion Act review

Director of Grants Management – Clay Holk
The Broadband Expansion Act (HB3363) establishes the Broadband Governing Board and State Broadband Office

**Broadband Governing Board (BGB)**
- Nine members, serving until BGB terminates on 6/30/2028
- Oversees SBO, and approves annual budget
- First BGB Meeting:
  - Adopt qualifications and salary range for an Executive Director of the SBO
  - Determine process for filling Executive Director role
  - Elect members as Chair and Vice-Chair
- Members may not be affiliated with potential grant recipients
- BGB is subject to Open Meeting Act and Open Records Act

**State Broadband Office (SBO)**
- Serves until SBO terminates on 6/30/2028
- SBO shall:
  - Oversee creation and regular updating of Statewide Broadband Plan and Broadband Service Map
  - Develop and manage Broadband Grant Program
  - Submit regular reporting on progress to BGB and annual report to House Speaker and Pro Tem
- OMES will provide admin support, and SBO funding comes from federal program admin expenses and Grant Revolving Fund
- Goal: 95% of Oklahomans adequately served by 6/30/2028
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Broadband Overview

Director at Guidehouse – Shaun Fernando
Guidehouse has been working with OMES to develop an understanding of the current state of broadband and digital equity in Oklahoma

Guidehouse Staff

Shaun Fernando
Broadband Director
sfernando@guidehouse.com

Emily Toland
Broadband PM
etoland@guidehouse.com

Our framework takes a holistic view of factors impacting broadband and digital equity and provides a logical linkage between policy and funding strategy

Legislation & Policy
Familiarity with the rules, regulations, and policies related to broadband and smart cities development in Oklahoma

Market Structure
Understanding of the existing broadband market structure, including the major players, market segmentation, cost and pricing structures, and business model

Socio-economic Factors
Comprehension of relevant socio-economic variables and the needs of residents, educational institutions, healthcare providers, businesses, etc. in Oklahoma

Infrastructure
Knowledge of the physical location of existing or potential broadband infrastructure, upload and download speeds available, environmental resiliency considerations, etc.

Optimally Allocate Federal Funding

Maximize Impact and Economic Co-Benefits

Coordinate a Fragmented Stakeholder Ecosystem

Guidehouse has been working with OMES to develop an understanding of the current state of broadband and digital equity in Oklahoma.

Shaun Fernando
Broadband Director
sfernando@guidehouse.com

Emily Toland
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etoland@guidehouse.com

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Coordinate a Fragmented Stakeholder Ecosystem
The suitability of broadband access technologies varies depending on cost drivers including geography and population density.

Higher speed and lower latency indicate a better level of service. Speed (bandwidth) indicates how much data can be transmitted within a specific amount of time (e.g., Mbps), while latency refers to how long it takes a signal to travel to its destination and back (e.g., delay in loading webpage).

<table>
<thead>
<tr>
<th>Wired (Terrestrial) Broadband</th>
<th>Wireless Broadband</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Fiber</strong></td>
<td><strong>FWA</strong></td>
</tr>
<tr>
<td>Fiber optic cable</td>
<td>Fixed Wireless Access</td>
</tr>
<tr>
<td>Coaxial &amp; Hybrid Fiber Coaxial</td>
<td>Medium to fast; Residential typically &gt;100 Mbps</td>
</tr>
<tr>
<td>Digital Subscriber Line</td>
<td>Slow to medium; Residential typically &lt;100 Mbps; up to 200 Mbps</td>
</tr>
</tbody>
</table>

**Speed**
- Fastest symmetric speeds; Residential typically 1 Gbps; up to 10 Gbps
- Next fastest; Residential typically 20-100 Mbps; up to 1 Gbps
- Slow to medium; Residential typically <100 Mbps; up to 200 Mbps

