



# Welcome!


Thank you for coming to discuss  
Grand Teton National Park's  
Telecommunications  
Infrastructure Plan EA



# Telecommunications Infrastructure Plan EA



## Timeline

Timeframe	Planning Activity	Status
October 2013	The National Park Service requested telecommunications providers work together and provide one proposal for the park with capacity to expand telecommunications infrastructure within the park to the south entrance of Yellowstone National Park	Complete
April 2015	The park received the initial right-of-way permit request that initiated this planning process (Environmental Assessment)	Complete
June 14 –July 14, 2017	Public Scoping	Complete
Spring 2017 – Winter 2018/19	Working with requester, National Park Service determined locations/technology with the least environmental impacts, leading to current Environmental Assessment	Complete
March – April 2019	Public review of Telecommunication Infrastructure Plan and Environmental Assessment	We are here 
June 2019	Decision Document	

# Telecommunications Infrastructure Plan EA



## **Purpose**

The National Park Service is considering the issuance of a right-of-way permit for the installation of fiber optic network and nine wireless telecommunications facilities at developed locations within Grand Teton National Park and John D. Rockefeller, Jr. Memorial Parkway and connecting to Yellowstone National Park's south entrance.

## **Need**

Telecommunications upgrades are needed to address inadequate and outdated telecommunications services required to effectively meet mission critical business operations, including safety and emergency services, resource protection, and visitor services.

