City of Draper

Jurisdictional Annex to the
Salt Lake County Hazard Mitigation Plan

December 2025

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City of Draper Annex

To participate in this multi-jurisdictional hazard mitigation plan (MJHMP) update for Salt Lake County (SLCo), the governing body of the city of Draper passed a formal resolution, a copy of which is maintained at the local government offices.

Planning Process Contact Information

Table 1 provides information on the point of contact during the updating of the MJHMP.

Table 1: Contact Information for the City of Draper

Name	Contact Information
Robert Lambert	**Phone:** 385-695-7199; **email:** Robert.lambert@draperutah.gov

The city of Draper has a fully integrated approach to hazard mitigation planning and program implementation. During the 2024 update process, the MJHMP participation roles in Table 2 were recorded.

Table 2: Participant List for the City of Draper

Name	Title	Jurisdiction
Robert Lambert	Battalion Chief	Draper City Fire Department
Don Buckley	Battalion Chief	Draper City Fire Department

Contact List

Table 3 lists the plan contacts and stakeholders.

Table 3: Contact and Stakeholder List for the City of Draper

Name	Title	Email	Phone	Stake-holder Type[1]	Should they receive meeting invites?	Should they complete a survey?	Should they review the draft plan?
Robert Lambert	Battalion Chief	Robert.lambert@draperutah.gov	385-695-7199	1	Y	Y	Y
Mike Barker	City Manager	Mike.barker@draperutah.gov	801-576-6322	1	N	Y	Y
Kellie Challburg	Assistant City Manager	Kellie.challburg@draperutah.gov	801-576-6513	1	Y	Y	Y
Karen Burnett	GIS Director	Karen.burnett@draperutah.gov	801-576-6552	1	Y	Y	Y
Clint Smith	Fire Chief	Clint.smith@draperutah.gov	801-824-3714	1	N	Y	Y
Steve Pearson	Deputy Fire Chief	Steve.pearson@draperutah.gov	385-296-5710	1	N	Y	Y
Rich Ferguson	Police Chief	Rich.ferguson@draperutah.gov	801-576-6338	1	N	Y	Y
Scott Cooley	Public Works Director	Scott.cooley@draperutah.gov	801-576-6565	1	N	Y	Y
Dustin Willie	Police Lieutenant	Dustin.willie@draperutah.gov	801-576-6395	1	Y	Y	Y
Robert Markle	Public Works Director	Robert.markle@draperutah.gov	801-576-6360	1	Y	Y	Y

[1] 1 – Local and regional agencies involved in hazard mitigation activities; 2 – Agencies that have the authority to regulate development; 3 – Neighboring communities; 4 – Representatives of businesses, academia, and other private organizations; 5 – Representatives of nonprofit organizations, including community-based organizations, that work directly with and/or provide support to underserved communities and socially vulnerable populations.

Jurisdiction Profile

Date of Incorporation

February 27, 1978

Location and Description

The city of Draper is located 25 minutes south from downtown Salt Lake City in the southeast corner of the Salt Lake Valley. The city is approximately 30.1 square miles in area and is approximately 4,500 feet above sea level. Draper offers a blend of suburban life and metropolitan amenities with a strong sense of community and high quality of life. The city is known for its extensive trail systems, parks, and recreational opportunities, making it a great place for outdoor enthusiasts.

Population

The 2022 American Community Survey 5-Year Estimate from the U.S. Census Bureau records the population of the city of Draper at 50,635 people. The 2020 Census reported the total population as 51,017.

Demographics

Most of the 51,017 people are between the ages of 35 and 44, with a median age of 33.6; 26,525 are males (52.4%) and 24,110 are females (47.6%). English is the primary language in 83.2% of homes, with 7.6% Spanish, and 9.2% other languages.

Brief History

Initially known as South Willow Creek, the city of Draper was first settled in 1849 by Ebenezer Brown, his wife Phoebe, and their five children. Brown and his family cultivated the land and raised cattle to sell to those heading west for the gold rush. The first post office was established in 1854 and the settlement was named Draperville in honor of William Draper, the first Presiding Elder of the Mormon Church at the time. The name was later shortened to Draper. A fort was established in 1854 where settlers stayed during the winter of 1855–1856; they ventured out in the spring to build homes and irrigation systems. The city of Draper was officially incorporated on February 22, 1978.

Climate

The city of Draper experiences a humid continental climate (Dfb Köppen classification) characterized by warm summers and cold, snowy winters with significant temperature variations during the year. Average high temperatures are approximately 85.6°F in the summer and approximately 17.1°F in the winter. Rain each year is approximately 23.8 inches, and snowfall averages 34 inches annually.

Public Services

The city organized a Draper City Emergency Preparedness Committee to look at long-range planning and preparedness.

Governing Body

The city of Draper has a part-time Mayor and a City Council that act together as the Governing Body that adopts all ordinances and resolutions. They City Manager oversees operations day-to-day operations and programs of the city.

Development Trends

Draper has a mixture of land uses: commercial, industrial, residential, agricultural, and vacant land, with 4,500 acres of open space. The open space—which has many multi-use trails and areas—is used for recreational purposes by residents of Draper and the surrounding communities. Draper is home to the main customer service center and campus of eBay, the tech call center of PGP Corporation, the call center of Musician's Friend, and the headquarters of 1-800 Contacts. Draper is also home to Utah's first Ikea store in the intermountain west, which opened in spring 2007. The Church of Jesus Christ of Latter-day Saints (Mormons) constructed a temple in Draper that was dedicated on March 20, 2009. Since 1990, Draper has experienced its greatest growth in volume and geographic extent. During this time, the city changed quickly from a rural, agricultural town into a full-fledged suburban city. Its geographical growth has largely been in the southeastern part of the city, where 75% of the new housing units have been built.

