

# 10. Appendix E: Critical Facilities Appendix

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This appendix contains critical facility information including type, count, and location of critical facilities in both Albany and Carbon Counties. Additionally, vulnerability to each hazard is discussed. This information is for official use only and will not be distributed to the general public.

## 10.1. Albany County

### 10.1.1. Critical Facilities Summary

There is a total of 56 critical facilities in Albany County, summarized in Table 10-1 and listed by facility type and name in Table 10-2.<sup>1</sup>

**Table 10-1 Summary of Critical Facilities in Albany County**

Facility Type	Count
Airport	1
City Building	6
County Building	7
Firehouse	17
Hospitals	1
Schools	21
Wastewater Treatment Plants	2
WYDOT Facilities	1
<b>Total</b>	<b>56</b>

**Table 10-2 All Critical Facilities in Albany County**

Facility Type	Facility Name
Airport	Laramie Regional Airport
City Building	City Building 1
City Building	City Building 2
City Building	City Building 3
City Building	City Building 4
City Building	City Building 5
City Building	City Building 6
County Building	County Building 1
County Building	County Building 2
County Building	County Building 3
County Building	County Building 4
County Building	County Building 5
County Building	County Building 6
County Building	Fairgrounds
Firehouse	Laramie Fd Station 2
Firehouse	Laramie Fd Station 1

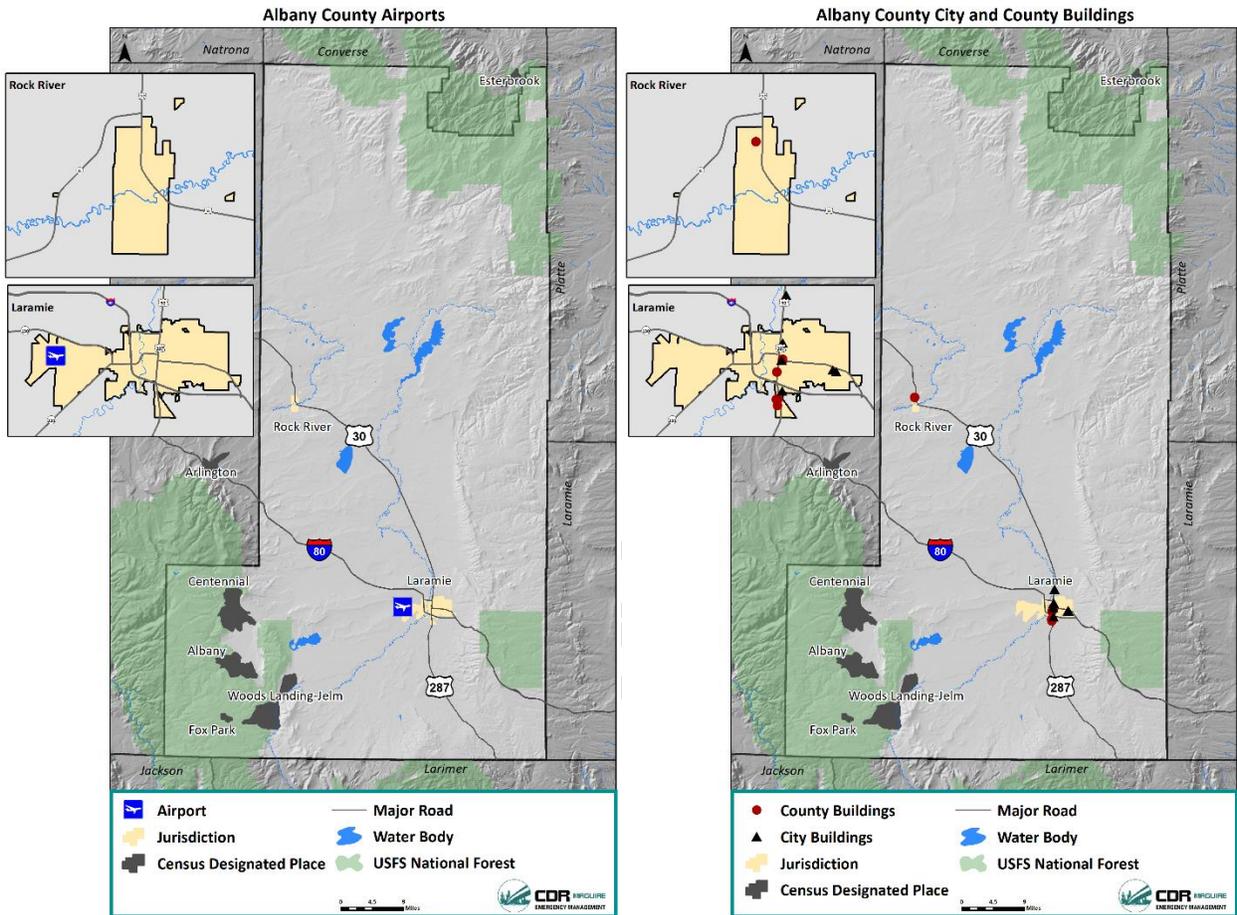
<sup>1</sup> Albany County Emergency Management

Facility Type	Facility Name
Firehouse	Little Laramie Vfd 1
Firehouse	Rock River Fire Station 1
Firehouse	Big Laramie Valley Vfd1
Firehouse	Big Laramie Valley Vfd4
Firehouse	Big Laramie Valley Vfd3
Firehouse	Garrett Fire Station 1
Firehouse	Vedauwoo Vfd1
Firehouse	Tie Siding Vfd1
Firehouse	Laramie Fd Station 3
Firehouse	Centennial Vfd Centennial
Firehouse	Centennial Valley Vfd Albany
Firehouse	Big Laramie Valley Vfd2
Firehouse	Laramie Peak
Firehouse	Sybill Canyon Vfd 1
Firehouse	Centennial Valley Vfd Buckeye
Hospital	Ivinson Memorial Hospital
School	Special Services
School	University of Wyoming
School	LCCC
School	Linford Elementary School
School	Spring Creek Elementary School
School	Beitel Elementary School
School	Snowy Range Charter School
School	Indian Paintbrush Elementary School
School	Slade Elementary School
School	Centennial Elementary School
School	Harmony Elementary School
School	Cozy Hollow Elementary
School	River Bridge Elementary
School	UW Lab School
School	Montessori Elementary School
School	Rock River School
School	Laramie Jr High School
School	Head Start
School	Laramie Sr High School
School	Whiting Sr High School
School	Wyoming Technical Institute
Wastewater Treatment Plant	Laramie Wastewater Plant
Wastewater Treatment Plant	Rock River Wastewater Plant
WYDOT	WYDOT

Facility Type	Facility Name
<b>Total</b>	<b>56</b>

Additionally, these facilities are mapped by facility type in the figures below.