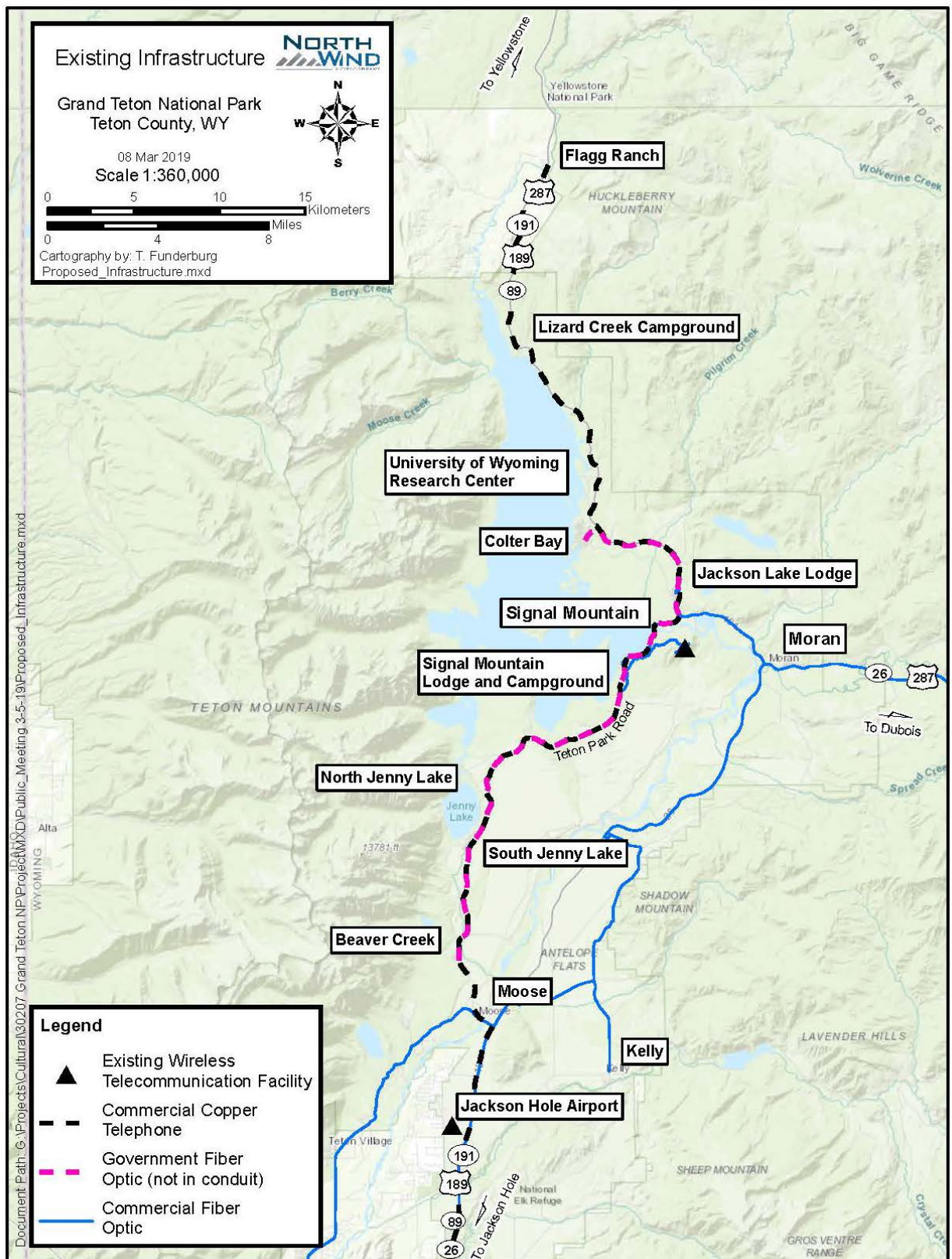


## Goals

- Improve emergency services provided by the National Park Service and its federal/county partners, including fire, law enforcement, and medical response (including 911 emergency services).
- Expand capacity, reliability, and reach of telecommunications to support park operations, including concessioner and partner operations.
- Provide cellular high speed wireless voice and data coverage to further enable the National Park Service mission and respond to visitor expectations for connectivity.
- Provide broadband telecommunications services for park and concessioner housing areas, vital for recruiting and retaining the next generation of employees.

*The intent of this plan is to provide these services in the developed areas of the park, although some spillover of wireless signals may extend into limited backcountry/wilderness areas. The plan is not intended to provide coverage to all road sections within the park.*

# Existing Fiber Optic Network and Cell Sites





# Alternatives and Designs Considered but Dismissed

- Alternate locations and designs were considered but dismissed when they had the potential to be visually intrusive; had the potential to adversely affect park cultural or other resources; or had too great an environmental impact.
- Backhaul alternatives utilizing government-owned infrastructure were considered, but the existing infrastructure was either in poor condition or could not support the new technology.
- A microwave network was considered; however, it has limited backhaul capacity, requires a microwave dish (or dishes) at each wireless telecommunications location, and requires a line of site from each location to the other (or an intermediate microwave only tower).



Original proposal at Flagg Ranch for three flagpoles.