New housing is increasingly built in the fringe areas, as the central city is nearing buildout. A very large portion of this growth has been focused on a series of medium to large master planned developments spread across the southern parts of the city. The growth in business facilities (office space, warehousing, retail, and manufacturing) has been concentrated in areas east and west of the I-15 freeway and along the 123rd south corridor. This growth has included greater diversity in users and building types, more expensive construction, the import of new businesses, and the growth of existing businesses. The strongest areas for future business growth are expected to be near the major north–south corridors (along the I-15 freeway corridor from Sandy to the Point of the Mountain), the major east–west corridors (114th South, 118th South State, 123rd South, and the Bangerter Highway), and the Town Center area. The mix of businesses will probably continue to diversify and the demand for more services to meet the needs of the local population and business communities will increase.

Jurisdiction-Specific Hazards and Risk

The Calculated Priority Risk Index (CPRI) is a comprehensive assessment tool for evaluating and prioritizing risks in a given context. It considers various factors, such as probability, impact, and urgency, to determine the level of risk associated with events or situations. The results for each hazard, including its risk factor (RF) value, are shown in Table 4. The results are based on the criteria in Table 5 and the equation that follows it. The CPRI helps organizations and individuals make informed decisions about risk

management and mitigation strategies. It provides a systematic approach to identifying and addressing potential issues, allowing for a more efficient allocation of resources and proactive risk prevention. With the CPRI, stakeholders can prioritize their focus on the most critical risks, leading to more effective risk management and, ultimately, better outcomes.

Table 4: Calculated Priority Risk Index Values for the City of Draper

Type of Hazard Event	Probability of Future Events	Spatial Extent	Severity of Life/ Property Impact	Warning Time	Duration	Response Capacity	Risk Factor Value
Avalanche	1	1	2	4	2	1	1.7
Drought	2	2	2	1	4	1	2
Earthquake	2	3	4	4	3	2	3
Extreme Heat	3	2	3	1	3	1	2.5
Extreme Cold	3	2	2	1	3	1	2.2
Flooding	2	2	3	3	3	1	2.4
Landslide/ Slope Failure	2	2	2	4	1	2	2.1
Radon	3	0	2	1	4	2	2.2
Heavy Rain	3	3	2	3	1	1	2.3
High Wind	2	2	3	3	2	1	2.3
Lightning	1	1	2	4	1	1	1.6
Severe Winter Weather	4	3	2	2	2	1	2.6
Tornado	1	1	3	4	1	2	2
Wildfire	4	4	3	4	3	1	3.3
Dam Failure	1	3	3	2	2	3	2.2
Civil Disturbance	1	1	2	4	2	2	1.8
Cyberattack	2	2	3	4	3	2	2.6
Hazardous Materials Incident (Transportation & Fixed Facility)	2	2	2	4	1	1	2
Public Health Epidemic/ Pandemic	2	3	3	1	4	1	2.4
Terrorism	1	1	3	4	2	1	2

Table 5: Criteria for the Calculated Priority Risk Index

Risk Index Factor	Degree of Risk Level		Criteria	Factor Weight for Degree of Risk Level
Probability of Future Events	1	Unlikely	Less than 1 percent probability of occurrence in the next year or a recurrence interval of greater than every 100 years.	30%
	2	Occasional	1 to 10 percent probability of occurrence in the next year or a recurrence interval of 11 to 100 years.	
	3	Likely	11 to 90 percent probability of occurrence in the next year or a recurrence interval of 1 to 10 years.	
	4	Highly Likely	91 to 100 percent probability of occurrence in the next year or a recurrence interval of less than 1 year.	
Spatial Extent	1	Limited	Less than 10% of the planning area could be impacted.	10%
	2	Small	10%–25% of the planning area could be impacted	
	3	Significant	25%–50% of the planning area could be impacted.	
	4	Extensive	50%–100% of the planning area could be impacted.	
Severity of Life/Property Impact	1	Negligible	Less than 5% of the affected area's critical and non-critical facilities and structures are damaged/destroyed. Only minor property damage and minimal disruption of life. Temporary shutdown of critical facilities.	30%
	2	Limited	More than 5% and less than 25% percent of property in the affected area is damaged/ destroyed. Complete shutdown of critical facilities for more than one day but less than one week.	
	3	Critical	More than 25% and less than 50% of property in the affected area was damaged/destroyed. Complete shutdown of critical facilities for over a week but less than one month.	
	4	Catastrophic	Over 50% of critical and non-critical facilities and infrastructures in the affected area are damaged/ destroyed. Complete shutdown of critical facilities for more than one month.	
Warning Time	1	Self-defined	More than 24 hours	10%
	2	Self-defined	12 to 24 hours.	
	3	Self-defined	6 to 12 hours.	
	4	Self-defined	Less than 6 hours.	
Duration	1	Brief	Up to 6 hours.	10%
	2	Intermediate	Up to one day.	
	3	Extended	Up to one week.	

Risk Index Factor	Degree of Risk Level		Criteria	Factor Weight for Degree of Risk Level
	4	Prolonged	More than one week.	
Response Capacity	1	High	Significant resources and capability to respond to this kind of event; staff are trained, experienced, and ready.	10%
	2	Medium	Some resources and capability to respond to this kind of staff; some staff may be trained, experienced, and ready while others may need additional support.	
	3	Low	Limited resources and capability to respond to this kind of event; additional staff or staff training needed.	
	4	None	No resources and capability to respond this kind of event; additional outside support would be required.	

RISK FACTOR (RF) EQUATION

RF Value = [(Probability x 0.30) + (Spatial Extent x 0.10) + (Severity of Life/Property Impact x 0.30) + (Warning Time x 0.10) + (Duration x 0.10) + (Response Capacity x 0.10)]

Hazards with an RF value greater than or equal to 2.5 are considered high risk. Those with RF values of 2.0 to 2.4 are considered moderate risk hazards, and those with an RF value less than 2.0 are considered low risk. The highest possible RF value is 4.

Hazard Event History

Examining hazard event histories provides valuable insights to inform decision-making and help prioritize resources for risk prevention and response efforts. Table 6 lists the hazard events impacting the city of Draper since the 2019 plan update, as recorded in the Storm Events Database from the National Centers for Environmental Information.