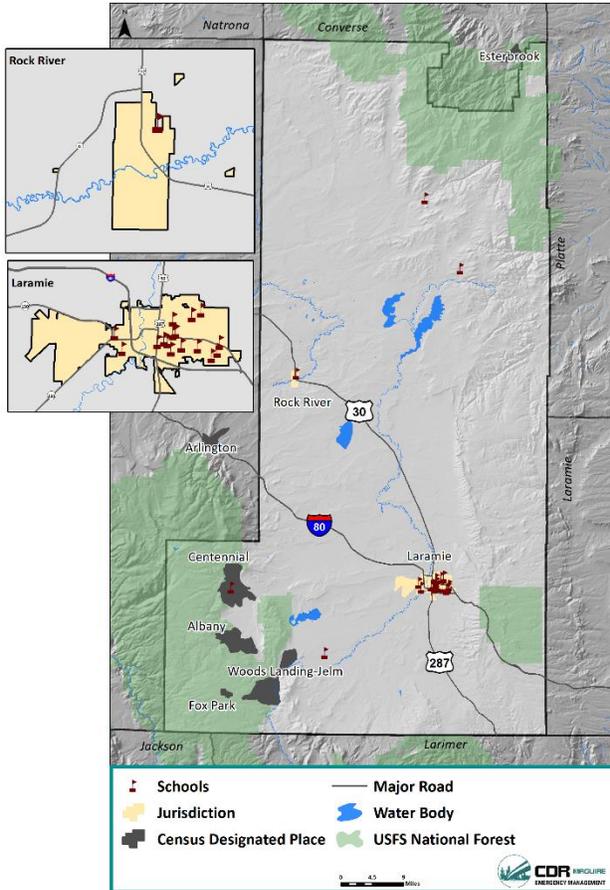
**Figure 10-1 Albany County Critical Facilities**



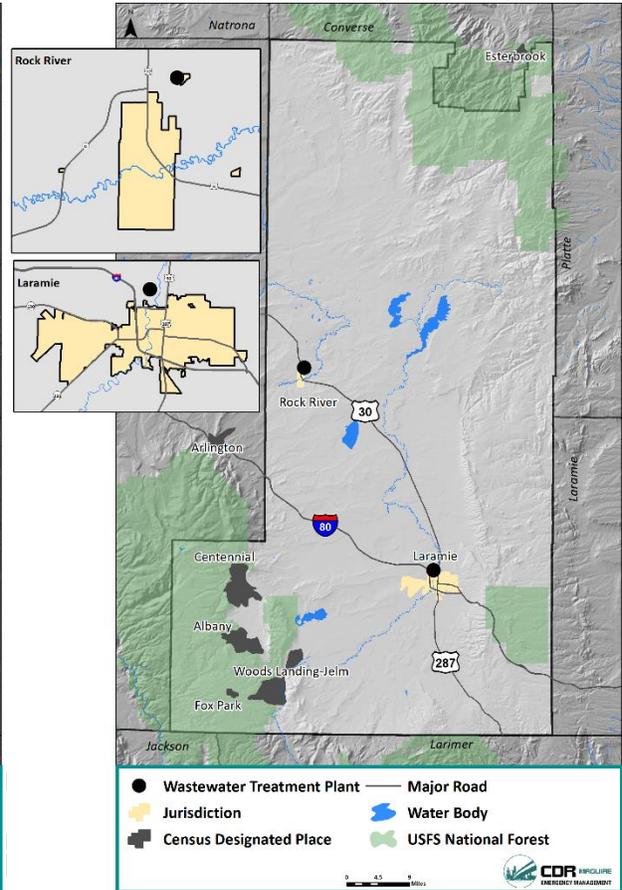
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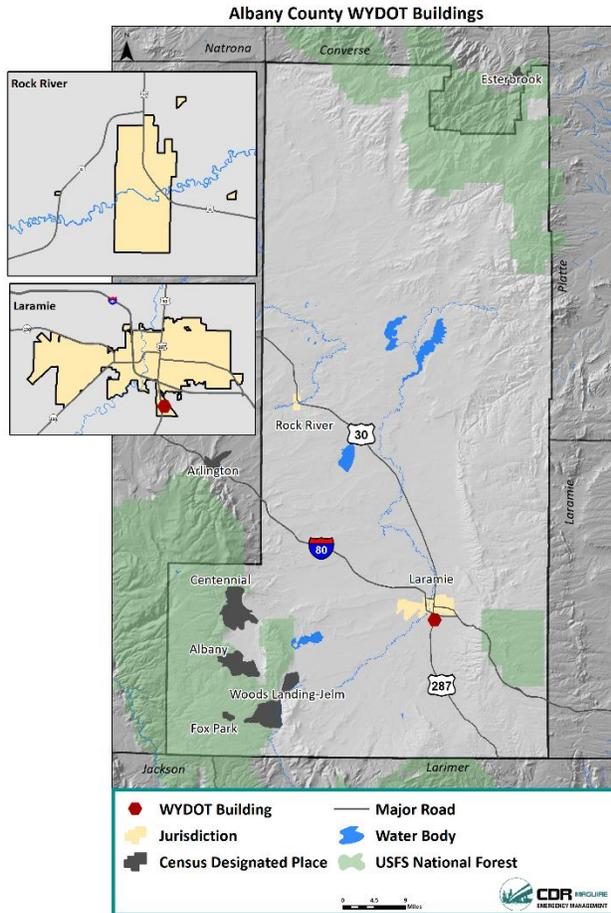
Albany County Schools



Albany County Wastewater Treatment Plants



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### 10.1.2. Avalanche

Generally, critical facilities in Albany County are not in locations that experience avalanches. However, there are five firehouses and one elementary school in the southwest portion of the County located near the Medicine Bow National Forest that may be at a higher risk to damages from an avalanche. This portion of the County is most susceptible to avalanches due to the steep terrain and heavy snowfall. If these facilities are on steeper slopes (25-50 degrees), they are at a higher risk to avalanches.

### 10.1.3. Drought

Critical facilities are not directly impacted by drought, however, all critical facilities in the planning area can be indirectly impacted. For example, drought conditions may cause water restrictions that can impact the day to day functions of a facility.

### 10.1.4. Earthquake

All critical facilities in Albany County are vulnerable to damages from an earthquake. Potential damages include cracked plaster and chimneys, broken windows, and shaken buildings. Water and wastewater utilities are particularly vulnerable to earthquakes because of the extensive network of above and below ground pipelines, pump stations, tanks, administrative and laboratory buildings, reservoirs, chemical

storage and treatment facilities.<sup>2</sup> If the wastewater treatment plants are impacted by an earthquake, significant health risks could rise, such as untreated sewage backups and overflows. Historically, northern Albany County has experienced the most previous earthquakes, so critical facilities in this region of the County may be at a higher risk. However, there are very few facilities in this area.

The Hazus 2,500-year return period probabilistic scenario that was performed for this Plan also contains loss estimates for Hazus-defined critical facilities. It is important to note that these are default critical facilities used by Hazus, not the same critical facilities that were provided by the Albany County EMA. However, they can be used as one estimate of potential damages to critical facilities from an earthquake. The Hazus-defined critical facilities for Albany County are as follows: for essential facilities, there is 1 hospital in the region with a total bed capacity of 82 beds. There are 23 schools, 5 fire stations, 4 police stations, and 0 emergency operation facilities. With respect to high potential loss facilities (HPL), there are no dams identified within the inventory. The inventory also includes no hazardous material sites, no military installations, and no nuclear power plants. The analysis did not result in any damages or loss of functionality to Hazus-defined critical facilities.

Additionally, within Hazus, the lifeline inventory is divided between transportation and utility lifeline systems. There are seven transportation systems that include highways, railways, light rail, bus, ports, ferry, and airports (light rail, ports, and ferry are not applicable to Albany County and were excluded in the table). There are six utility systems that include potable water, wastewater, natural gas, crude & refined oil, electric power, and communications. The total value of the lifeline inventory is over \$3,568 (millions of dollars). This inventory includes over 280.24 miles of highways, 95 bridges, 24,271.37 miles of pipes. The following tables summarize the damage estimates. Notable damages include the Laramie wastewater treatment plant with less than 50% functionality through day seven after the event, which is estimated to cause \$5,406,000 in repair costs. Additionally, leaks and breaks in utility pipelines are estimated to occur. Minimal households are projected to be without potable water or electric service after day one of the event.