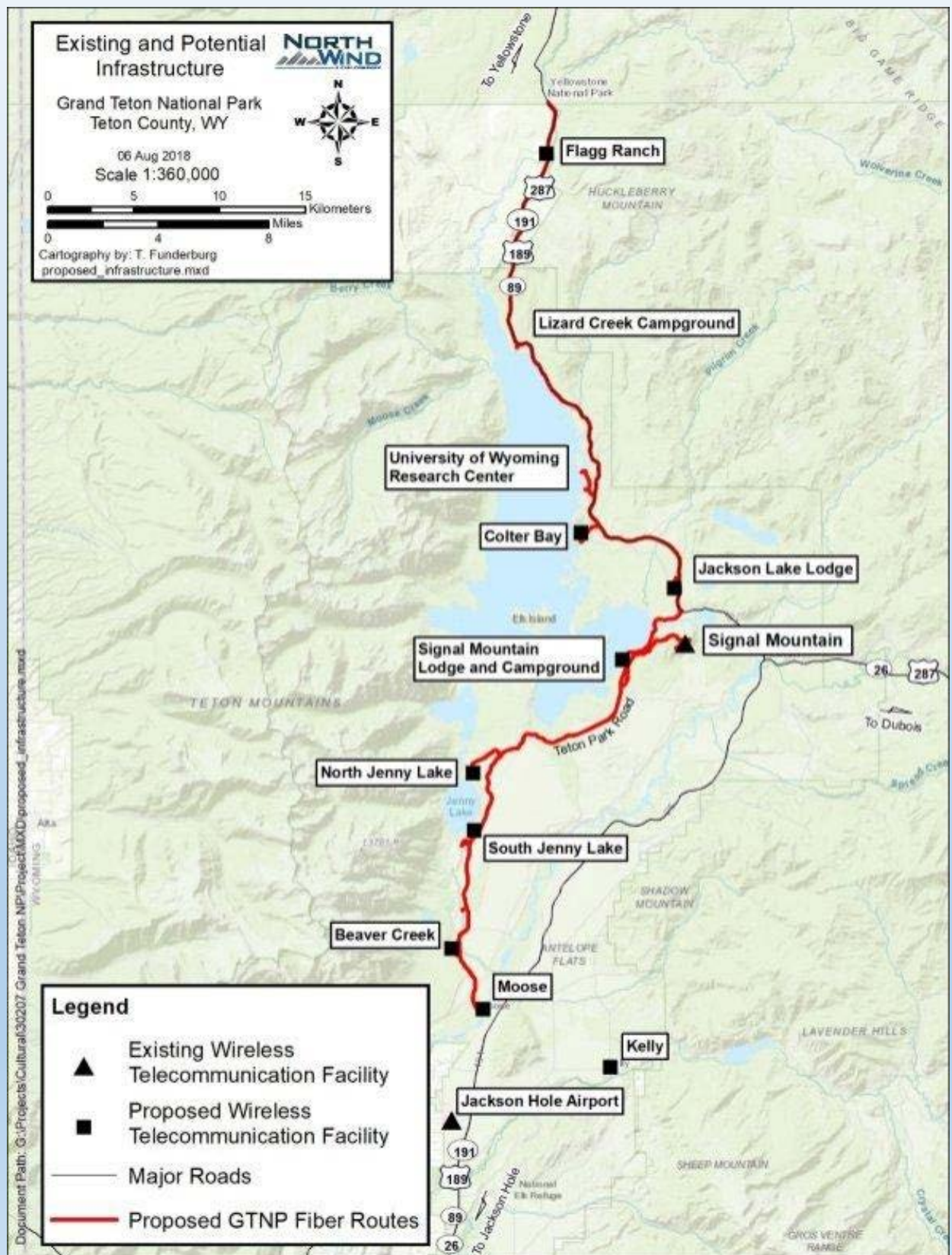


Original proposal at Kelly location with external antennas.



Examples of other types of camouflage poles from other locations.

# Proposed Fiber Optic Network and Wireless Telecommunications Facility Sites





# Photo Simulations of Proposed Monopoles and Associated Infrastructure



Flagg Ranch Sewage Treatment Site  
(Three 80-foot towers proposed)



Colter Bay Campground  
(Three 80-foot towers proposed)



# Photo Simulations of Proposed Monopoles and Associated Infrastructure



Signal Mountain Employee Housing Area  
(One 80-foot monopole proposed)



North Jenny Lake, East of Jenny Lake Lodge  
(One 80-foot monopole proposed)

# Photo Simulations of Proposed Monopoles and Associated Infrastructure



Beaver Creek Administrative Area  
(One 80-foot monopole proposed)



Moose Headquarters  
(One 80-foot monopole proposed)