Table 6: History of Hazard Events in the City of Draper

Type of Hazard Event	FEMA Disaster #	Date(s)	Damage or Impacts	Description
Avalanche		N/A		
Drought		N/A	Drought is a recurring problem in the region	Air quality issues, water restrictions
Earthquake	DR-4548-UT	03/18/2020	No significant damage in Draper	5.7 magnitude

Type of Hazard Event	FEMA Disaster #	Date(s)	Damage or Impacts	Description
Extreme Heat		N/A	Summers of 2020–2024	Reported 9 deaths in Northern Utah, an upward trend in heat exposure and heat-related deaths since 2015. Excessive heat can also affect infrastructure. General impacts include increased risk for heat-related illness and increased power demand for cooling systems.
Extreme Cold		N/A	Winter of 2022 and 2023	2022: 5 people experiencing homelessness died from cold-related exposure in Salt Lake City, but this threat could impact neighboring jurisdictions. Extreme cold can contribute to hypothermia and other cold-related illness/injury. Increased demand for heating systems. Potential for frozen pipes or other service disruptions.
Flooding		08/03/2023	Significant damage to drainage, creating several landslides Heavy flooding in multiple residential communities Undercutting of roadway leading to road collapse Estimated $5,500,000 in city, plus residential damage	Massive storm cell sat over Draper dropping 2+ inches of rain in approximately one hour
Landslide/ Slope Failure		04/22/2023	Two homes slid in during a landslide. Two neighboring homes were evacuated.	Heavy winter snow and water, and failure of retaining wall.
		06/18/2009, 06/21/2009	Post-fire mudslides in Corner Canyon area. The cost of damage to homes and yards is not available.	Two homes near Bear Mountain Drive were affected on the 18th, but a second mudflow was diverted between homes by a flood-prevention canal on the 21st. The second mudflow passed

Type of Hazard Event	FEMA Disaster #	Date(s)	Damage or Impacts	Description
				between the homes onto Bear Mountain Drive.
Radon		N/A	52% of homes in Draper are at or above WHO's mitigation threshold.	
Heavy Rain		08/03/2023	Significant damage to drainage, creating several landslides Heavy flooding in multiple residential communities Undercutting of roadway leading to road collapse Estimated $5,500,000 in city, plus residential damage	Massive storm cell sat over Draper dropping 2+ inches of rain in approximately one hour
High Wind		03/5/2017	$100,000 property damage.	68 mph winds
		03/13/2016	$500,000 property damage	59 mph winds
		04/22/2014		72 mph winds
		03/26/2012	Damage at shopping center. Large commercial windows blown out Extensive roof damage to several homes	$20,000 in property damage
		03/29/2009		???
Lightning		N/A		
Severe Winter Weather		01/21/2019	8 inches	
		01/19/2018	13.5 inches	
		12/13/2015	widespread power outages	
		12/19/2013	7 inches	
		3/22/2013	6 inches	
		01/27/2013	8 inches	
Tornado		N/A		
Wildfire		6/12/2014	Orson Smith Trailhead fire	
		8/15/2011	Bell Canyon Fire	
		8/8/2008	Corner Canyon Fire	680 acres burned, but no homes impacted
Dam Failure				
Civil Disturbance		N/A		
Cyberattack		N/A		

Type of Hazard Event	FEMA Disaster #	Date(s)	Damage or Impacts	Description
Hazardous Materials Incident (Transportation & Fixed Facility)		N/A		
Public Health Epidemic/ Pandemic	DR-4525-UT	03/2019	COVID-19	Temporary business closures, economic impacts
Terrorism		N/A		

National Flood Insurance Program Summary

The city of Draper participates in the National Flood Insurance Program (NFIP). Table 7 displays statistics related to the NFIP. The city of Draper does not participate in the Community Rating System (CRS).

Table 7: National Flood Insurance Program Status for the City of Draper[2]

Initial FHBM Identified	Initial FIRM Identified	Current Effective Map Date	Adopted Date	Date Joined NFIP	Tribal
N/A	12/18/85	11/19/21	2021	12/18/85	No

Table 8: National Flood Insurance Overview for the City of Draper

Community ID	Number of Losses	Total Net Payment	Active Policies	Total Coverage
490244	11	$156,544.70	21	$6,000,000

The city of Draper designated the senior engineer manager, or another engineer as designated by the city engineer, as the floodplain administrator. The city's Flood Damage Regulations were adopted on 10/19/2021. The current FIRM is dated 11/19/2021. The city requires floodplain development permits, referred to as land disturbance permits, in Draper. The Building Division is responsible for reviewing permits. Applicants are encouraged to coordinate with the city engineer before submitting a request for a land disturbance permit. Substantial damage/substantial improvements are assessed through the permitting process. In addition to submitting a permit application, Draper requires inspections before construction begins in any Special Flood Hazard Area. Permits may be denied if proper measures are not taken to mitigate risk, such as confirming with current relevant building codes in accordance with the NFIP requirements outlined in the City's Flood Damage Regulations.

[2] FHBM = Flood Hazard Boundary Map, FIRM = Flood Insurance Rate Map.

Jurisdiction-Specific Vulnerabilities and Impacts

Table 9 provides information on the vulnerable assets in the city of Draper, including its critical facilities, highlighting the city's vulnerability to identified hazards. It also describes the potential impacts on the community arising from those vulnerabilities. By understanding the risks associated with these assets, local authorities can develop proactive strategies to mitigate vulnerabilities and ensure the safety and functionality of these important assets during hazard events. These data are invaluable for decision-making and prioritizing resources for emergency response and preparedness efforts, ultimately contributing to more effective risk management and greater resilience in the community.