**Table 10-3 Albany County Hazus Earthquake Expected Damage to the Transportation System**

System	Component	# Locations/ Segments	# With at least Moderate Damage	# With Complete Damage	# With Functionality >50% after day 1	# With Functionality >50% after day 7
Highway	Segments	48	0	0	48	48
	Bridges	95	0	0	95	95
	Tunnels	0	0	0	0	0
Railways	Segments	153	0	0	153	153
	Bridges	0	0	0	0	0
	Tunnels	0	0	0	0	0
	Facilities	0	0	0	0	0
Bus	Facilities	0	0	0	0	0
Airport	Facilities	1	0	0	1	1
	Runways	2	0	0	2	2

<sup>2</sup> <https://www.epa.gov/sites/production/files/2018-02/documents/180112-earthquakeresiliencguide.pdf>

**Table 10-4 Albany County Hazus Earthquake Expected Utility System Facility Damage**

System	Total #	# With at least Moderate Damage	# With Complete Damage	# With Functionality >50% after day 1	# With Functionality >50% after day 7
Potable Water	0	0	0	0	0
Wastewater	1	0	0	0	1
Natural Gas	1	0	0	1	1
Oil Systems	0	0	0	0	0
Electrical Power	0	0	0	0	0
Communication	8	0	0	8	8

**Table 10-5 Albany County Hazus Earthquake Expected Utility System Pipeline Damage**

System	Total Pipeline Length (miles)	Number of Leaks	Number of Breaks
Potable Water	12,136	418	104
Wastewater	7,281	210	52
Natural Gas	4,854	72	18
Oil	0	0	0

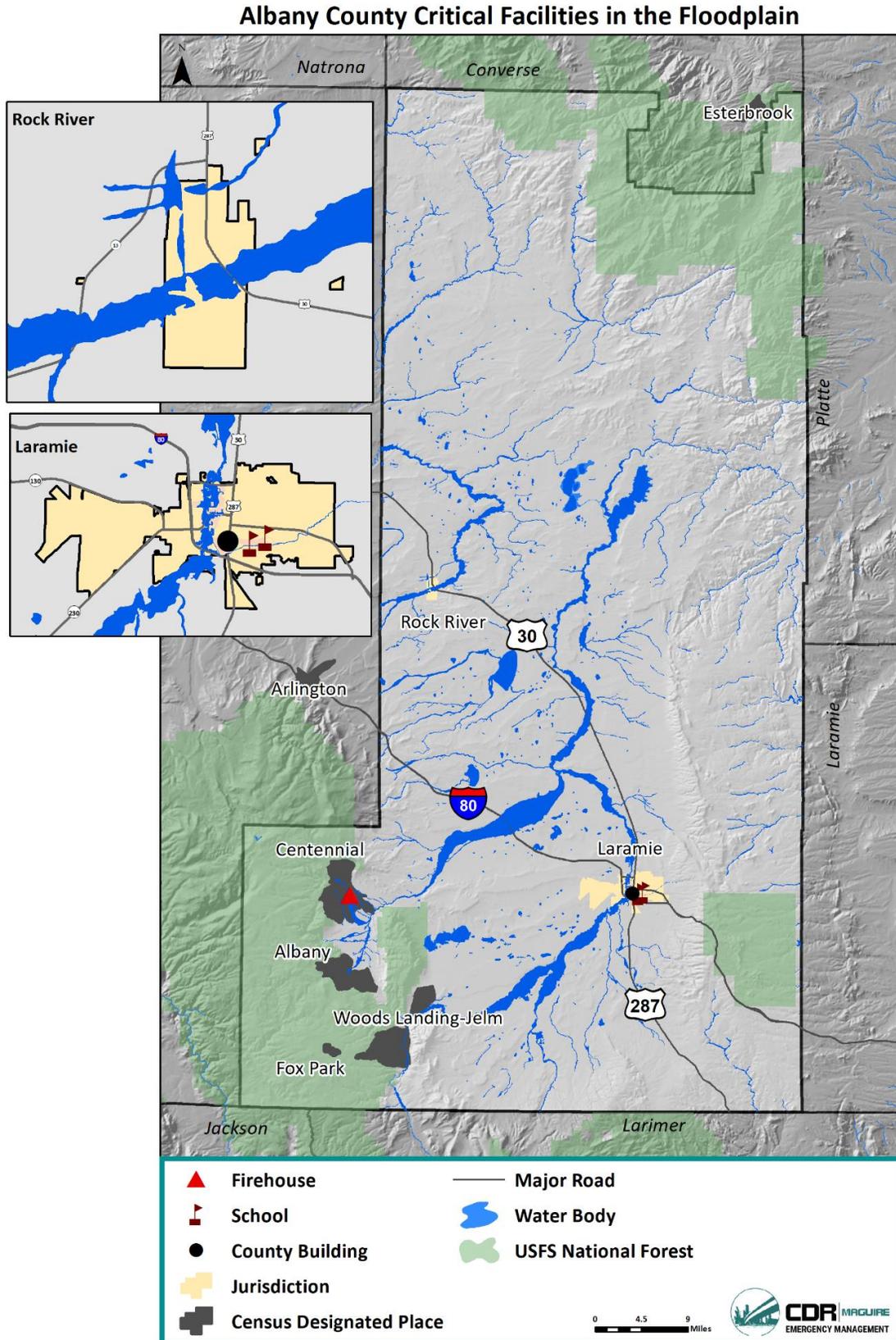
**Table 10-6 Albany County Hazus Earthquake Expected Potable Water and Electric System Performance**

System	Total # Households	# Households without Service				
		At Day 1	At Day 3	At Day 7	At Day 30	At day 90
Potable Water	15,691	3	0	0	0	0
Electric Power	15,691	0	0	0	0	0

### 10.1.5. Flood

There is one critical facility in the 100-year floodplain in Albany County, the Centennial VFD Firehouse. Additionally, there are three critical facilities in the 500-year floodplain, including one County building, Spring Creek Elementary School, and Beitel Elementary School. These facilities are mapped below in Figure 10-2. If impacted by a flood, these facilities could suffer from structural or internal damages that impair their function. However, it was noted at the planning team meeting #2 that it is unlikely that these facilities would flood during a 100 year flood event due to previous mitigation measures that have taken place.

Figure 10-2 Albany County Critical Facilities in the Floodplain



A Hazus 100-year flood scenario that was performed for this Plan also contains loss estimates for Hazus-defined critical facilities. It is important to note that these are default critical facilities used by Hazus, not the same critical facilities that were provided by the Albany County EMA. However, they can be used as one estimate of potential damages to critical facilities from a flood. The Hazus-defined critical facilities for Albany County are as follows: for essential facilities, there is 1 hospital in the region with a total bed capacity of 82 beds. There are 23 schools, 5 fire stations, 4 police stations, and 0 emergency operation facilities. With respect to high potential loss facilities (HPL), there are no dams identified within the inventory. The inventory also includes no hazardous material sites, no military installations, and no nuclear power plants. Table 10-7 shows the expected damage to Hazus-defined critical facilities. One police station and three schools are expected to have at least moderate damage, and these facilities are expected to experience loss of use due to a 100-year flood event. The estimated building and content damages to the schools total \$1,240,000.

**Table 10-7 Albany County Expected Flood Damage to Hazus-defined Critical Facilities**

Facility	Total #	# With at least Moderate Damage	# With at least Substantial Damage	# With Loss of Use
Emergency Operation Centers	0	0	0	0
Fire Stations	5	0	0	0
Hospitals	1	0	0	0
Police Stations	4	1	0	1
Schools	23	3	0	3

Additionally, based on the Hazus analysis, the Laramie Wastewater Treatment Plant would experience damage from a 100-year flood event. It is estimated to lose 19% of its function, causing \$11,968 in damages.