**Latency**
- Very Low; 10-12 milliseconds
- Low; 13-27 milliseconds
- Low; 11-40 milliseconds
- Low; 30-40 milliseconds

**Pros**
- Fastest data transmission technology available
- "Future proofing"
- Widely deployed in urban/suburban areas
- Can use existing cabling
- Uses existing telephone lines
- Widely available
- Relatively low-cost to deploy
- Reasonable speeds, esp. in open flat areas
- Potentially can cover remote areas
- Widest coverage area
- Long transmission range
- Non-line-of-sight performance

**Cons**
- High initial capital cost
- Asymmetric speeds
- Lower speeds overall, esp. in rural areas
- Potentially high maintenance costs
- Relatively new and untested*
- High latency and expensive*
- New tech, relatively slow speeds*

Notes: Mobile was excluded since the focus of federal funding pertains to fixed internet. TV Wireless is unlikely to be a technology of choice and is therefore excluded from the upcoming technology focus slides. *Would potentially not qualify to meet “served” definition for BIL funds.

Sources: NTIA pre-NOFO 23-Mar-22 Webinar 1, HighSpeedInternet.com, BroadbandNow; FCC; Some latency and image sources in resource library.
The Panhandle has limited provider choice, but symmetrical high-speed internet is available. The Southeast has limited provider choice and of the ISPs providing service in those areas, few provide symmetrical high-speed internet. Electrical cooperatives are new market entrants in the Northeast, providing those counties with competitively priced symmetrical high-speed internet.

**Key takeaway:** Market structure is an important lens for examining the current state of broadband in Oklahoma. Geography and population density impact ROI for ISPs and determine where, at what level, and at what price point ISPs are providing services.
Over $269M across multiple federal funds are available to address market failures but application deadlines are fast approaching

**Coronavirus Capital Funds**
Total Funding Pool: $10B
Oklahoma Allocation: $168M

**BEAD**
Total Funding Pool: ~$42.5B
Oklahoma Amount: TBD (At least $100M)

**Digital Equity Act (DEA)**
Total Funding Pool: $2.75B
Est. Oklahoma Amount for planning: ~$880K

**Middle Mile (MM)**
Total Funding Pool: $980M
Grant awards est. $5M-$100M
Allocation not dependent of FCC Fabric Mapping

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**Current 2022 Timelines**

- **May 13, 2022:** Broadband Equity Access & Deployment (BEAD) & DEA applications open
- **June 21, 2022:** Enabling Middle Mile Infrastructure (MM) applications open
- **June 24, 2022:** DEA Planning application due
- **July 18, 2022:** BEAD Letter of Intent (LOI) due
- **Aug. 15, 2022:** BEAD initial planning funds application due
- **Sept. 24, 2022:** BEAD deadline to submit CPF Grant Plan
- **Sept. 30, 2022:** MM applications close

- **Late-Fall 2022:** FCC to publish Broadband Serviceable Location Fabric used to determine BEAD allocations

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**Due Dates:**
- **Aug. 15, 2022:** Initial planning BEAD application
- **July 18, 2022:** BEAD LOI due
- **July 24, 2022:** DEA Planning application due

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**Source:** NTIA 16-May-2022 Bipartisan Infrastructure Law Overview Webinar; subject to changes
Practical next steps

General Administration
1. Register on the NTIA Grants Portal
2. Review NTIA resources, toolkits, and application packets and begin applications
3. Consider internal resource capacity and determine whether Oklahoma will subgrant for plan development; if so, draft and issue any required procurement so that when the awards are approved work can begin in earnest

Coronavirus Capital Funds Program (Administered separately from NTIA)
1. Determine eligible broadband projects for inclusion
2. Begin compiling grant and program plans for submission deadline (Due 9/30)

BEAD Program (Application Guide and Checklist can be found here)
1. Complete and submit the 1-pg Letter of Intent through grant portal (Due 7/18)
2. Determine if Oklahoma will request the Initial Planning Funds Grant (up to $5M)
3. Prioritize mapping of served/un(der)served areas based on 25/3 and 100/20 thresholds
   - FCC maps will determine total allocation; be prepared to challenge with more accurate mapping information
4. Inventory of current assets and planned/ongoing broadband projects (e.g., CAF, Tribal Connectivity Grants)