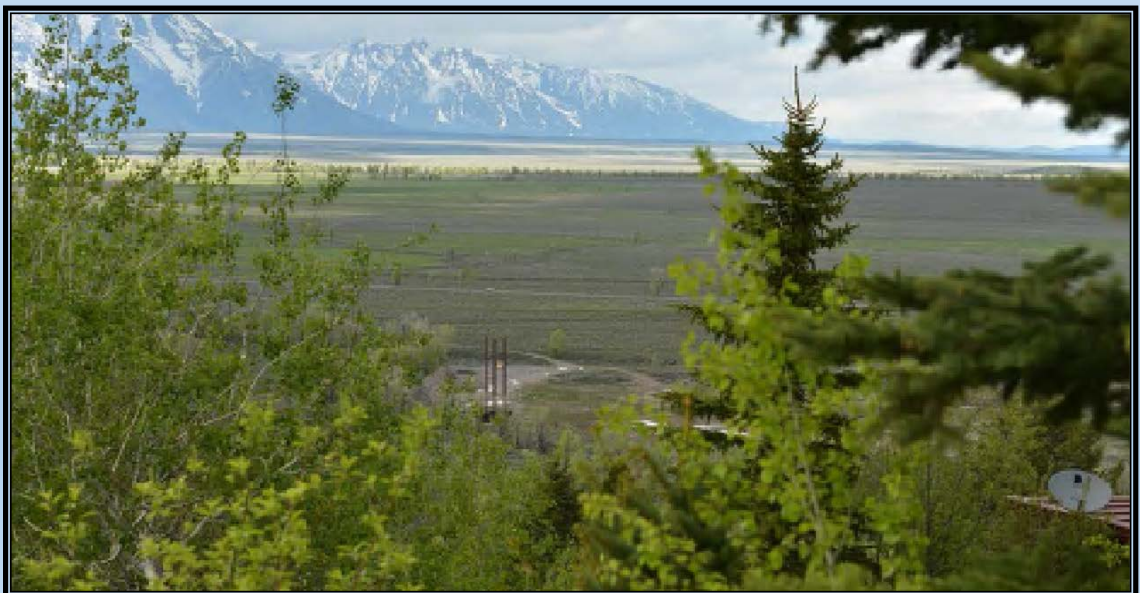


# Photo Simulations of Proposed Monopoles and Associated Infrastructure

Kelly Pit  
(Three 80-foot monopoles proposed)



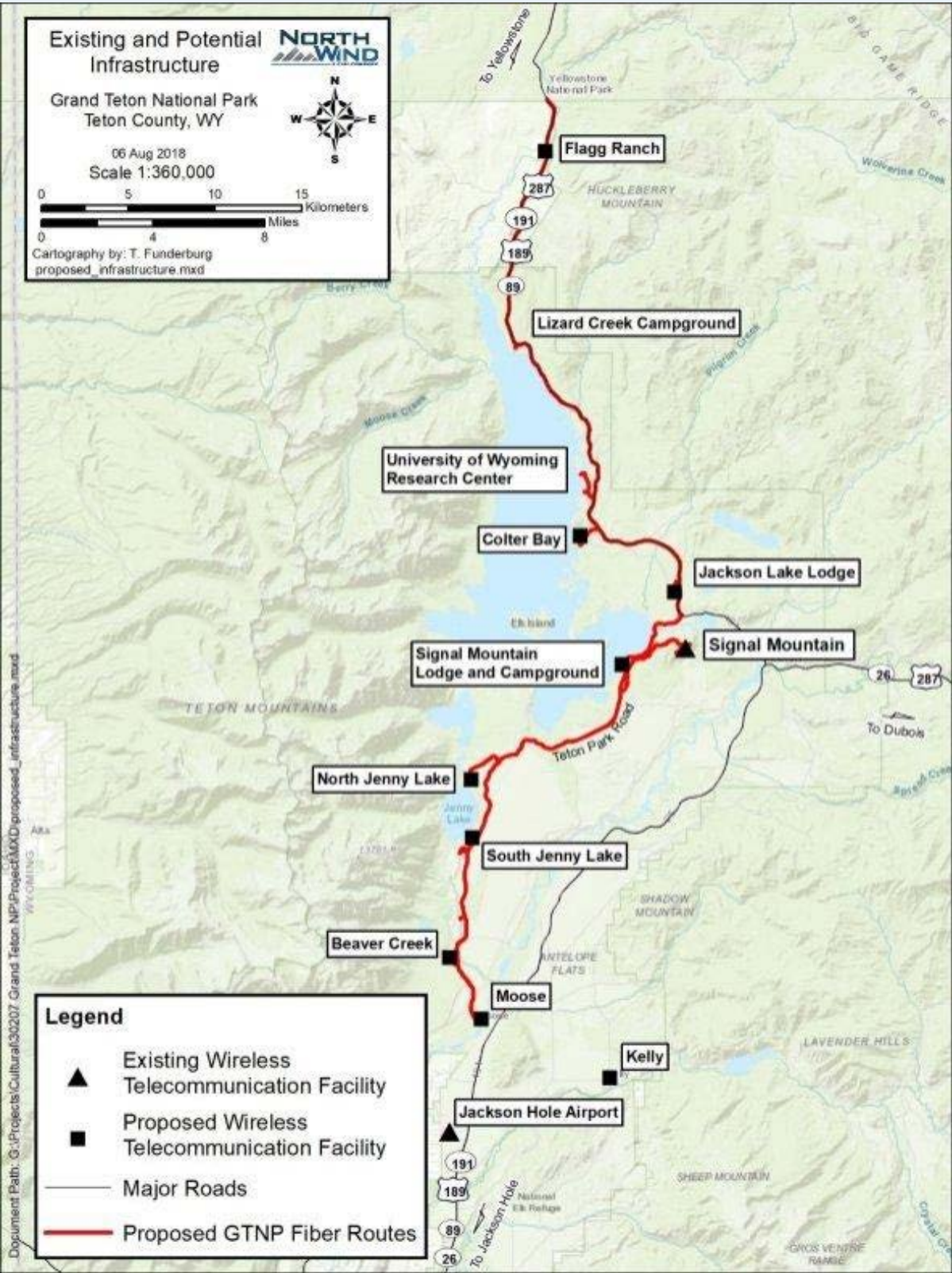
Proposed location of monopoles and equipment shelters.



