

Managing Broadband

Challenges and Opportunities

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Member driven. Technology focused.



Quick Intro



Aaron Bennett

- 6 years with NRTC
- 3 decades of rural broadband experience
- 150+ rural broadband projects
- Raised in Rural America
- US Navy veteran



Congratulations ... Now What?

Building Your Broadband Business

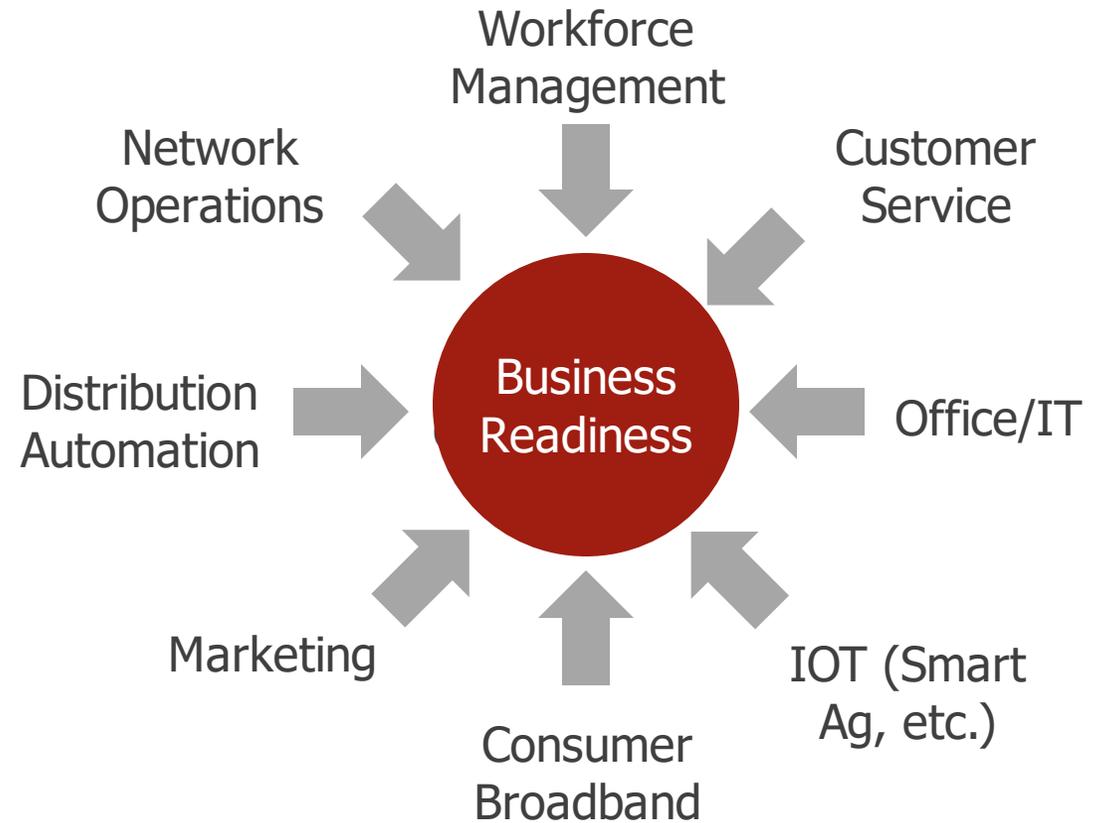
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Broadband is Different

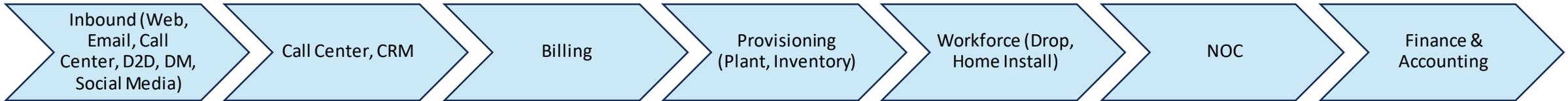
Your business / community are changing...