Digital Equity Planning Grant (Application Guide and Checklist can be found here)
1. Complete and submit planning application through grant portal (Due 7/12)
2. Begin mapping stakeholders (e.g., community local government, anchor institutions / organizations offering digital inclusion / literacy) and inventorying existing programs and assets

Middle Mile
1. Determine if the State Broadband Office will apply for the Middle Mile grant or let other eligible entities apply (App. due 9/30)
2. If leaving open to other entities, consider communication about that decision to alert other eligible entities and plan for coordination on State priorities and interested applicants
Overview of State’s Broadband Efforts and Administrative Information

Department of Commerce – Kirk Martin
Financial Overview of Broadband
Governing Board and State Broadband Office

Director of Grants Management – Clay Holk
The BGB and SBO need to fund necessary activities through ARPA appropriations and federal funding

**Broadband Governing Board (BGB)**
- $2,000,000 appropriation for necessary Broadband Mapping – enacted by HB1123, without Emergency clause (funds available mid-August)
- $365,068 appropriation for OSU IT’s Advanced Fiber Technician Training Program – enacted by HB1123, without Emergency clause (funds available mid-August)

**State Broadband Office (SBO)**
- $500,000 appropriation for SBO admin expenses – upon enactment of SB5XX, with Emergency clause (funds available June)

**Broadband Mapping Budget (Yr 1)**
- Personnel (GIS Analyst) - $83,000
- Hardware (Computers) - $23,000
- Data (ESRI, CostQuest, Ookla) - $400,000

**SBO Admin Funding Availability**
- Per HB1123, SBO is funded via admin expenses of applicable federal programs
- BEAD grant ($42.5B) provides $5M in Initial Planning Funds to stand up State Broadband Office with Letter of Intent to apply for grants
Recommended Qualifications and Salary Range for Executive Director

Human Capital Management – Jacob Smith
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Appendix
Additional Federal Funding Details
The Coronavirus Capital Projects Fund makes $167.7M available to Oklahoma for eligible broadband, connectivity, and community projects

Oklahoma allocation: $167.7M

Description: The American Rescue Plan Act allocated $10 billion to U.S. Treasury for payments to states, territories, and tribal governments “to carry out critical capital projects directly enabling work, education, and health monitoring, including remote options, in response to the public health emergency”

Eligible projects must meet all the following criteria:
- Capital assets designed to directly enable work, education, and health monitoring
- Addresses a critical need that results from, revealed, or was exacerbated by COVID-19
- Critical need of the community to be served

Presumptively Eligible Projects Include:
- Broadband Infrastructure Projects
- Digital Connectivity Technology Projects
- Multi-purpose Community Facility Projects

ESTIMATED TIMELINE

2022 Grant Plan and Program Plans Due to Treasury
2023 Grant and Program Plan Approval, Quarterly Reporting, Project Implementation
2024 Treasury reviews Plan Submissions
2025 Timeline approximate unless exact date specified
2026 Projects must reach substantial completion before 12/31/2026

Grant and Program Plan Approval, Quarterly Reporting, Project Implementation

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BEAD program will provide ~$42.5B for infrastructure planning and implementation

**Total Funding Pool:** ~$42.5B  
**OK Amount:** TBD (Minimum $100M)

**Description:** A program to get all Americans online by funding partnerships between states or territories, communities, and stakeholders to build infrastructure for un(der)served areas and to increase adoption of high-speed internet

**Entities eligible to apply include:**
- All 50 states
- The District of Columbia and Puerto Rico
- Other Territories: U.S. Virgin Islands, Guam, American Samoa, and the Commonwealth of the Northern Mariana Islands