The Draper population of 50,017 individuals is potentially vulnerable to various hazards. Other community assets at risk include critical facilities such as 1 EOC, 3 fire stations, 1 police station, 1 hospital, and 14 schools. Community centers such as the Draper Library, Draper Senior Center, Draper Recreation Center, and outdoor recreation sites such as Whedon Farm Regional Park, South Mountain Park, Draper City Park, The Draper Outdoor Pool, South Mountain Golf Course, and Flight Park and numerous trailheads. Major transportation routes include I-15, Bangerter Highway, 12300 South, Highland Drive, Fort Street, and Traverse Ridge Road. Thirteen homes and three other historic sites in Draper are recognized on the National Register of Historic Places which are vulnerable to unique hazard impacts.

Table 9: Jurisdiction-Specific Vulnerabilities and Impacts in the City of Draper

Hazard	Vulnerable Asset	Description of Vulnerability and Impacts
Avalanche	People	*Vulnerability:* In Draper, several residential neighborhoods are located along the Wasatch Range foothills, where avalanche potential is not nonexistent. Households in these areas, particularly those with limited winter emergency preparedness, could be at risk during periods of heavy snowfall or rapid temperature fluctuations. *Impacts:* Avalanche can cause injury or death to those caught in its path. Residents who recreate in nearby backcountry terrain, including hikers and winter sports enthusiasts, may face increased danger if conditions shift unexpectedly and avalanche warnings go unheeded.
	Structures	*Vulnerability:* Homes constructed along steep slopes and in canyons within the eastern part of Draper may be exposed to avalanche risk under the right conditions. Continued development in hillside areas increases the potential for property impacts. *Impacts:* Residences with exposed elevations, poorly designed snow retention systems, or inadequate setback from natural chutes are especially vulnerable to damage from snow movement and structural loading.
	Economic Assets	*Vulnerability:* Property values and economic disruption from road closures are concerns for areas vulnerable to avalanches. *Impacts:* Properties located in or near avalanche-prone terrain could experience significant damage, reducing home values and increasing insurance premiums. Avalanches can also lead to temporary road closures on mountain access routes, such as Corner Canyon Road or other canyon trails, requiring debris removal and repairs that place

Hazard	Vulnerable Asset	Description of Vulnerability and Impacts
		financial strain on city services and disrupt commuting and recreation-based economic activity.
	Natural, Historic, and Cultural Resources	*Vulnerability:* Vegetation, habitat, and cultural sites are vulnerable to avalanches. *Impacts:* An avalanche in Draper's foothill areas could severely impact local vegetation, strip forested slopes, and damage sensitive wildlife habitats. These natural areas, which are part of the broader watershed feeding into Utah's urban corridor, may suffer long-term ecological damage. Additionally, scenic and culturally valued open spaces used by residents for outdoor activities could become inaccessible or permanently altered.
	Critical Facilities and Infrastructure	*Vulnerability:* Key infrastructure, including utility lines that cross or run along canyon corridors, could be damaged in an avalanche event. *Impacts:* Power outages, gas line ruptures, and interruptions to water delivery systems are possible if utility corridors lie within the runout zones of unstable slopes. These disruptions could affect large portions of Draper's residential areas and public services, especially those near the foothills.
	Community Activities	*Vulnerability:* Recreation opportunities are vulnerable to avalanche risk. *Impacts:* Draper residents frequently use the foothills for outdoor recreation, especially in areas like Corner Canyon and Suncrest. During or after heavy snowfall, these activities carry avalanche risk, particularly for individuals traveling off marked trails. Public trail closures and the potential for rescue operations may limit access and strain emergency response resources.
Drought	People	*Vulnerability:* All Draper residents are vulnerable to drought. *Impacts:* Drought may lead to water restrictions for residents and increased costs for water. Hundreds to thousands of residents and recreationists live and explore the foothills of Draper. High-drought seasons pose high risks of wildfires in these areas.
	Structures	*Vulnerability:* All homes are vulnerable to drought. *Impacts:* Drought increases the risk of wildfire. Hundreds of homes sit in the foothills of Draper, with estimated values in the hundreds of millions of dollars. Drought can cause the contraction of soils, which may damage walls or foundations of buildings.
	Economic Assets	*Vulnerability:* Property values are vulnerable to the impacts of drought. *Impacts:* The Draper foothills and Corner Canyon are significant attractions for building residential structures and vacationing for outdoor activities.
	Natural, Historic, and Cultural Resources	*Vulnerability:* Vegetation and the risk of wildfire are vulnerable to drought conditions. *Impacts:* Drought stresses trees and other vegetation, which may increase the risk of wildfire in the foothills or river bottoms. Several water runoffs and retention basins surround the area.
	Critical Facilities and Infrastructure	*Vulnerability:* City water resources are vulnerable to drought. *Impacts:* Drought can reduce reservoir and groundwater levels, straining water supplies for homes, businesses, and emergency

