UniSource Energy Services



Please Sign In

Bienvenidos

(Hablamos español)

Por Favor Registrese

For more information / Para más información: www.uesaz.com/rio-rico-to-harshaw



UniSourceEnergy Services



Generation

Transmission

UniSource Energy Services

Sub-Transmission and Distribution

UniSource Energy Services

INTERACTIVE MAP STATION





See where you live in

relation to the project





UniSourceEnergy SERVICES



The Arizona Corporation Commission will consider several factors before approving a Certificate of Environmental Compatibility. These factors, used by UNS to analyze potential line routes, include:



Wildlife and plant life



Scenic areas, historic sites and archaeological sites and structures





Noise emission levels and interference with communication signals



Potential public recreational uses



Existing development plans



Engineering feasibility and challenges



Project costs and potential impacts on customer rates



Suitability Factors







Scenic Areas and Historic/Archaeological Sites **Total Environment**

Existing Development Plans

Wildlife and Plant Life

Engineering Feasibility



UniSource Energy Services

Noise Emissions/ Communication Interference

Public/Stakeholder Input







UniSource Energy Services



Pole Characteristics

Type: Tubular weathering steel monopoles

Pole height: Typically 75-110 feet

Span length: 600-1,000 feet (distance between poles)



Poles per mile: 5-9 Structures

Right of way width: Up to 100 feet



A typical weathering steel monopole supporting a 138 kilovolt transmission line

Key Observation Point (KOP) Calabasas NHS

Vicinity Map



Project Map





Notes:

- Camera Information
 Type: Canon EOS RP
 Sensor: CMOS (Full-Frame) 35.9mm x 24mm
 Lens: Canon RF 24-105mm f/4-7.1 IS STM
 Focal Length: 24mm | F-Stop: f/9 | ISO:100
 Dimensions in pixel: 6240 x 4160

KOP

- Representative View for: visitors to National Hist. Site
 Location: Mission San Cayentano de Calabasas National Historic Site
 Latitude: 31.452623° N; Longitude:110.959677° W
 View Point Elevation at Eye Level: 3,505 ft.
 Looking: south southeast
 Poles Visible: Steel Monopoles
 Image File Name: IMG_1841.JPG

- Simulation Notes
 Photo Taken: November 7, 2022 at 12:52 pm
 The image is based on a single photo and represent approximately 73.7 degree horizontal field of view.
 This view is approximately 1249 feet northwest of the nearest pole represented in the simulation.
 The simulation is based on the best information available and is preliminary. Final alignment and structure locations are subject to change based on final engineering and other factors.



Existing Conditions



Key Observation Point (KOP) #08

Vicinity Map



Project Map



КОР Кеу Мар



Notes:

- Camera Information
 Type: Canon EOS RP
 Sensor: CMOS (Full-Frame) 35.9mm x 24mm
 Lens: Canon RF 24-105mm f/4-7.1 IS STM
 Focal Length: 35mm | F-Stop: f/6.3 | ISO:100
 Dimensions in pixel: 6240 x 4160

KOP

- Representative View for: residents, commercial travelers
 Location: 500 East Ruby Road
 Latitude: 31.432876° N; Longitude:110.935920° W
 View Point Elevation at Eye Level: 3,533 ft.
 Looking: north
 Poles Visible: Steel Monopoles
 Image File Name: IMG_1137.JPG

- Simulation Notes
 Photo Taken: August 12, 2022 at 10:28 am
 The image is based on a single photo and represent approximately 54 degree horizontal field of view.
- This view is approximately 1266 feet south of the nearest pole represented in the simulation.
 The simulation is based on the best information available and is preliminary. Final alignment and structure locations are subject to change based on final engineering and other factors.



Existing Conditions



Key Observation Point (KOP) #26

Vicinity Map



Project Map



КОР Кеу Мар



Notes:

- Camera Information
 Type: Canon EOS RP
 Sensor: CMOS (Full-Frame) 35.9mm x 24mm
 Lens: Canon RF 24-105mm f/4-7.1 IS STM
 Focal Length: 50mm | F-Stop: f/9 | ISO:100
 Dimensions in pixel: 6240 x 4160

- KOP
 Representative View for: residents, commercial, and recreational travelers
 Location: East Patagonia Hwy / AZ-State Hwy 82
 Latitude: 31.473641° N; Longitude:110.820149° W
 View Point Elevation at Eye Level: 4,145 ft.
 Looking: east northeast
 Poles Visible: Steel Monopoles
 Image File Name: IMG_1379.JPG

- Simulation Notes
 Photo Taken: August 12, 2022 at 2:20 pm
 The image is based on a single photo and represent approximately 39.5 degree horizontal field of view.
 This view is approximately 750 feet west southwest of the nearest pole represented in the simulation.
 The simulation is based on the best information available and is preliminary. Final alignment and structure locations are subject to change based on final engineering and other factors.