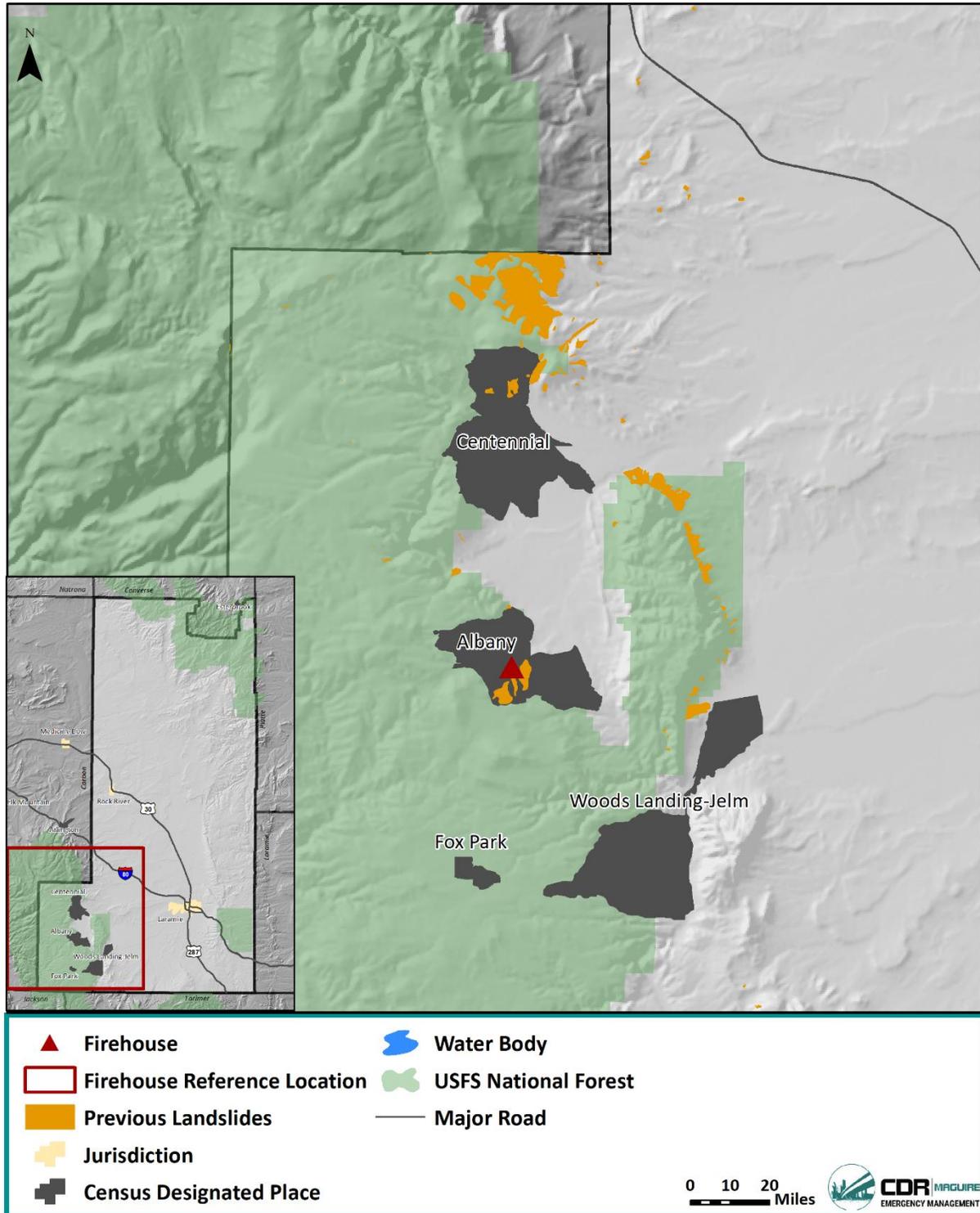
#### **10.1.6. Geologic Hazards (Landslides/Land Subsidence/Mine Collapse)**

Historically, most landslides have occurred in the southwest and northwest portions of the County. Critical facilities in these areas are more vulnerable to damages from landslides. Additionally, one firehouse, Big Laramie Valley VFD 4, is located in a zone of moderate landslide incidence. The rest of the critical facilities are located in areas of low landslide incidence.

No critical facilities are in areas that have experienced previous landslides. One firehouse, the Centennial Valley VFD Albany, is located within one-half a mile from a previous landslide, shown in Figure 10-3 below.

Figure 10-3 Albany County Critical Facilities Near Previous Landslides

**Albany County Critical Facilities within 1/2 Mile of Previous Landslide Locations**



### 10.1.7. Severe Thunderstorm (Including Lightning and Hail)

All critical facilities in Albany County are susceptible to damages from severe thunderstorms, lightning, and hail. Structural damages can be caused by thunderstorm wind or hail. Additionally, lightning has the potential to start structural fires. These damages could impact the function of critical facilities. Measures such as building codes could help reduce damages from severe thunderstorms on critical facilities.

### 10.1.8. Tornado

All critical facilities in Albany County are susceptible to damages from tornadoes. Significant damage is possible, which could impact the function of critical facilities. Measures such as building codes help to reduce the amount of damages if a tornado were to occur.

### 10.1.9. Wildland Fire

The following Table 10-8 shows critical facilities located in the WUI intermix or interface areas, based on 2010 SILVIS WUI GIS data.<sup>3</sup> SILVIS defines the WUI areas as follows:

- Intermix areas: Areas where housing and vegetation intermingle. Housing density between 6.2 and 741 structures/census block and wildland vegetation is greater than 50%.
- Interface areas: Areas with housing in the vicinity of contiguous wildland vegetation. Housing density between 6.2 and 742 structures/census block combined with wildland vegetation less than equal to 50% AND within 2.4 kilometers of areas with at least 75% wildland vegetation.

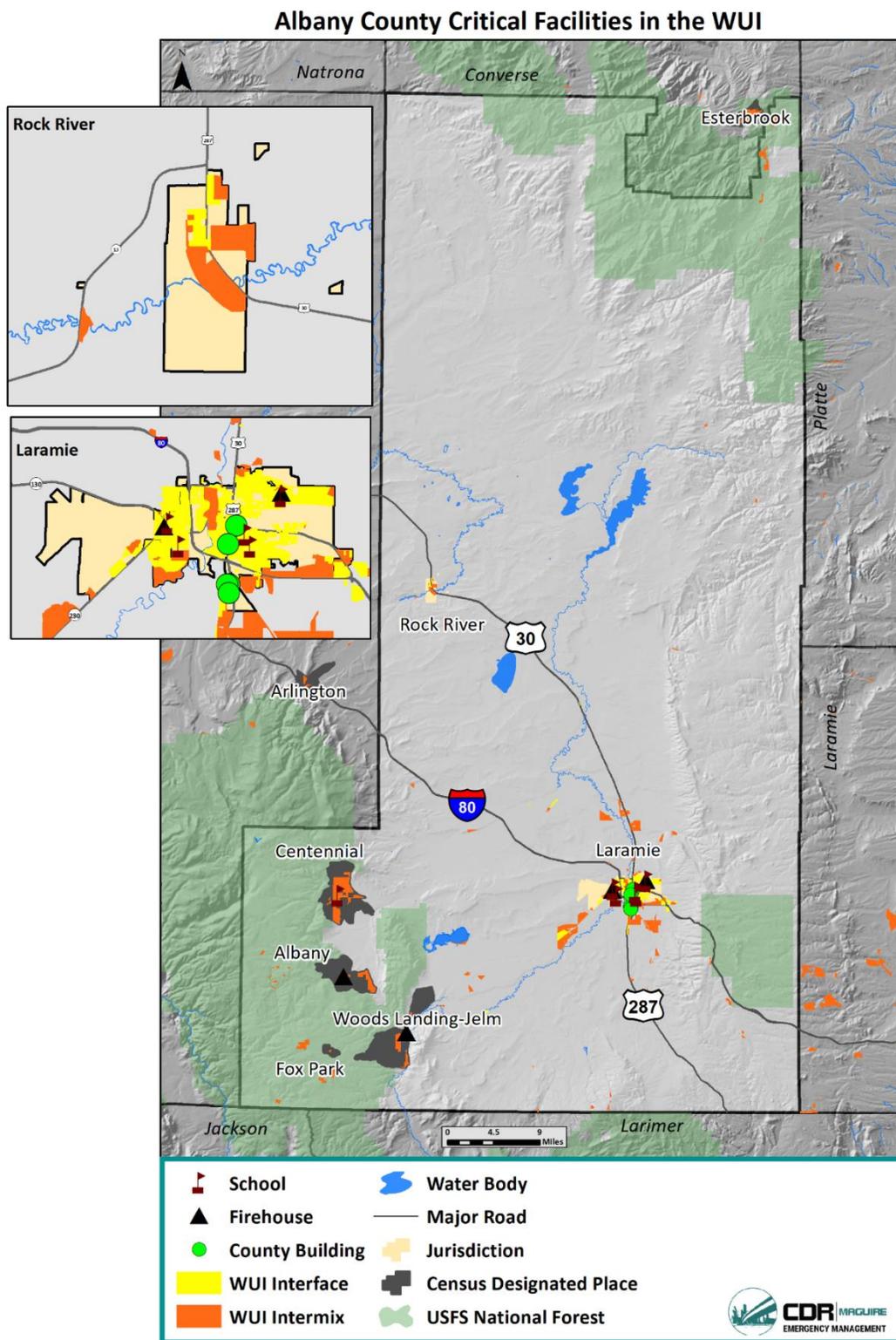
**Table 10-8 Albany County Critical Facilities Located in the WUI**