Hazard	Vulnerable Asset	Description of Vulnerability and Impacts
		services. Prolonged drought can lead to soil shrinkage and cracking, causing damage to roads, bridges, and pipelines.
	Community Activities	*Vulnerability:* Outdoor recreation activities are vulnerable to drought. *Impacts:* Drought can diminish the desirability of the outdoor environment, making it less inviting for hiking, mountain biking, running, and cross-country skiing. Fewer visitors may also affect the local economy.
Earthquake	People	*Vulnerability:* Approximately 50,000 residents and thousands of patrons could be affected if an earthquake of magnitude 7+ hits. *Impacts:* People can be injured by falling objects or trapped under collapsed structures. Residents may be displaced from their homes. Day-to day activities will likely be disrupted. Businesses may close, contributing to financial hardship for residents.
	Structures	*Vulnerability:* All Draper structures are vulnerable to earthquakes. Unreinforced masonry and other older structures are more susceptible to damage. Much of Northwest Draper has moderate liquefaction susceptibility, which increases the vulnerability of structures. *Impacts:* The 5.8 magnitude earthquake in Magna on March 18, 2020, caused minor damage to several city buildings and residential structures. In a large earthquake, structural damage could be widespread and may require costly repairs that can take months or years to complete.
	Economic Assets	*Vulnerability:* Large commercial shopping centers and restaurants located in Draper are vulnerable to earthquakes. *Impacts:* Many businesses may experience losses from building damage or damage to equipment or inventory. Businesses may be closed due to interruptions of power, utility, or other services.
	Natural, Historic, and Cultural Resources	*Vulnerability:* Riparian ecosystems are vulnerable to earthquakes. *Impacts:* Earthquakes can potentially disrupt the Draper river bottom and its ecosystems.
	Critical Facilities and Infrastructure	*Vulnerability:* Most city facilities would be affected by an earthquake, including City Hall, fire stations, public works, and school facilities in Draper. *Impacts:* An earthquake is likely to cause physical damage to multiple critical facilities and damage infrastructure such as power, transportation, and utility systems.
	Community Activities	*Vulnerability:* All community events and activities are vulnerable to disruption from earthquakes. *Impacts:* Day-to-day activities, education, business, government operations, and recreational outdoor activities would be disrupted.
Extreme Heat	People	*Vulnerability:* All residents are vulnerable to extreme heat. Some groups face higher risks, such as 3,200 residents over 65; 16,000 under the age of 18; 2,200 with disability status; and 2,400 living below the poverty line. *Impacts:* Extreme heat can cause heat-related illnesses, such as dehydration, heat exhaustion, and heat stroke. Vulnerable groups may find it extremely difficult to access alternative means of cooling during

Hazard	Vulnerable Asset	Description of Vulnerability and Impacts
		times of extreme heat. Residents may face financial hardship from increased costs associated with cooling.
	Structures	*Vulnerability:* All structures are vulnerable to extreme heat. *Impacts:* Prolonged heat exposure can weaken building materials, causing cracks in concrete, warping of wood, and deterioration of roofing materials.
	Economic Assets	*Vulnerability:* All businesses are vulnerable to the impacts of extreme heat. *Impacts:* Businesses may face increased energy costs and reduced worker productivity due to heat-related stress.
	Natural, Historic, and Cultural Resources	*Vulnerability:* Vegetation, parks, forests, historical sites, and cultural sites are vulnerable to extreme heat. *Impacts:* Extreme heat can dry out vegetation, increasing wildfire risks that can destroy forests, parks, and historic sites. Outdoor events and supporting events may need to be postponed or canceled due to heat risks.
	Critical Facilities and Infrastructure	*Vulnerability:* Power systems, transportation networks, and water systems are vulnerable to extreme heat. *Impacts:* Increased use of air conditioning can overload the power grid. Extreme heat can cause roads to soften, crack, or buckle, creating transportation hazards. Prolonged extreme heat can also increase water demand while leading water reservoirs to evaporate faster, putting pressure on water systems.
	Community Activities	*Vulnerability:* Outdoor recreation and city events are vulnerable to extreme heat. *Impacts:* Outdoor activities may become more dangerous due to the risk of heat exhaustion, heatstroke, and dehydration. Parks, hiking trails, and outdoor facilities may see decreased activity. Summer markets, sports, and outdoor events may be canceled.
Extreme Cold	People	*Vulnerability:* All residents are vulnerable to extreme cold. Residents who face higher risks include 3,200 residents over 65; 16,000 under the age of 18; 2,200 with disability status; and 2,400 living below the poverty line. *Impacts:* Extreme cold can lead to hypothermia or frostbite. These groups may find it extremely difficult to access alternative means of heating during times of extreme cold.
	Structures	*Vulnerability:* All structures are vulnerable to extreme cold. Older buildings that have seen more wear may be more vulnerable. *Impacts:* Water in pipes can freeze and expand, causing pipes to burst. Heavy snow accumulation can also collapse roofs, especially on older/weaker structures. Freeze–thaw cycles can also weaken building foundations and cause cracks in roads, bridges, and sidewalks.
	Economic Assets	*Vulnerability:* All businesses are vulnerable to the impacts of extreme cold. *Impacts:* Extreme cold can lead to temporary closures of businesses and community activities. High heating demand can also raise energy costs for businesses and residents.

Hazard	Vulnerable Asset	Description of Vulnerability and Impacts
	Natural, Historic, and Cultural Resources	*Vulnerability:* Wildlife is vulnerable to extreme cold conditions. *Impacts:* Extreme cold can impact local wildlife by reducing food sources.
	Critical Facilities and Infrastructure	*Vulnerability:* Power and heating, transportation systems, water systems. *Impacts:* Increased demand for electricity and natural gas for heating can overload systems. Transportation can also be disrupted due to secondary hazards, leading to closures, accidents, and delays. Lower temperatures can also freeze water infrastructure, leading to supply disruptions and costly repairs.
	Community Activities	*Vulnerability:* Community activities, schools, and public offices are vulnerable to extreme cold. *Impacts:* Extreme cold can cause schools and offices to close or delay their start. It can also reduce participation in outdoor sports/events and activities.
Flooding	People	Areas that may be impacted by thunderstorm and snowmelt flooding include the Bear Canyon Neighborhood, Springdale Way near the foothills, and Corner Canyon Creek. In addition, while the potential is small, the Jordan River, which runs west of I-15 from north to south on the west side of Draper, could overtop due to thunderstorms, severe weather, or rapid snowmelt. The following areas of mitigation interest were identified by the city of Draper and through FEMA's Geographic Information System (GIS) flood exposure analysis: • The Bear Canyon neighborhood encroaches into the natural floodplain. During high flows, certain parts of the neighborhood experience flooding along historic flow paths. • In 2011, houses along Springdale Way near the foothills experienced mudflows, flooding, and debris flow from small drainages coming off the foothills. • Along Corner Canyon Creek, downstream of I-15, commercial development in the Special Flood Hazard Area is planned. The city is considering flood detention and an irrigation facility as well as a culvert or channelization for Corner Canyon Creek at 1100 East. The Draper Elementary School is vulnerable to the 0.2% annual chance flood. *Vulnerability:* Four thousand residents might be affected during natural flooding, not including failure of storm drains and waterlines. Flooding may occur along the Jordan River, Corner Canyon Creek, Big Willow Creek, or other low-lying areas without adequate drainage. *Impacts:* Fast-moving floodwaters are dangerous and can sweep people away. Floodwaters can also spread waterborne contaminants.
	Structures	*Vulnerability:* Hundreds of residential homes, and some commercial buildings and schools, are vulnerable to flooding. *Impacts:* Flooding can cause extensive damage to foundations, walls, and contents of buildings, and in some cases can lead to complete destruction of structures.
	Economic Assets	*Vulnerability:* Businesses located in or near flood hazard zones are vulnerable to flooding.