- You are entering a highly competitive business
- Your residents expect and deserve world-class service
- It's a 24x7x365, minute-by-minute, second-by-second service
- Broadband will impact your business
- The workforce is different
- Strong partners can help
(but these partners *MUST* have mutually aligned interests)



Success requires a **forward-looking** approach

Craft Your Service Delivery Vision



When will there be a better opportunity to...

- Integrate tools that enhance employee experience?
 - ▶ Mobile ticketing
 - ▶ Mobile data collection
 - ▶ Improved field – customer communications
- Create virtual/touchless customer experience (CX)?
 - ▶ Bill due
 - ▶ Tech on the way
 - ▶ Maintenance notice
 - ▶ Outage notice
 - ▶ Text, social, email, etc.



Build a Winning Team

- Engage the Operations and Back Office teams early in the process
- Evaluate systems/processes for ease of integration and workflows
- Ensure an understanding of regulatory requirements
- Evaluate staffing partners
- Develop your existing team to support new services
- Consider which services will be outsourced and to which partner(s)

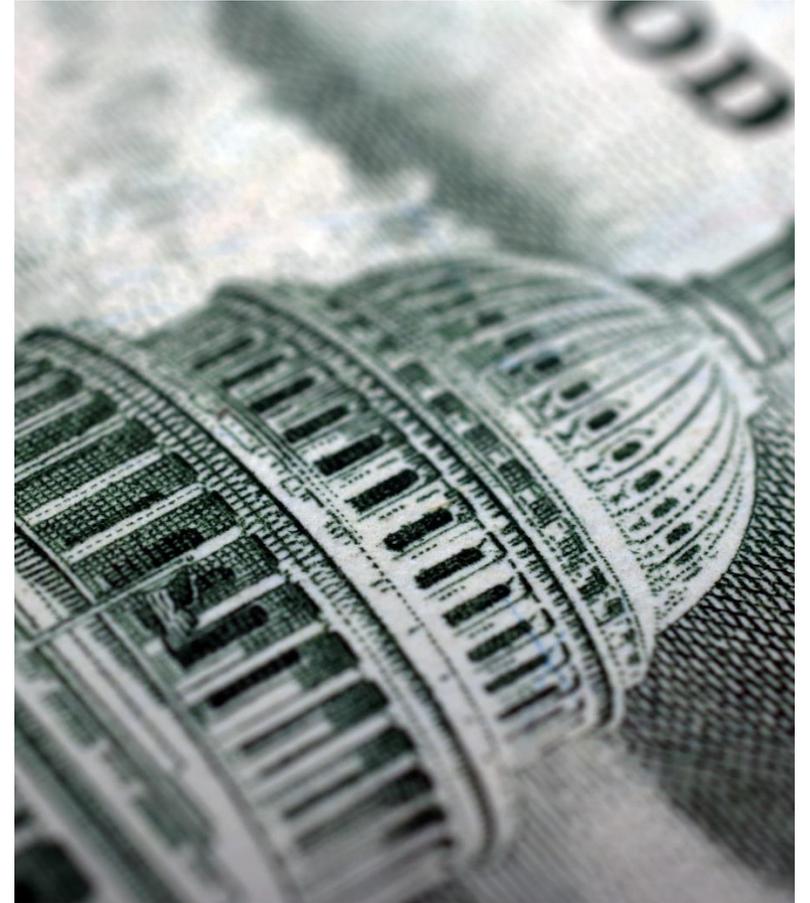




Stay on Top of Regulatory Requirements

- Fully understand regulatory requirements for each service at every level of government
- Fully understand going forward regulatory operator obligations
- Identify and leverage subsidies as they become available
- Oversee adherence to “compliance, disclosure and notice checklist”

(Comcast has 14 disclosures just for broadband network practices)