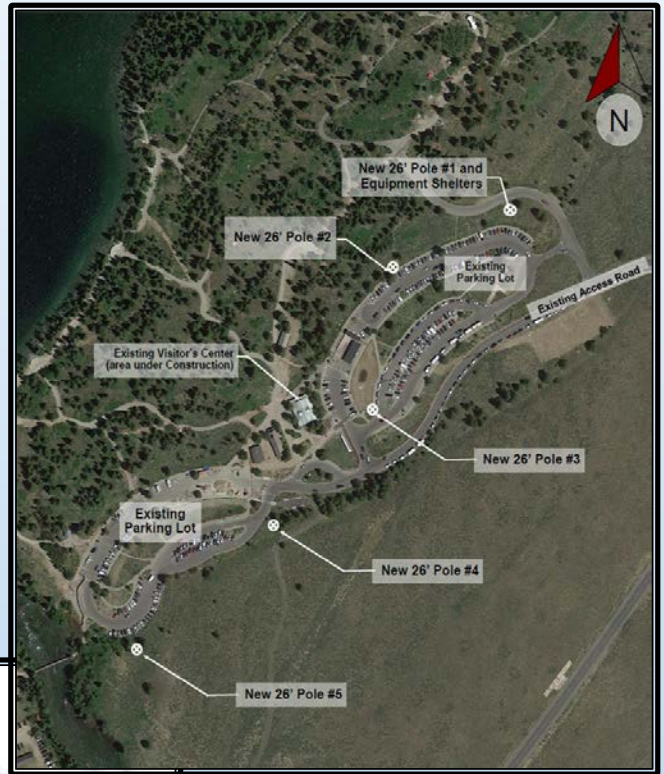
View from hillside above Kelly.