Hazard	Vulnerable Asset	Description of Vulnerability and Impacts
		Impacts: Commercial buildings can be damaged and require costly repairs. Closures during the initial incident and throughout the recovery phase can contribute to lost revenue.
	Natural, Historic, and Cultural Resources	*Vulnerability:* Habitats near waterways and areas prone to erosion are vulnerable to flooding. *Impacts:* Excessive water can erode soil, destabilize hillsides, and increase the risks of landslides in mountainous and foothill areas.
	Critical Facilities and Infrastructure	*Vulnerability:* School and commercial buildings, stormwater systems, roads, and utility systems are vulnerable to flooding. *Impacts:* Storm drains may be overwhelmed. Floodwater can damage roads and utilities and disrupt emergency response from police, fire, and EMS.
	Community Activities	*Vulnerability:* Community events, recreation, daily activities of work and school are vulnerable to flooding. *Impacts:* Flooding can cause extensive damage to roadways, homes, workplaces, and open spaces like parks. These disruptions may affect many events and day-to-day activities.
Landslide/ Slope Failure	People	*Vulnerability:* Moderate landslide susceptibility is found throughout the eastern and southern areas of Draper in the foothills of the Wasatch and Traverse Mountains. Some areas of high susceptibility are in the Traverse Mountains, near Suncrest. *Impacts:* Hundreds of potential residents could be affected. If landslides are fast-moving, residents can be injured or killed. Homes can be destroyed and residents displaced.
	Structures	*Vulnerability:* Hundreds of residential structures, as well as commercial and public buildings in the foothills, are vulnerable. Numerous geological hazards exist in Draper and throughout the Salt Lake Valley that could create an emergency situation or disaster. Steep mountains adjacent to the city create the potential for landslides, debris flows, rock falls, and snow avalanches. Draper has experienced landslide-debris flow in the past. Steep slopes on the eastern and southern sides of Draper also have a high potential for landslides and slope failure. Buildings along the ridgetops of some areas increase the potential for slides due to added weight and hill disturbance. Repairs to structures and roadways and stabilization of slopes can be costly. *Impacts:* Landslides and slope failures can cause extensive damage to structures, ranging from minor damage to complete loss.
	Economic Assets	*Vulnerability:* Property values and business operations are vulnerable to landslide impacts. *Impacts:* Landslides can decrease the values of residential properties near the site of landslides. Damage to businesses can contribute to overall economic losses. Damage to roads or other infrastructure may disrupt business functions if workers or customers cannot access workplaces. Damage or inaccessibility of outdoor recreation sites could also negatively impact the economy.
	Natural, Historic, and Cultural Resources	*Vulnerability:* Recreation sites are vulnerable to landslides. *Impacts:* Landslides could block access to hiking and biking trails.

Hazard	Vulnerable Asset	Description of Vulnerability and Impacts
	Critical Facilities and Infrastructure	*Vulnerability:* Roadways, drainages, retention basins, and catch basins are vulnerable to landslides. *Impacts:* Roads and other infrastructure could be damaged or blocked. Major roadways such as Traverse Ridge Road could impede access to other roads in the southeast area of the city.
	Community Activities	*Vulnerability:* Outdoor recreation businesses and leisure activities are vulnerable to landslides. *Impacts:* Corner Canyon activities, mountain biking, hiking, and cross-country skiing could be inaccessible.
Radon	People	*Vulnerability:* Draper is considered to be at moderate to high risk of radon exposure. According to utahradon.org 52% of homes tested in Draper had dangerous levels of radon. *Impacts:* Radon is the second-leading cause of lung cancer after smoking. There is a higher risk for certain populations such as children, the elderly, and those with respiratory conditions.
	Structures	*Vulnerability:* All structures in Draper are vulnerable. Structures with weaknesses are at higher risk for accumulating dangerous levels. *Impacts:* Radon enters buildings and homes through cracks in foundations, basements, and crawl spaces, exposing occupants to health risks.
	Economic Assets	*Vulnerability:* Healthcare costs are vulnerable to increases due to radon exposure. *Impacts:* Long-term exposure can lead to increased medical expenses for lung cancer treatment and respiratory issues.
	Natural, Historic, and Cultural Resources	*Vulnerability:* Historic sites and older homes are vulnerable to radon exposure. *Impacts:* Older structures may lack modern radon-resistant designs, which makes mitigation more difficult and expensive.
	Critical Facilities and Infrastructure	*Vulnerability:* Water sources are vulnerable to radon exposure. *Impacts:* Radon can dissolve into groundwater, potentially affecting well water sources.
	Community Activities	None
Heavy Rain	People	*Vulnerability:* Heavy rain could occur anywhere in Draper. Those near waterways, alluvial fans, or low-lying areas may be at risk. *Impacts:* Ideally, few people are affected by heavy rains. The ones most likely to be affected are those in flood zones and those without the economic means to recover. Heavy rain can cause flash flooding, which can lead to bodily harm if people do not avoid fast-moving waters. It can also damage homes, leading to temporary displacement.
	Structures	*Vulnerability:* Several residential structures and commercial buildings are vulnerable to heavy rain in Draper. *Impacts:* Homes and contents can be damaged, and residents may be displaced during cleanup and repairs.
	Economic Assets	*Vulnerability:* Businesses in low-lying areas or near flood zones are vulnerable.