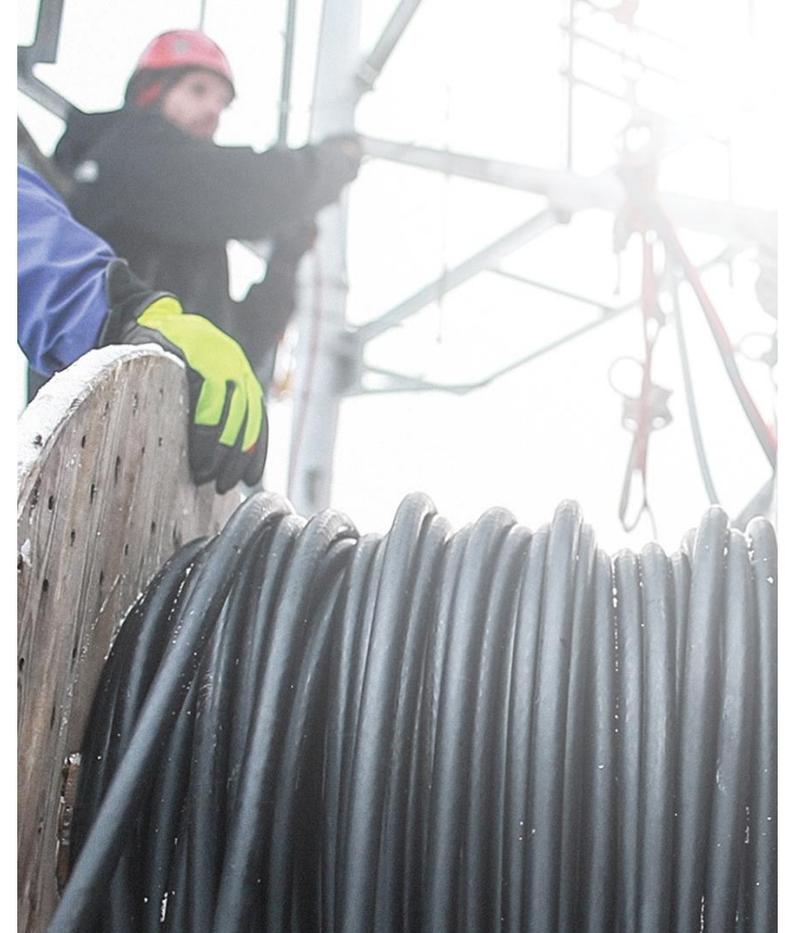


You Are Building the Best Broadband Network

*But Don't Forget to Create A Successful Broadband **Business***

Your choice of approach should allow you to:

- **Build the best workforce:** Find and develop the best team
- **Provide outstanding customer service:** Everything starts with an exceptional CSR experience
- **Deploy quickly and predictably:** Get service to your community fast and reliably
- **Ensure reliable service:** Through 24x7 monitoring and expert management of your network
- **Protect critical systems and data:** Reduce the potential for breaches and minimize the damage when they occur
- **Provide outstanding technical service:** Experienced and friendly support around the clock, 365 days a year
- **Correlate and analyze your data:** Properly used, data can help ensure better service, drive business decisions, and ensure continuous improvement





You Don't Have to Tackle This Challenge Alone

Partners exist to help you with:

- Funding Support
- Regulatory Support
- Marketing Support
- Technical Support
- Customer Service
- Billing/Provisioning
- Technical Operations
- Workforce Management
- Network Operations





Decision Point

What Will You Outsource and to Whom?

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Key Challenge: Staffing and Expertise

- Talent is hard to find, especially with the expertise needed for broadband networks
- 24x7 services typically require at least 7 people to staff (preferably more)
 - ▶ Three 8-hour shifts per day
 - ▶ Weekend staff
 - ▶ Multiple staff for high-volume shifts
 - ▶ Resiliency for when staff are on vacation, ill, injured, leave or get promoted
- Key personnel may end up overburdened with menial, repetitive, or off-hour tasks

Partnering for certain services can ease your staffing issues

How to Select the Right Partner

When evaluating partners, select those who:

- **Put your interests first:** They make decisions based on your best interests, not their own bottom line
- **Develop *your* workforce:** The best partners don't expect you to rely on them forever for all your services; they help you expand your skills where it makes sense to be as cost-effective as possible.
- **Offer flexibility:** They can fill a variety of gaps in your staffing and expertise, and can also adjust their level of support over time as you grow, learn, and potentially move things in-house
- **Bring stability:** They are there for you now and into the future; there is no worry they will close shop for financial or other reasons
- **Have a strategic vision:** They prioritize long-term relationships over short-term profits
- **Can evolve:** They invest in providing improved and expanded services, helping you to stay at the forefront of technology and industry best practices





Which Services are the Most Partner-Friendly?