Existing Conditions



Key Observation Point (KOP) #Flux 4

Vicinity Map





KOP Key Map



Notes:

- Camera Information
 Type: Canon EOS RP
 Sensor: CMOS (Full-Frame) 35.9mm x 24mm
 Lens: Canon RF 24-105mm f/4-7.1 IS STM
 Focal Length: 24mm | F-Stop: f/9 | ISO:100
 Dimensions in pixel: 6240 x 4160

KOP

- Representative View for: residents
 Location: 180 Flux Canyon Road
 Latitude: 31.502353° N; Longitude:110.768662° W
 View Point Elevation at Eye Level: 4,215 ft.
 Looking: west southwest
 Poles Visible: Steel Monopoles
 Image File Name: IMG_1957.JPG

- Simulation Notes
 Photo Taken: November 7, 2022 at 2:31 pm
 The image is based on a single photo and represent approximately 73.7 degree horizontal field of view.
 This view is approximately 1,334 feet east northeast of the nearest pole represented in the simulation.
 The simulation is based on the best information available and is preliminary. Final alignment and structure locations are subject to change based on final engineering and other factors.



Existing Conditions



Key Observation Point (KOP) #3

Vicinity Map



Project Map



KOP Key Map



Notes:

- Camera Information
 Type: Canon EOS RP
 Sensor: CMOS (Full-Frame) 35.9mm x 24mm
 Lens: Canon RF 24-105mm f/4-7.1 IS STM
 Focal Length: 50mm | F-Stop: f/9 | ISO:100
 Dimensions in pixel: 6240 x 4160

- KOP
 Representative View for: residents
 Location: 113 Calle Quintana
 Latitude: 31.440486° N; Longitude:110.954118° W
 View Point Elevation at Eye Level: 3,556 ft.
 Looking: north northeast
 Poles Visible: Steel Monopoles
 Image File Name: IMG_1047.JPG

- Simulation Notes
 Photo Taken: August 12, 2022 at 9:50 am
 The image is based on a single photo and represent approximately 39.5 degree horizontal field of view.
 This view is approximately 2,148 feet south southwest of the nearest pole represented in the simulation.
 The simulation is based on the best information available and is preliminary. Final alignment and structure locations are subject to change based on final engineering and other factors.



Existing Conditions



Visual Simulation - Active Link 87



Visual Simulation - Active Link 07C

Rio Rico to Harshaw 138kV Transmission Line Project UniSourceEnergy SERVICES

Electric and Magnetic Fields

Electric and magnetic fields (EMFs) are part of our everyday environment. They are emitted by power lines and other electrically powered systems that light, cool and heat our homes, provide our communications and entertainment and support other aspects of our modern lifestyle. EMFs also are produced naturally by the Earth.

research by the World Health Organization, the National Research Council, the National Institute of Environmental Health Sciences, the National Cancer Institute and other organizations, there are no confirmed health risks caused by exposure to low-level EMFs.

EMFs weaken significantly as they extend away from the source. UNS designs and builds its

For more than 30 years, scientists and researchers from universities, national laboratories, health agencies, the World Health Organization and other groups have conducted research activities into possible health effects of EMFs. According to

Typical Magnetic Field Levels at Various Distances Measured in milliGauss (mG)											
			0 inches away*	6 inches away	1 foot away	2 feet away	3 feet away	33 feet away	66 feet away	98 feet away	131 feet away
Appliances		Electric Blanket	22 mG								
		Vacuum Cleaner		300 mG	60 mG	10 mG	1 mG				
		Electric Oven		9 mG	4 mG						
	€	Hair Dryer		300 mG	1 mG						
		Microwave Oven		200 mG	4 mG	10 mG	2 mG				
		Refrigerator		2 mG	2 mG	1 mG					
		Computer & Monitor		14 mG	5 mG	2 mG					
	•••••••••••••••••••••••••••••••••••••••	Washing Machine		20 mG	7 mG	1 mG					
Power Lines	ŧ	25 kV	10 mG					5 mG	2 mG	1 mG	
	ŧ	69 kV	18 mG					6 mG	3 mG	1 mG	
	ŧ	138 kV	33 mG					22 mG	11 mG	5 mG	3mG
	ŧ	230 kV	38 mG					28 mG	15 mG	8 mG	5 mG
	ŧ	500 kV	81 mG					72 mG	51 mG	33 mG	21 mG

* Measurements taken directly beneath power lines, typically at about three feet above the ground. A milliGauss is one thousandth of a Gauss, a unit of measurement of magnetic flux density.

Source (appliances): National Institute of Environmental Health Sciences Source (power lines): BC Hydro

Learn more at uesaz.com/electric-and-magnetic-fields