Hazard	Vulnerable Asset	Description of Vulnerability and Impacts
		Impacts: Flooding or water damage may close businesses or damage inventory, leading to financial losses.
	Natural, Historic, and Cultural Resources	*Vulnerability:* Soil erosion and ecosystems are vulnerable to heavy rain. *Impacts:* Heavy rains can wash away topsoil, destabilize slopes, and damage local ecosystems in the foothills.
	Critical Facilities and Infrastructure	*Vulnerability:* Roads and stormwater systems are vulnerable to heavy rain. *Impacts:* Heavy rains can damage roadways, retention and catch basins, and storm drains, leading to significant recovery costs.
	Community Activities	*Vulnerability:* Outdoor recreation and sports are vulnerable to heavy rain. *Impacts:* Hiking, biking, and other outdoor activities could be dangerous due to muddy trails, landslides, or flash floods. Sporting events and other outdoor activities may be postponed or canceled.
High Wind	People	*Vulnerability:* Draper frequently experiences strong winds, particularly in areas near the Point of the Mountain, where gusts are often intensified due to local terrain. Residents in this area are exposed to sudden high wind events, including microbursts, which can pose safety risks. Outdoor workers, elderly individuals, and those without immediate access to shelter are especially vulnerable during these occurrences. *Impacts:* People can be injured or killed by blowing debris or falling trees. They can be affected by roads blocked by debris, damage to utility services, or other disruptions.
	Structures	*Vulnerability:* All structures are vulnerable to high winds. *Impacts:* Homes, businesses, and accessory structures such as carports and sheds are susceptible to wind-related damage, particularly those with older construction or lighter materials. In Draper's higher elevation neighborhoods, flying debris can break windows, damage roofing, and topple fences. Poorly anchored structures and those lacking wind-resistant features face increased risk during severe windstorms. The Mountain Shadows RV park and mobile homes may experience greater damage.
	Economic Assets	*Vulnerability:* All businesses are vulnerable to high winds. *Impacts:* Frequent wind events in Draper can disrupt local businesses by damaging signs, outdoor equipment, and storefronts. Extended power outages and structural repairs may lead to operational downtime and lost revenue. Recurrent wind-related damage can also drive up insurance premiums for both commercial and residential property owners.
	Natural, Historic, and Cultural Resources	*Vulnerability:* Parks, trees, trails, and amenities are vulnerable to high winds. Habitats, historic sites, and cultural landmarks are also at risk. *Impacts:* Gusty conditions can uproot mature trees in Draper's parks and along popular trail systems such as those in Corner Canyon. Soil erosion and trail washouts may occur on exposed ridgelines and open spaces, affecting both recreational use and wildlife habitats. Historic structures and cultural landmarks, especially those not retrofitted for high wind events, may be subject to deterioration or surface damage.

Hazard	Vulnerable Asset	Description of Vulnerability and Impacts
	Critical Facilities and Infrastructure	*Vulnerability:* Power and communication systems and transportation networks are vulnerable to high winds. *Impacts:* Strong winds can damage power poles, transformers, and overhead utility lines throughout Draper, causing electricity and communication outages. High-profile vehicles on I-15 and Bangerter Highway are vulnerable to tipping, while flights out of nearby airfields may be delayed or grounded. Critical roads may become hazardous or impassable due to downed trees or debris.
	Community Activities	*Vulnerability:* City events, sports, and recreation activities are vulnerable to high winds. *Impacts:* City-sponsored outdoor events, sports practices, and markets may be canceled or delayed when wind speeds reach unsafe levels. Damage to park facilities, stages, or tents may prevent use for days after a storm. Community engagement may be reduced if recurring wind events affect planned gatherings or recreation.
Lightning	People	*Vulnerability:* Lightning can occur anywhere in Draper, and all residents are at risk. Lightning presents a serious risk during summer thunderstorms, especially for individuals engaged in outdoor activities such as hiking, cycling, or team sports in Draper's foothills and open spaces. *Impacts:* Those caught in exposed areas without shelter face the risk of injury from direct strikes or ground currents. Children, seniors, and those unfamiliar with lightning safety may be more susceptible to harm.
	Structures	*Vulnerability:* Outbuildings, barns, and utility sheds in Draper's agricultural and rural zones are particularly vulnerable. *Impacts:* Lightning can strike buildings directly or cause fires through indirect contact, especially in homes with metal roofing or poor grounding. Surges caused by strikes can damage appliances and internal electrical systems if protective devices are not in place.
	Economic Assets	*Vulnerability:* Businesses throughout Draper are vulnerable to lightning impacts. *Impacts:* Power surges and outages resulting from lightning can interrupt business operations, damage electronic equipment, and result in costly repairs or data loss. Businesses that rely on uninterrupted power or internet access may suffer immediate financial setbacks. Outdoor attractions or venues may also face liability or cleanup costs after a strike.
	Natural, Historic, and Cultural Resources	*Vulnerability:* Vegetation, trails, historical markers, parks, and wildfire-prone areas are vulnerable to lightning. *Impacts:* Draper's open lands and foothill vegetation, particularly during dry months, are susceptible to ignition from lightning. Trees struck directly may split or fall, blocking trails or damaging nearby structures. Cultural resources such as historical markers or art installations in public parks may also be damaged by heat, fire, or debris caused by a lightning strike.
	Critical Facilities and Infrastructure	*Vulnerability:* Power, communication, and public facilities are vulnerable to lightning strikes.