**Example eligible uses of funds include:**
- Planning for high-speed internet deployment
- Deploying or upgrading high-speed internet
- Installing high-speed internet in multi-tenant buildings
- Implementing adoption and digital equity programs
- Workforce and job training

**ESTIMATED TIMELINE**

<table>
<thead>
<tr>
<th>Year</th>
<th>Event</th>
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<tbody>
<tr>
<td>2022</td>
<td>NOFO live 5/13</td>
</tr>
<tr>
<td>2023</td>
<td>LOI due 7/18</td>
</tr>
<tr>
<td>2023</td>
<td>5-year plan due 270 days after planning funds received</td>
</tr>
<tr>
<td>2023</td>
<td>Initial proposal due 180 days after new data maps and notice of funding amounts issued</td>
</tr>
<tr>
<td>2025</td>
<td>Final proposal due 365 days after initial proposal approval</td>
</tr>
<tr>
<td>2026</td>
<td>4-year implementation</td>
</tr>
</tbody>
</table>

Timeline approximate unless exact date specified

**Source:** NTIA 16-May-2022 Bipartisan Infrastructure Law Overview Webinar
Digital Equity Act created three programs to promote digital equity and inclusion

**Funding pool**
$2.75B
Est. OK amount for planning: ~$880K

**Description:** Three programs that provide funding to promote digital inclusion and advance equity for all. They aim to ensure that all communities can access and use affordable, reliable, high-speed internet to meet their needs and improve their lives.

**The Digital Equity Act created three programs:**
- **State Planning**
  $60M formula funding program to develop digital equity plans
- **State Capacity**
  $1.44B formula funding program to implement plans & promote digital inclusion
- **Competitive**
  $1.25B to implement digital equity and inclusion activities

**Examples of eligible uses of funds include:**
- Developing digital equity plans; states must develop a plan to be eligible for state capacity grants
- Making awards to other entities to help make digital equity plans
- Implementing digital equity plans and related activities
- Providing digital literacy and digital skills education
- Improving accessibility and inclusivity of public resources
- Facilitating the adoption of high-speed Internet

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<td>Due 7/12</td>
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<tr>
<td>2023</td>
<td>1-year state planning</td>
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<tr>
<td>2024</td>
<td>State cap. app</td>
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<td></td>
<td>5-year state capacity implementation</td>
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<tr>
<td>2024</td>
<td>Comp. app</td>
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<td>4-year competitive implement.</td>
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<tr>
<td>2025</td>
<td>Competitive Program launches within 1 month of first Capacity awards</td>
</tr>
<tr>
<td>2026+</td>
<td>Timeline approximate unless exact date specified</td>
</tr>
</tbody>
</table>

Source: NTIA 18-May-2022 Bipartisan Infrastructure Law Overview Webinar
Middle Mile Grant Program will invest in the construction, improvement or acquisition of middle mile infrastructure

Funding pool: $980M
OK Amount: Grant awards est. $5M-$100M

Next Steps:
NTIA plans to host more webinars once the application opens, and proposal templates will be made available at that time. In the meantime, prospective applicants can prepare by familiarizing themselves with the NOFO.

PROGRAM HIGHLIGHTS

Middle mile infrastructure refers to the mid-section of Internet infrastructure that carries large amounts of data at high speeds over long distances and connects the "backbone" of Internet infrastructure to the "last mile"

Entities eligible to apply include a wide variety of entities, incl. but not limited to govt. entities, utilities, companies, & non-profits that provide Internet services

Example uses of funds:
- Construction, improvement, or acquisition of facilities and equipment
- Engineering design, permitting, and work related to projects
- Personnel costs, including salaries and benefits
- Other costs necessary to program’s activities

ESTIMATED TIMELINE

Timeline approximate unless exact date specified

Source: NTIA 19-May-2022 Bipartisan Infrastructure Law Overview Webinar, California Department of Technology, "What is the middle mile"? And NTIA Webinar

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