Facility Type	Facility Name	WUI Interface or Intermix
County Building	N/A	Intermix
County Building	N/A	Intermix
County Building	Fairground	Intermix
County Building	N/A	Interface
County Building	N/A	Interface
Firehouse	Centennial Valley VFD Albany	Intermix
Firehouse	Big Laramie Valley VFD 2	Intermix
Firehouse	Laramie FD Station 2	Interface
Firehouse	Laramie FD Station 3	Interface
School	Centennial Elementary School	Intermix
School	Linford Elementary School	Interface
School	Spring Creek Elementary School	Interface
School	Laramie Jr High School	Interface
School	Wyoming Technical Institute	Interface
School	Special Services	Interface
Hospital	Ivinson Memorial Hospital	Interface

<sup>3</sup> [http://silvis.forest.wisc.edu/GeoData/WUI\\_cp12/maps/gifs/black/Wyoming\\_WUI\\_cp12\\_black\\_2010.gif](http://silvis.forest.wisc.edu/GeoData/WUI_cp12/maps/gifs/black/Wyoming_WUI_cp12_black_2010.gif)

These facilities are also shown in Figure 10-4.

Figure 10-4 Albany County Critical Facilities in the WUI



Additionally, according to the CWPP, there are many high-hazard rating communities in the southwest portion of the County near the Medicine Bow National Forest. Critical facilities in this area are at a higher risk to wildfire. There are several firehouses and the Centennial Elementary School located in this area.

#### **10.1.10. Wind/Windblown Deposits**

All critical facilities are susceptible to damages from wind. Structural damage is possible, which could impact the function of critical facilities.

Although there have not been documented damages from windblown deposits, critical facilities are still susceptible to future damages. Windblown deposits are located throughout the northwest and central portions of Albany County, so critical facilities located in these areas are at a higher risk. However, there are not many critical facilities located in these areas.

#### **10.1.11. Winter Storm/Blizzard**

All critical facilities are susceptible to damages from winter storms and blizzards. Structural damage is possible, which could impact the function of critical facilities.

#### **10.1.12. Communicable and Infectious Disease**

Critical facilities are not directly impacted by communicable and infectious diseases. However, their function could be indirectly impacted if employees are infected by a communicable or infectious disease. Students and employees at the University of Wyoming in Laramie may also be at a higher risk to communicable and infectious diseases due to the high number of people in a close area that is associated with a university.

#### **10.1.13. Dam Failure**

Critical facilities located in dam inundation zones are at the highest risk to dam failure. Current dam inundation zone mapping is not currently available to allow for refined analysis.

#### **10.1.14. Hazardous Material Release**

All critical facilities are susceptible to damages from a hazardous material release. Critical facilities located near major transportation corridors, such as Interstate 80 and Highway 287, along with facilities located near the UPRR, are more vulnerable to impacts from a hazardous material release. Additionally, critical facilities that store hazardous materials, such as the wastewater treatment plants, are vulnerable. However, regulations for the storage and disposal of hazardous materials and hazardous waste help reduce the risk of a release.

#### **10.1.15. Terrorism**

All critical facilities in Albany County are vulnerable to terrorism. Critical facilities can be considered “high risk” targets for terrorism, and are more vulnerable than other structures in the County.

## 10.2. Carbon County

### 10.2.1. Critical Facilities Summary

There is a total of 32 critical facilities in Carbon County, summarized in Table 10-9 and listed by facility type and name in Table 10-10. These facilities were derived from Hazus, with verification from Carbon County Emergency Management.

**Table 10-9 Summary of Critical Facilities in Carbon County**

Facility Type	Count
Energy	6
Hospital	1
School	16
Wastewater	9
<b>Total</b>	<b>32</b>

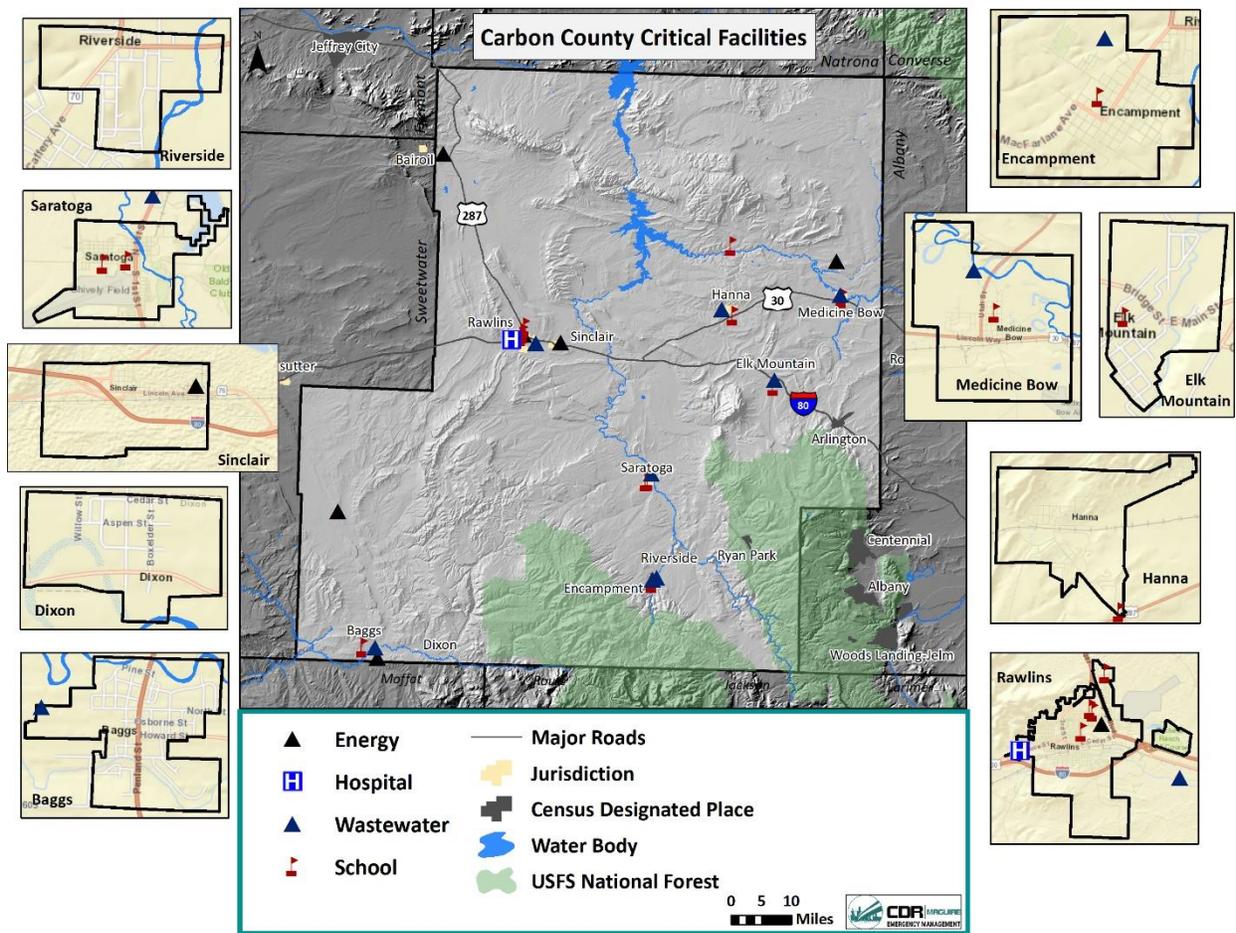
**Table 10-10 All Critical Facilities in Carbon County**

