Opportunities for Enhancing Broadband Development in NM

NM Legislative Interim Science, Technology & Telecommunications
Committee

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National Resources

- ARRA 2009 ("Stimulus Act")
- USDA RUS Grants & Loans
- NTIA Grants
- FCC Grants
 - USF/CAF mobility Fund
 - CAF I Broadband grants 2012
 - CAF II Broadband grants 2014
 - Broadband Experimental Grants 2015

National Resources actuals/potentials in NM

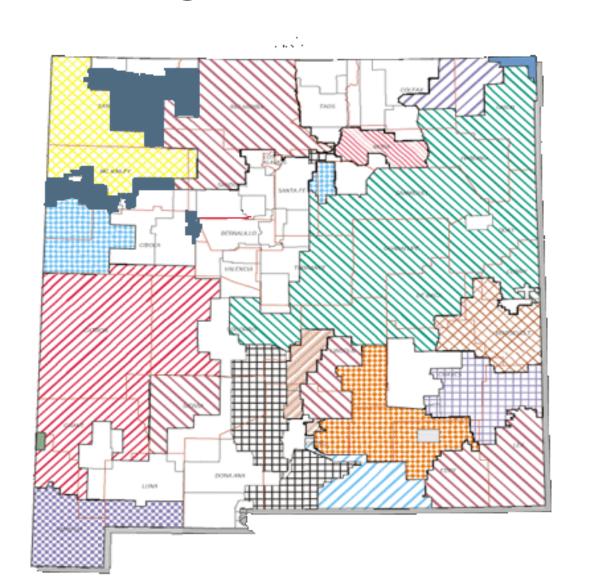
- ARRA 2009 ("Stimulus Act")
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- FCC Grants
 - USF/CAF mobility Fund
 - CAF I Broadband grants 2012
 - CAF II Broadband grants 2014
 - Broadband Experimental -2012

- \$171.7 M (?) infrastructure in NM
- \$150-\$200 Million annually
 - Est. \$80-\$100 M over last 5 yrs

- \$500 Million annually
- \$2.3 M over 6 years to rural NM
- \$85 M over 6 years to rural NM
- \$00

NM Local Exchange Carrier territories



National Resources by Rural Area

Price Cap Carriers

(CenturyLink, Frontier, Windstream)

ARRA 2009 ("Stimulus Act")

- NTIA Grants
- FCC Grants
 - CAF I Broadband grants 2012
 - CAF II Broadband grants 2014

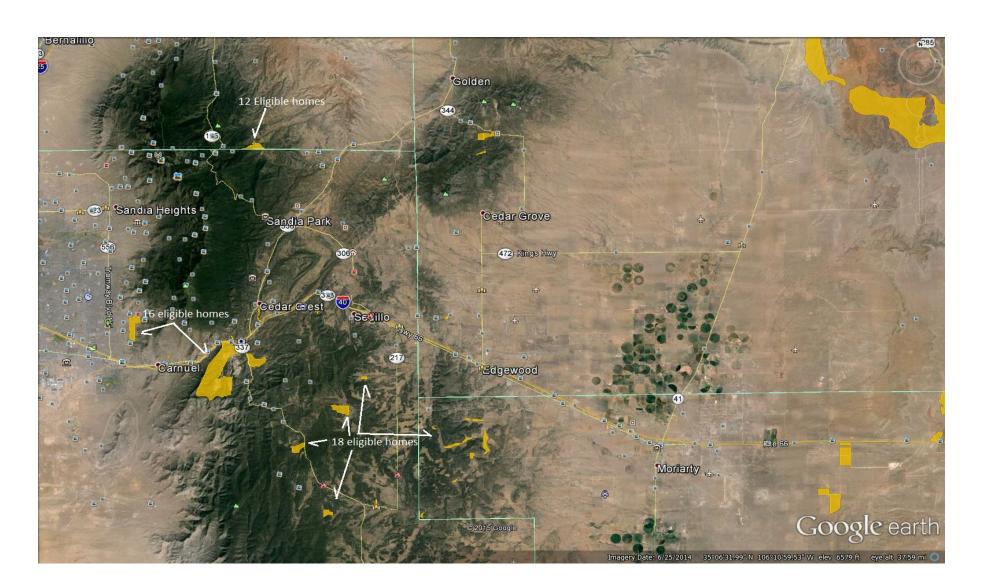
Rate of Return Carriers

(Smaller rural telcos)

- ARRA 2009 ("Stimulus Act")
- USDA RUS Grants & Loans
- NA

- If PC carriers reject
- If PC carriers reject

CAF Phase I & II "Eligible Locations"



NM Resources

Actual

Nascent PRC Broadband Fund

Potential

- Capital Outlay
- Appropriations or Earmark
- NM Tribal Infrastructure Fund
- Municipal Bonding

Sacred Wind Communications' Solution

Basic infrastructure

- \$55 Million USDA-RUS loan
 - Hardest to serve area
 - Phone: 26% -> 85% coverage
 - Broadband 0% -> 85% coverage
 - Built for 4 Mbps download

Broadband development

\$13.8 million USDA-RUS loan

- Increase capacity to 20 Mbps
- Scalable to 100 Mbps download

Fiber to Tower to Home Fiber to Copper to Home



Sacred Wind's Broadband Resource Attempts

- USDA-RUS Loan Navajo
- USDA-RUS CCG grant Navajo
- USDA-RUS CCG grant Jamestown
- ARRA stimulus grant/loan Navajo
- FCC Broadband Experiment Navajo
- USDA-CCG grant Laguna Pueblo V.2
- NM TIF grant Navajo-owned
- USDA-RUS Loan Navajo

- ✓ \$55 Million
- **√** \$436,000
- X \$350,000
- X \$8 Million
- X \$1.5 Million
- √\$3.3 Million
- X \$1.2 Million (dropped)
- ✓ \$13.8 Million

Broadband Challenges in Rural NM

- Lack of sound business case without governmental support
 - Low population density in rural areas
 - Low income populations
- Federal programs are nice, but insufficient to meet objectives
- State programs are lacking

New Mexico Infrastructure Resources

- Carriers' Capital Investments
 - 15 Local Exchange carriers
 - ½ dozen Mobile carriers
 - Cable TV Broadband in larger cities and towns
 - Independent Internet Service Providers
- Entrepreneurial or Municipal
- NM PRC Broadband Fund
- State capital outlay & Appropriations
- Tribal Infrastructure Fund

What is our objective?

Broadband available to every home?

- Define Broadband
 - 10 Mbps down load
 - 25 Mbps download
 - How much really needed?
- Define Rural
 - Target help to smallest areas

How much will this cost?

- A lot
 - Capitalize on diverse technologies
 - Wireless in more rural areas –fixed and mobile
 - It will cost a lot more to do nothing

Solutions?

Collaboration needed

- Carriers must push the technology envelope
- PRC fund needs to grow
- Legislative commitment
- City engagement
- State Transportation Dept. commitment

Legislative commitment

- Tax incentives for rural investment
- Tax incentives or seed money for technology trials
- Earmark support to PRC fund
- Provide matching money to cities
 - Require a broadband plan
- "Liberalize" rights of way for fiber cable

Bottom Line Messages

- Broadband development is up to us in NM
- Comprehensive rural coverage will take time
- Companies must venture into a mix of technologies
- State support (PRC & legislative) must follow a plan

• Broadband development will not automatically increase economies in rural areas. It is a tool, not an outcome.