# Proposed Fiber Optic Network and Wireless Telecommunications Facility Sites



# Photo Simulations of South Jenny Lake Outdoor Distributed Antenna System (Five 26-foot poles proposed)



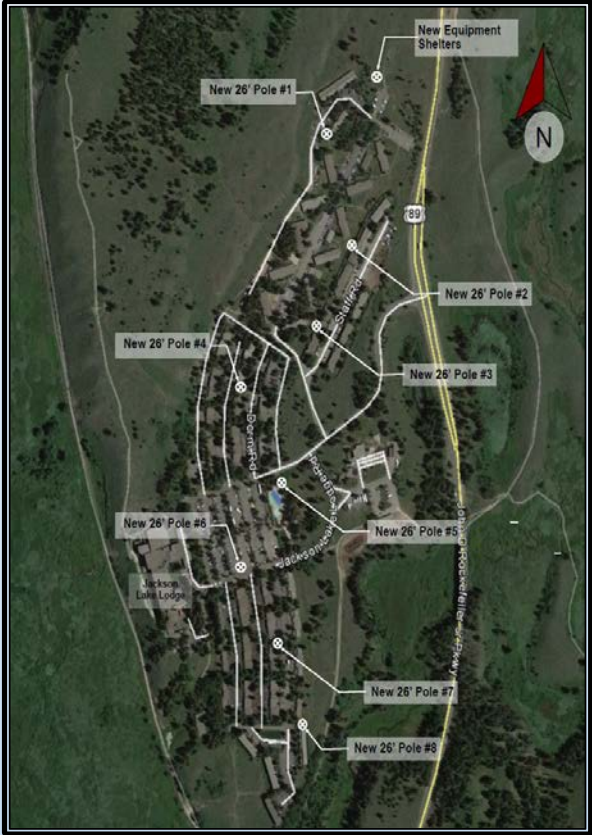
Pole #1 and Equipment Shelters



Pole #5



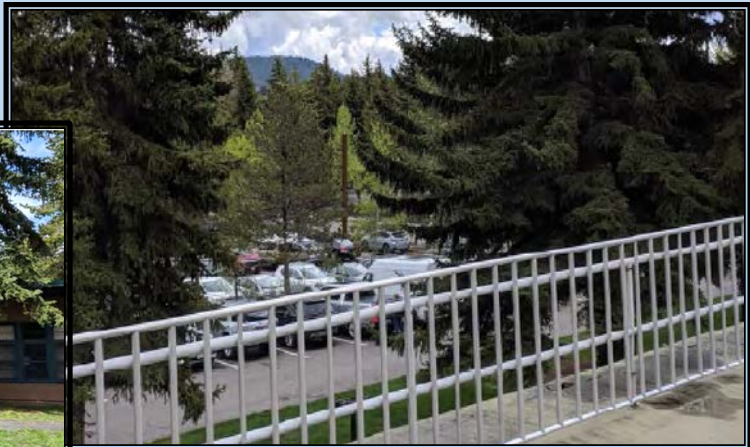
## Photo Simulations of Jackson Lake Lodge Outdoor Distributed Antenna System (Eight 26-foot poles proposed)



## Equipment Shelters



## Pole #4



## Pole #6



# Issues Analyzed

## Visual Resources

The National Park Service and the public who provided comments during the public scoping period had concerns over the visual impacts of wireless telecommunications facilities on the park's scenic landscapes.

## Cultural Resources

The proposed installation of wireless telecommunications facilities and fiber optic network has the potential to adversely affect cultural resources, including Jackson Lake Lodge, South Jenny Lake, and other park historic districts.

## Visitor Use and Experience

The proposal has the potential to enhance visitor safety; increase a visitor's ability to utilize real-time or current information for trip planning; and improve a visitor's opportunity to share personalized visitor experiences.



# Telecommunications Infrastructure Plan EA



## How to Comment

Your input is very important. In particular, the planning team is seeking input regarding the accuracy and adequacy of the information and analysis presented in the plan or that may result in changes to the preferred alternative. We encourage you to use our website to submit comments:

<http://parkplanning.nps.gov/Telecommunications>

## Response to Comments

We will review every comment submitted and prepare responses to **substantive comments**. Some responses may be reflected as edits to the text of the EA if needed to clarify existing information or add new information. The decision document will contain summaries of the substantive comments and responses to those comments in an appendix.