Facility Type	Facility Name
Energy	Sinclair Oil Corporation
Energy	Merit Energy Company West Side Canal Com
Energy	Santa Fe Snyder Barrel Springs
Energy	Northern Gas Co. Oil Springs
Energy	Williams Field Services
Energy	Northern Gas Bunker Hill Compress Stn
Hospital	Mem Hospital of Carbon County
School	Little Snake River Valley School
School	Rawlins High School
School	Rawlins Middle School
School	Cooperative High
School	Highland Hills Elementary
School	Encampment High School
School	Saratoga Middle School
School	Saratoga Elementary
School	Saratoga High School
School	Encampment Elementary
School	Encampment Junior High School
School	Elk Mountain Elementary
School	Hanna Elementary
School	Medicine Bow Elementary
School	H.E.M. Senior High
School	H.E.M. Junior High
Wastewater	Rawlins Wastewater Lagoon
Wastewater	Rawlins Wastewater Lagoon

Facility Type	Facility Name
Wastewater	Baggs Wastewater Lagoon
Wastewater	Encampment Wastewater Lagoon
Wastewater	Riverside Wastewater Lagoon
Wastewater	Saratoga Wastewater Lagoon
Wastewater	Elk Mountain Wastewater Lagoon
Wastewater	Medicine Bow Wastewater Lagoon
Wastewater	Hanna Wastewater Lagoon

Additionally, these facilities are mapped by facility type below in Figure 10-5.

Figure 10-5 Carbon County Critical Facilities



### 10.2.2. Avalanche

Generally, critical facilities in Carbon County are not in locations that experience avalanches. However, if facilities are on steeper slopes (25-50 degrees) in areas that receive heavy snowfall, they are at a higher risk to avalanches.

### 10.2.3. Drought

Critical facilities are not directly impacted by drought, however, all critical facilities in the planning area can be indirectly impacted. For example, drought conditions may cause water restrictions that can impact the day to day functions of a facility.

### 10.2.4. Earthquake

All critical facilities in Carbon County are vulnerable to damages from an earthquake. Potential damages include cracked plaster and chimneys, broken windows, and shaken buildings. Water and wastewater utilities are particularly vulnerable to earthquakes because of the extensive network of above and below ground pipelines, pump stations, tanks, administrative and laboratory buildings, reservoirs, chemical storage and treatment facilities. If the wastewater treatment plants are impacted by an earthquake, significant health risks could rise, such as untreated sewage backups and overflows. Historically, earthquakes have occurred throughout the County, however, the northeast portion of the County is most susceptible to the highest intensity earthquakes. Critical facilities in this region of the County may be at a higher risk.

The Hazus 2,500-year return period probabilistic scenario that was performed for this Plan also contains loss estimates for Hazus-defined critical facilities. The Hazus-defined critical facilities for the earthquake analysis in Carbon County are as follows: for essential facilities, there is 1 hospital in the region with a total bed capacity of 35 beds. There are 19 schools, 11 fire stations, 9 police stations, and 0 emergency operation facilities. With respect to high potential loss facilities (HPL), there are no dams identified within the inventory. The inventory also includes 17 hazardous material sites, no military installations, and no nuclear power plants. The analysis did not result in any damages or loss of functionality to Hazus-defined critical facilities.

Additionally, within Hazus, the lifeline inventory is divided between transportation and utility lifeline systems. There are seven transportation systems that include highways, railways, light rail, bus, ports, ferry, and airports (light rail, ports, and ferry are not applicable to Carbon County). The analysis did not result in any damage to the transportation system. There are six utility systems that include potable water, wastewater, natural gas, crude & refined oil, electric power, and communications. The total value of the lifeline inventory is over \$5,859 (millions of dollars). This inventory includes over 516.98 miles of highways, 149 bridges, 38,695.26 miles of pipes. The following tables summarize the damage estimates. Notable results include damages to wastewater, natural gas, oil systems, and communication facilities.

Additionally, leaks and breaks in utility pipelines are estimated to occur. Minimal households are projected to be without potable water or electric service after day one of the event.

**Table 10-11 Carbon County Hazus Earthquake Expected Utility System Facility Damage**

System	Total #	# With at least Moderate Damage	# With Complete Damage	# With Functionality >50% after day 1	# With Functionality >50% after day 7
Potable Water	0	0	0	0	0
Wastewater	1	1	0	0	1
Natural Gas	5	2	0	3	5
Oil Systems	1	1	0	0	1
Electrical Power	0	0	0	0	0

System	Total #	# With at least Moderate Damage	# With Complete Damage	# With Functionality >50% after day 1	# With Functionality >50% after day 7
Communication	3	0	0	3	3

**Table 10-12 Carbon County Hazus Earthquake Expected Utility System Losses**

System	Name	Estimated Repair Costs
Wastewater	Rawlins Wastewater Lagoon	\$9,326,000
Natural Gas	Merit Energy Company West Side Canal	\$124,000
Natural Gas	Santa Fe Snyder Barrel Springs	\$128,000
Natural Gas	Northern Gas Bunker Hill Compress Station	\$164,000
Natural Gas	Northern Gas Co Oil Springs	\$127,000
Natural Gas	Williams Field Services	\$153,000
Oil Systems	Sinclair Oil Corporation	\$14,000
Communication	KFNR CH 11	\$14,000
Communication	KRAL 1240	\$14,000
Communication	KIQZ CH 224	\$14,000
<b>Totals</b>		<b>\$10,078,000</b>

**Table 10-13 Carbon County Hazus Earthquake Expected Utility System Pipeline Damage**

System	Total Pipeline Length (miles)	Number of Leaks	Number of Breaks
Potable Water	19,348	852	213
Wastewater	11,609	428	107
Natural Gas	7,739	147	37
Oil	0	0	0