- Marketing & Communication
- Design & Engineering Services
- Construction
- Project & Construction Management
- NOC Services
- Help Desk Services (CSR and Tech Support)
- Data Aggregation and Analysis
- Cyber Defense (keeping our members within the NIST Cybersecurity Framework)

Partnering is **not** having someone else do everything for you...

Partner with folks that will help you **hire, train, and transfer knowledge**

Developing your local staff should be the most important goal of the project



Who is NRTC?

Member driven. Technology focused.

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NRTC is Your Technology Cooperative



Member driven. Technology focused.

Our Mission:

NRTC provides solutions that help our telecommunications and electric members bring the advantages of today's evolving technology to rural America

Our Vision:

We will be our members' most trusted technology partner

A member owned cooperative

Serving 1,500 rural electric & telephone cooperatives and companies across the country

36 Year History

Formed in 1986, profitable for the past 25 years

Technology Driven

We are not dues funded and we do not lobby
Our revenue comes from the services we provide

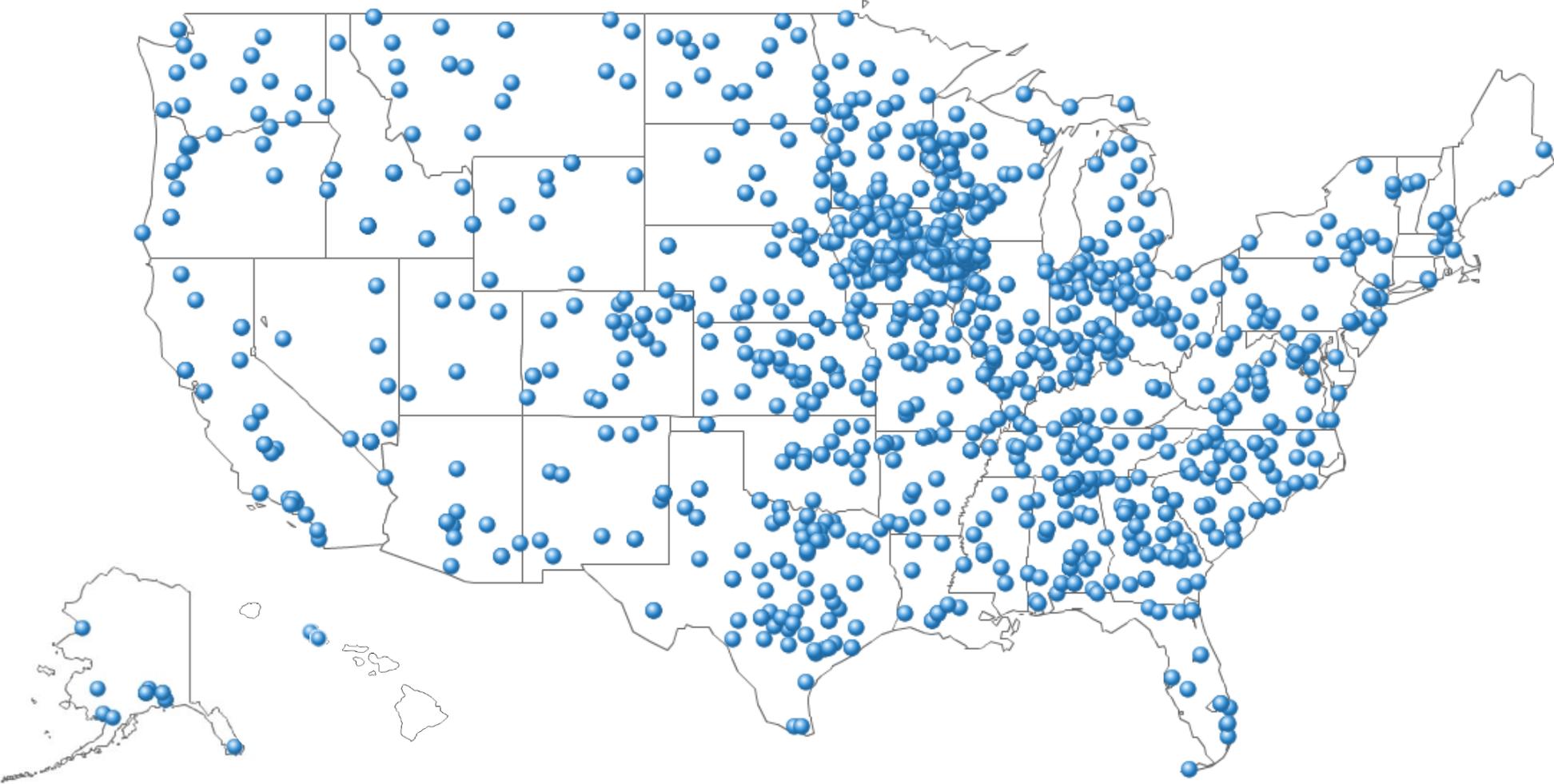
Financially Strong

\$160M+ in Revenue

We can leverage significant capital to invest in technology for the benefit of our members