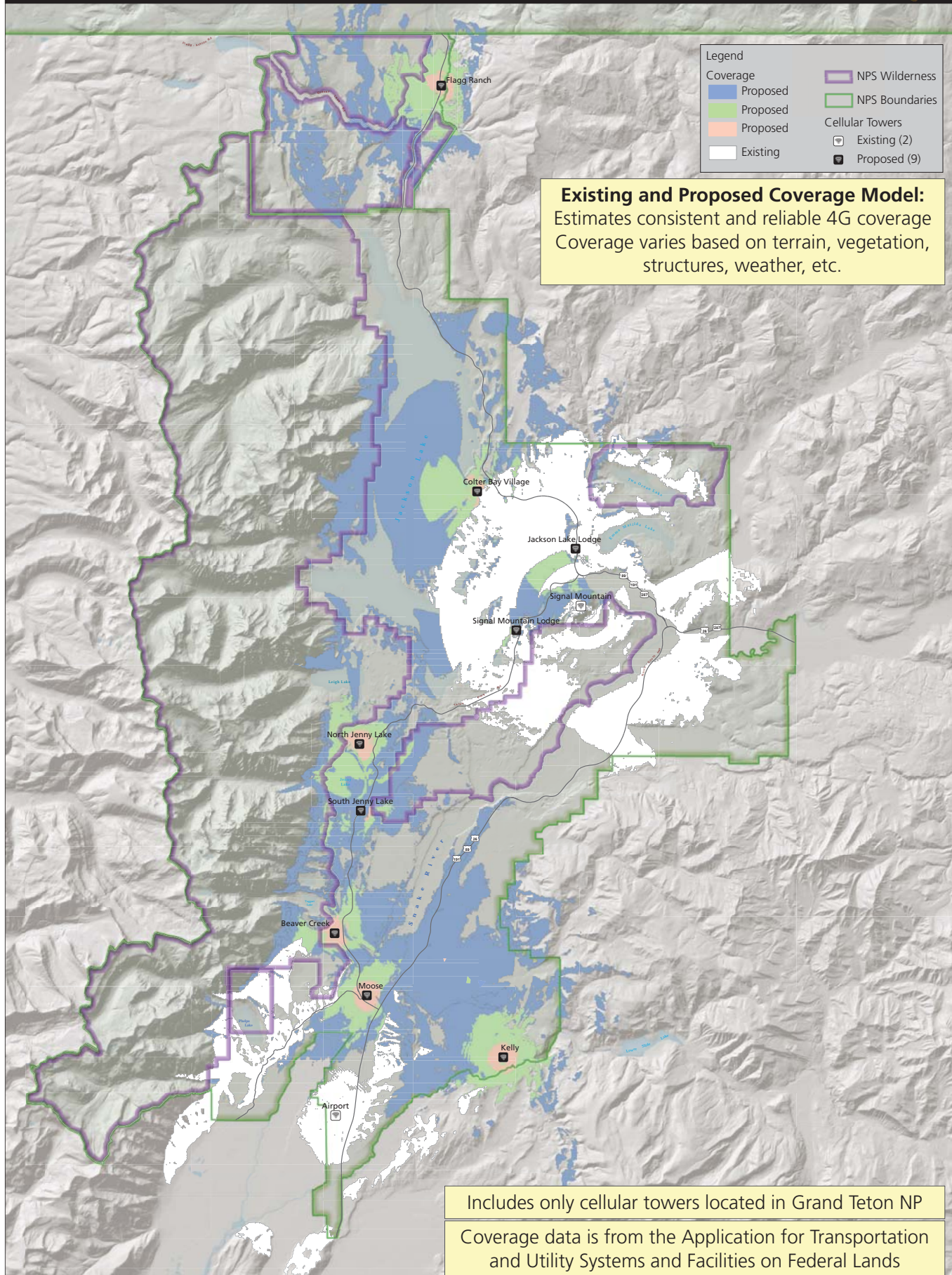
Substantive comments are defined as those that do one or more of the following:

- Question, with reasonable basis, the **accuracy** of information in the EA;
- Question, with reasonable basis, the **adequacy** of the analysis in the EA;
- **Present reasonable alternatives** other than those presented in the EA; or
- **Cause changes or revisions** to the management actions proposed in the alternatives.

# Telecommunications Infrastructure Plan/EA

## Existing and Proposed Coverage Model

Grand Teton National Park  
National Park Service  
U.S. Department of the Interior



0 20 Kilometers  
0 20 Miles

Grand Teton Geospatial Office  
March 2019  
Data Sources: NPS Park Data, ESRI Basedata,  
SF-299 Application