**Table 10-14 Carbon County Hazus Earthquake Expected Potable Water and Electric System Performance**

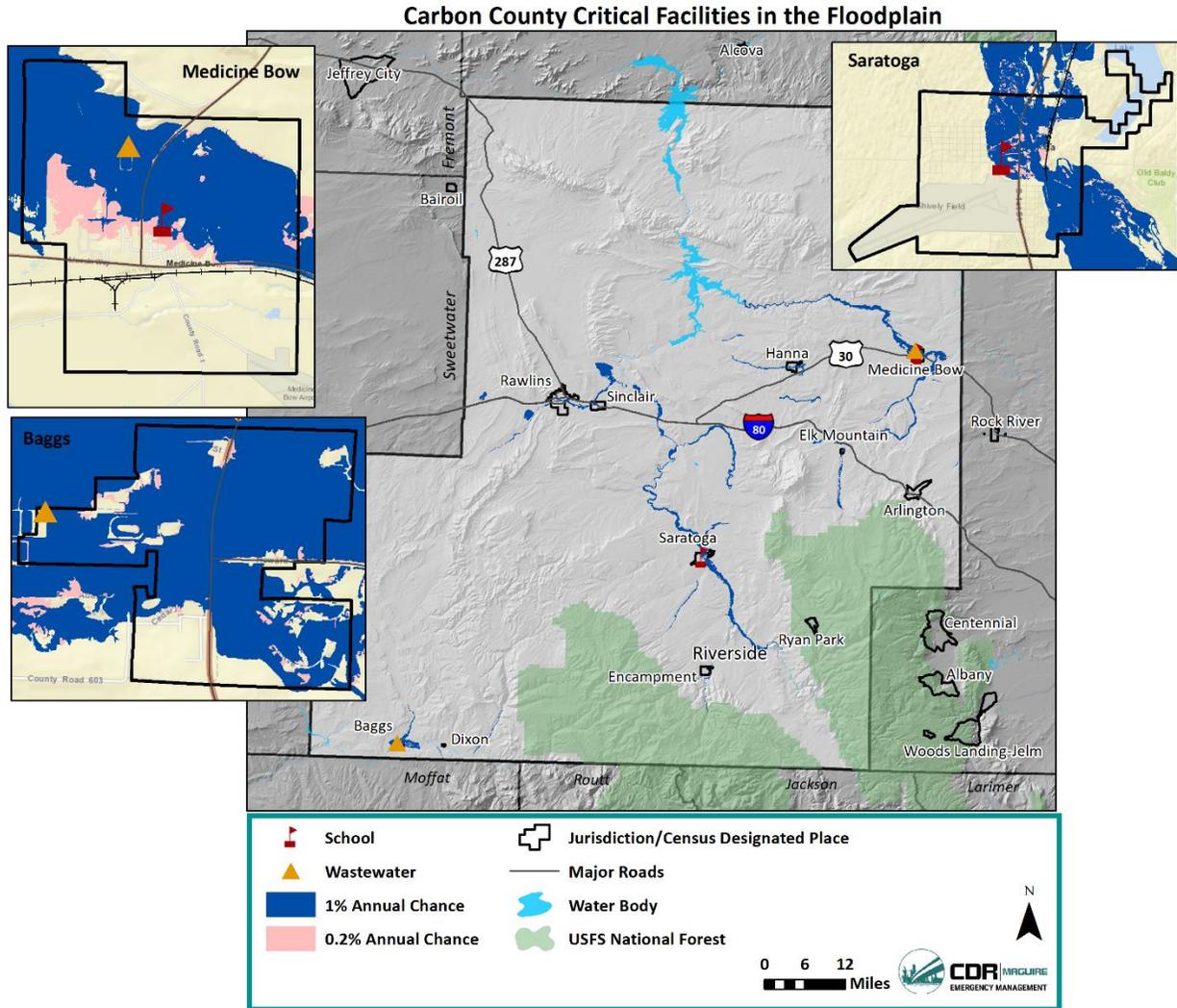
System	Total # Households	# Households without Service				
		At Day 1	At Day 3	At Day 7	At Day 30	At day 90
Potable Water	6,388	4	1	0	0	0
Electric Power	6,388	0	0	0	0	0

### 10.2.5. Flood

There are three critical facilities in the 100-year floodplain in Carbon County, the Saratoga Elementary School, Medicine Bow Elementary School, and Medicine Bow Wastewater Lagoon. Additionally, the Baggs Wastewater Lagoon is located in the 500-year floodplain. These facilities are mapped below in

Figure 10-6. If impacted by a flood, these facilities could suffer from structural or internal damages that impair their function. Flooding of a wastewater lagoon could also cause public health concerns.

Figure 10-6 Carbon County Critical Facilities in the Floodplain



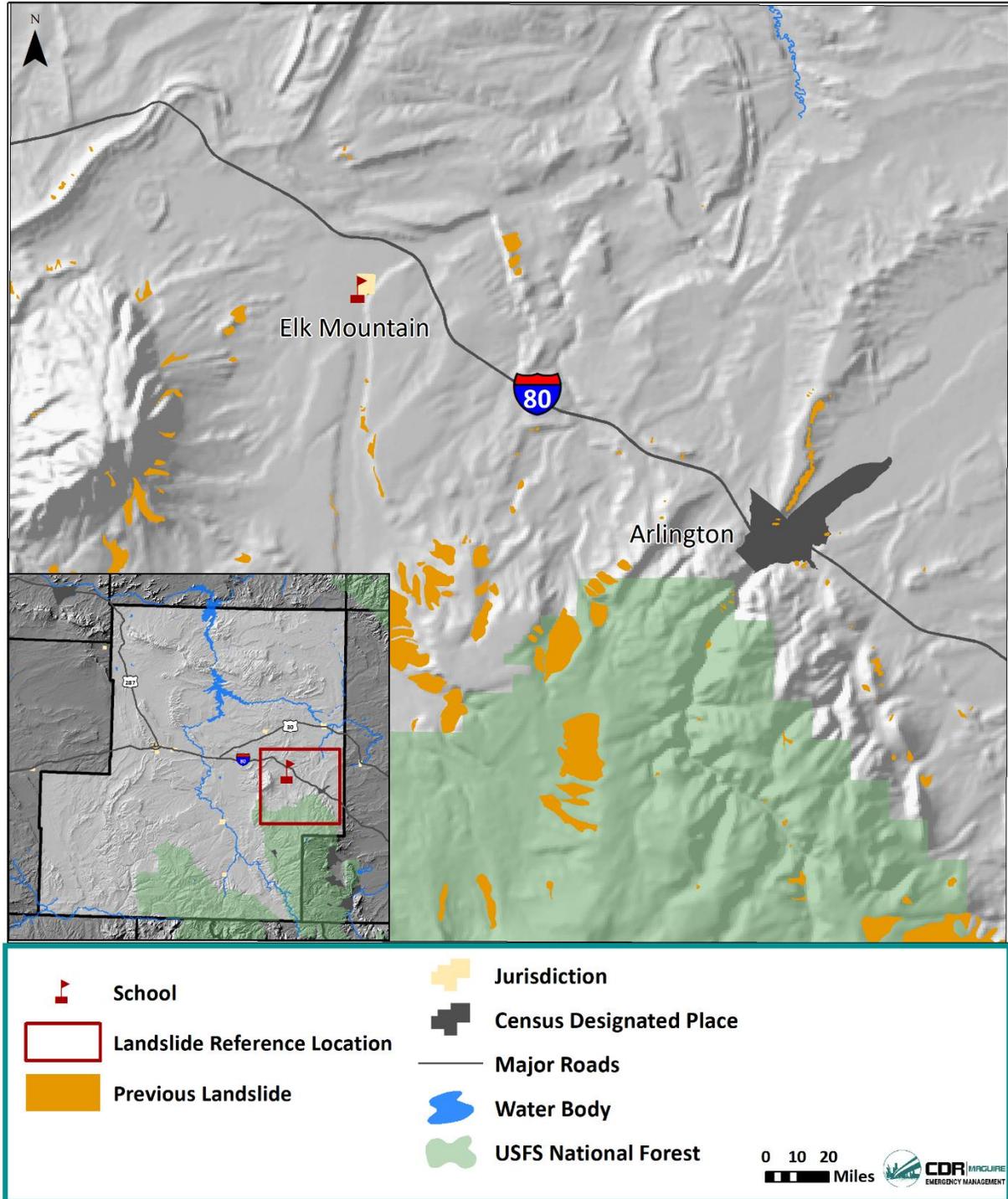
### 10.2.6. Geologic Hazards (Landslides/Land Subsidence/Mine Collapse)

Historically, landslides have occurred throughout the entire County in sloped areas, however, most critical facilities are located in areas of low landslide incidence. The Santa Fe Snyder Barrel Springs facility is the only facility located in an area of moderate landslide incidence.

No critical facilities are in areas that have experienced previous landslides. One firehouse, Elk Mountain Elementary School, is located within one-half a mile from a previous landslide, as shown in Figure 10-7 below.