Serving Members Across Rural America

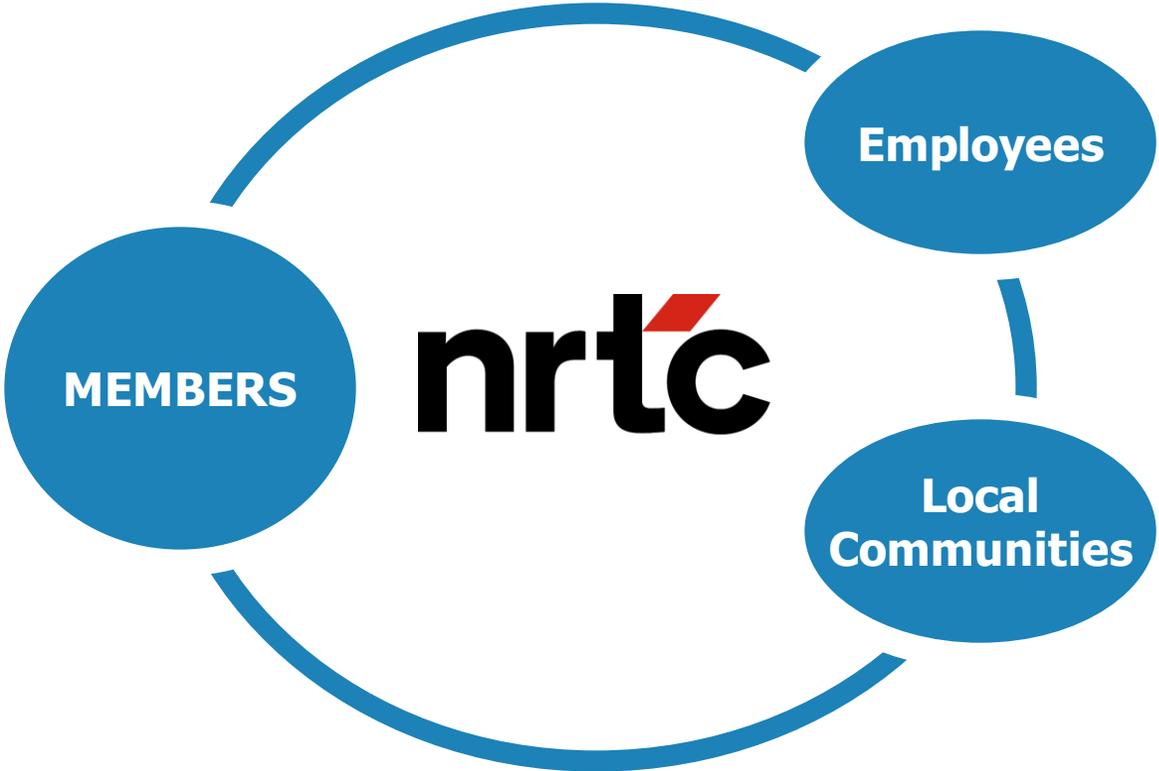




We Are Owned By The Members That We Serve

Our members are both our customers and our owners

- Comprise our Board of Directors
- We return profits in the form of “patronage”



Employees devoted to member service

- The majority directly serve our members every day
- Work and live in 23 states across the nation

All of us dedicated to creating thriving rural communities

- This is ultimately *where* and *for whom* we all work

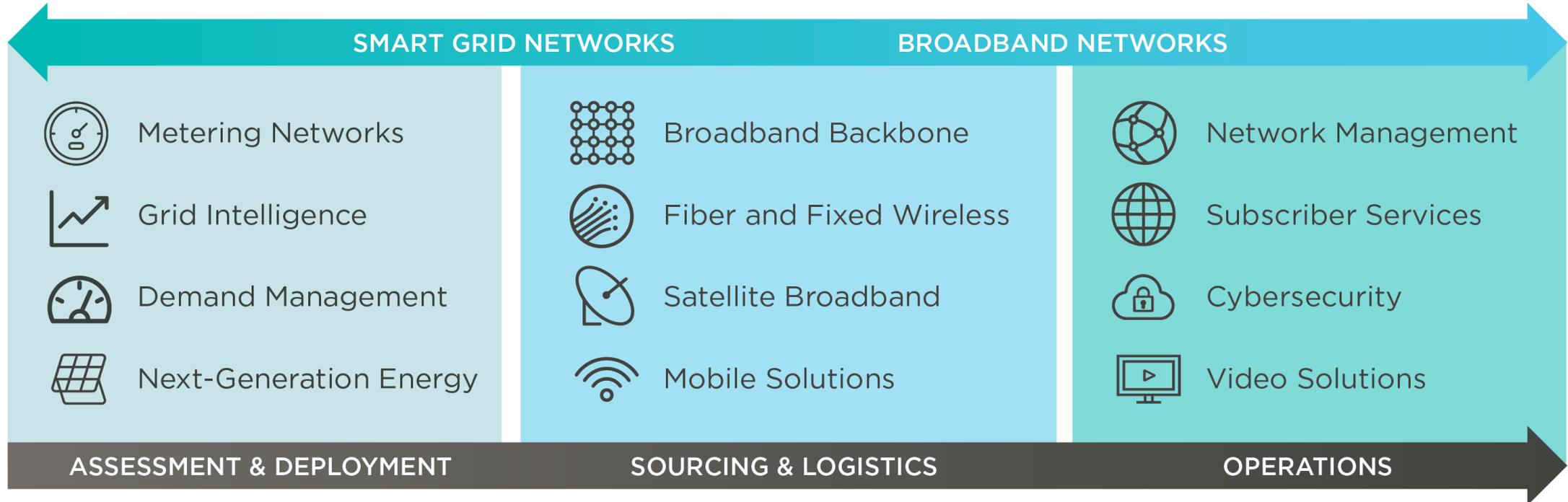
Our members were created to invest in electric and telephone services where no one else would, for the benefit of their communities; We were created to serve them

NRTC Provides Technology Solutions to Rural America



NRTC GRID SOLUTIONS

NRTC BROADBAND SOLUTIONS



ASSESSMENT & DEPLOYMENT

SOURCING & LOGISTICS

OPERATIONS



We're **Your** Technology Cooperative!

Please reach out if you'd like to discuss your specific needs and situation

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