Figure 10-7 Carbon County Critical Facilities Near Previous Landslides

### Carbon County Critical Facilities within 1/2 Mile of Previous Landslide Locations



### 10.2.7. Severe Thunderstorm (Including Lightning and Hail)

All critical facilities in Carbon County are susceptible to damages from severe thunderstorms, lightning, and hail. Structural damages can be caused by thunderstorm wind or hail. Additionally, lightning has the potential to start structural fires or wildfires. These damages could impact the function of critical facilities. Measures such as building codes could help reduce damages from severe thunderstorms on critical facilities.

### 10.2.8. Tornado

All critical facilities in Carbon County are susceptible to damages from tornadoes. Significant damage is possible, which could impact the function of critical facilities. Measures such as building codes help to reduce the amount of damages if a tornado were to occur.

### 10.2.9. Wildland Fire

The following Table 10-15 shows critical facilities located in the WUI intermix or interface areas, based on 2010 SILVIS WUI GIS data.<sup>4</sup> SILVIS defines the WUI areas as follows:

- Intermix areas: Areas where housing and vegetation intermingle. Housing density between 6.2 and 741 structures/census block and wildland vegetation is greater than 50%.
- Interface areas: Areas with housing in the vicinity of contiguous wildland vegetation. Housing density between 6.2 and 742 structures/census block combined with wildland vegetation less than equal to 50% AND within 2.4 kilometers of areas with at least 75% wildland vegetation.

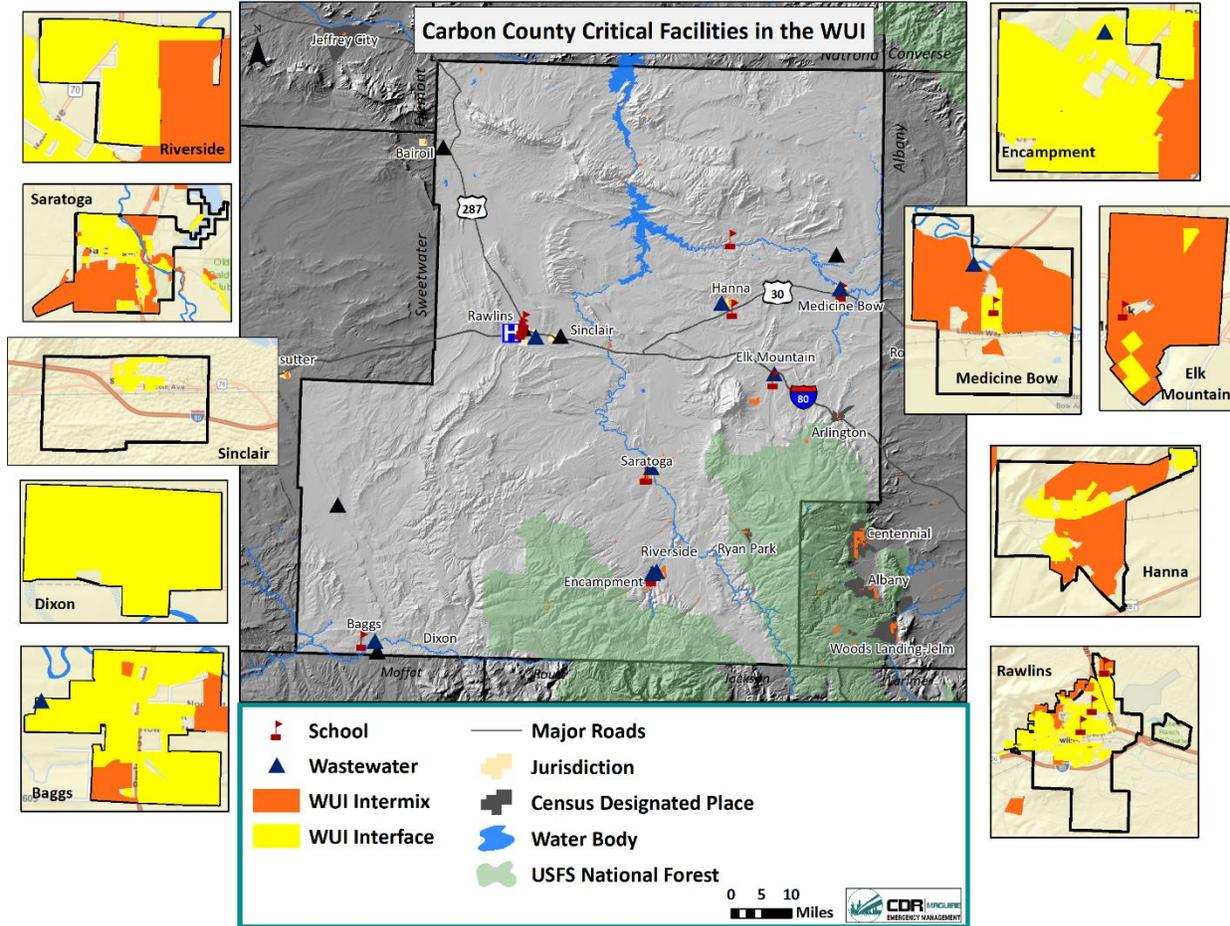
**Table 10-15 Carbon County Critical Facilities in the WUI**

Facility Type	Facility Name	WUI Intermix or Interface
School	Highland Hills Elementary	Intermix
School	Elk Mountain Elementary	Intermix
School	Rawlins Middle School	Interface
School	Cooperative High	Interface
School	Medicine Bow Elementary	Interface
Wastewater	Medicine Bow Wastewater Lagoon	Intermix
Wastewater	Baggs Wastewater Lagoon	Interface
Wastewater	Encampment Wastewater Lagoon	Interface

These facilities are also shown in Figure 10-8.

<sup>4</sup> [http://silvis.forest.wisc.edu/GeoData/WUI\\_cp12/maps/qifs/black/Wyoming\\_WUI\\_cp12\\_black\\_2010.gif](http://silvis.forest.wisc.edu/GeoData/WUI_cp12/maps/qifs/black/Wyoming_WUI_cp12_black_2010.gif)

Figure 10-8 Carbon County Critical Facilities in the WUI



Additionally, according to the CWPP, there are many high-hazard rating communities in the southeast portion of the County near the Medicine Bow National Forest. Critical facilities in this area are at a higher risk to wildfire. There are not many critical facilities in this area. However, the Encampment Wastewater Lagoon is in the vicinity and may be at higher risk.

**10.2.10. Wind/Windblown Deposits**

All critical facilities are susceptible to damages from wind. Structural damage is possible, which could impact the function of critical facilities.

Although there have not been documented damages from windblown deposits, critical facilities are still susceptible to future damages. Windblown deposits are located throughout the northwest and central portions of Carbon County, so critical facilities located in these areas are at a higher risk. However, there are not many critical facilities located in these areas.

**10.2.11. Winter Storm/Blizzard**

All critical facilities are susceptible to damages from winter storms and blizzards. Structural damage is possible, which could impact the function of critical facilities.

### **10.2.12. Communicable and Infectious Disease**

Critical facilities are not directly impacted by communicable and infectious diseases. However, their function could be indirectly impacted if employees are infected by a communicable or infectious disease.

### **10.2.13. Dam Failure**

Critical facilities located in dam inundation zones are at the highest risk to dam failure. Current dam inundation zone mapping is not currently available to allow for refined analysis.

### **10.2.14. Hazardous Materials Release**

All critical facilities are susceptible to damages from a hazardous material release. Critical facilities located near major transportation corridors, such as Interstate 80 and Highway 287, along with facilities located near the UPRR, are more vulnerable to impacts from a hazardous material release. Additionally, critical facilities that store hazardous materials, such as the wastewater treatment plants and energy-related facilities, are vulnerable. However, regulations for the storage and disposal of hazardous materials and hazardous waste help reduce the risk of a release.

### **10.2.15. Terrorism**

All critical facilities in Carbon County are vulnerable to terrorism. Critical facilities can be considered “high risk” targets for terrorism, and are more vulnerable than other structures in the County.