Hazard	Vulnerable Asset	Description of Vulnerability and Impacts
		Impacts: Lightning strikes on power substations, communication towers, or utility poles can lead to outages across large parts of Draper. Emergency communications may be disrupted if radio or cellular infrastructure is affected. Schools, healthcare facilities, and city offices can experience temporary shutdowns if backup systems fail to activate.
	Community Activities	*Vulnerability:* Outdoor events, sports, recreation activities are vulnerable to lightning. *Impacts:* Events held outdoors may be canceled or evacuated due to lightning. Sudden thunderstorms create hazardous conditions for public gatherings, especially in areas without nearby shelter. Continued lightning threats can delay recovery efforts or reduce participation in rescheduled events.
Severe Winter Weather	People	Corner Canyon and the Suncrest Area receive large amounts of snow, which can interrupt business, including city services, such as police, fire, and public works tasks. Winter weather systems and snowstorms over northern Utah can have a dramatic effect on regional commerce, transportation, and daily activity and are a major forecast challenge for local meteorologists. This challenge is heightened in the city of Draper because of the wide variety of local climatic features, such as significant elevation changes, atypical wind patterns, and mountainous slopes located immediately adjacent to city boundaries. These local features can impact the severity of winter storms. Winter Storms additionally bring lower temperatures which can adversely impact the elderly. Additionally. Draper has a number of community members without health insurance which would impact medical care.
	Structures	Heavy snow loads can cause roofs to collapse, especially for older buildings, barns, or poorly maintained structures. Prolonged freezing temperatures can cause pipes to burst, leading to water damage. Freeze–thaw cycles can crack foundations, driveways, and roads.
	Economic Assets	Severe winter weather may shut down businesses and schools. Retail and tourism industries may see fewer customers during extreme winter weather. There will also be an increased demand for heating and electricity, raising energy costs for homes and businesses. Severe winter weather can also delay or halt deliveries, affecting grocery stores, fuel, and other essential goods.
	Natural, Historic, and Cultural Resources	Heavy snow can break tree branches, damage parks and trails.
	Critical Facilities and Infrastructure	Heavy snow can weigh down power lines, causing widespread outages and leaving homes without heat. Roads might be impassable due to snowdrifts or accidents. Buses, trains, and flights may be delayed or canceled. Emergency services may be delayed due to road conditions.
	Community Activities	Severe winter weather may force schools to close, and outdoor activities like skiing, snow shoeing, may be too hazardous. Recreational facilities and city parks may close. Homeless shelters and warming centers may see increased demand as people seek protection from the extreme cold.

Hazard	Vulnerable Asset	Description of Vulnerability and Impacts
Tornado	People	*Vulnerability:* Although tornadoes are relatively rare in Draper, the area is no stranger to strong wind events, especially near the Point of the Mountain, where wind speeds frequently exceed state and national averages. All residents are potentially vulnerable to tornadoes. *Impacts:* In the event of a tornado, residents could face serious risks from airborne debris, uprooted trees, and structural collapses. Individuals without access to basements or storm shelters, including seniors and families living in mobile or older homes, are especially vulnerable.
	Structures	*Vulnerability:* Homes and businesses in Draper could sustain heavy damage during a tornado. *Impacts:* Roofs may be lifted off, windows shattered, and walls compromised. Larger structures like shopping centers or restaurants may be at risk of partial or total collapse, resulting in extended closures and major repair costs.
	Economic Assets	*Vulnerability:* Businesses throughout Draper are vulnerable to tornado impacts. *Impacts:* Tornado damage in Draper could have long-lasting impacts on the local economy. Retail businesses, hotels, restaurants, and industrial sites may face significant operational downtime due to structural damage or power outages. Temporary closures can lead to layoffs, interrupted supply chains, and loss of revenue, especially for small businesses without the resources for quick recovery.
	Natural, Historic, and Cultural Resources	*Vulnerability:* Draper's scenic parks, open spaces, and trail systems are vulnerable to tornado winds. *Impacts:* Mature trees and vegetation may be uprooted, leading to habitat destruction and increased erosion risk. Historic buildings and cultural landmarks may suffer irreparable harm.
	Critical Facilities and Infrastructure	*Vulnerability:* Essential services in Draper, including power distribution lines, substations, and communications systems, are susceptible to tornado damage. *Impacts:* Downed infrastructure can leave neighborhoods and business corridors without electricity, internet, or water service. Major roadways such as I-15 and Bangerter Highway could be blocked by debris, while traffic signals, public safety buildings, and schools may require emergency repairs to maintain functionality.
	Community Activities	*Vulnerability:* Tornado events can disrupt everyday life and halt scheduled activities. *Impacts:* Public schools and city-owned facilities may need to close for inspections or repairs, while parks and community centers could be temporarily unsafe. Events such as farmers markets, sports tournaments, and local festivals may be postponed or canceled, reducing opportunities for social engagement and community support.
Wildfire	People	*Vulnerability:* Perhaps the most likely and significant hazard in the city of Draper is the potential for damage and loss of life and property through fire events. The terrain of steep slopes adds to the dangers and difficulties of wildfire suppression. Many homes on the east and south sides of Draper have a high potential for being impacted by wildfires. Fires can occur in the urban fabric of the community or as

Hazard	Vulnerable Asset	Description of Vulnerability and Impacts
		wildfires in the hillside areas of the community and mountainous areas adjacent to the city. Each incident may require a unique response from the city of Draper. The potential for structure and wildfires is increased by lightning events. *Impacts:* Residents could be displaced by evacuations. Individuals with disabilities or access and functional needs may have more difficulty evacuating and be more at risk of injury from wildfire. Wildfire smoke impacts air quality, which has negative health effects for individuals not near the fire, particularly people with other respiratory or cardiac conditions. Wildfires can remove necessary vegetation, which can make soils unstable for extended periods. Utah's fire season typically occurs during the warmer and drier months between May and October. Although traditionally a majority of wildfires have been caused naturally, mostly by lightning, as development encroaches on the hillsides and lower slopes of the Wasatch Mountains, wildfires caused by humans will likely increase.
	Structures	*Vulnerability:* Hundreds of structures are vulnerable, especially those near Corner Canyon, Suncrest, and other wooded areas. Homes without defensible space are most vulnerable. *Impacts:* Wildfires can burn entire neighborhoods, resulting in significant property loss.
	Economic Assets	*Vulnerability:* Businesses near foothills are vulnerable to wildfire impacts. *Impacts:* Stores, restaurants, and offices may be forced to shut down due to fire damage, evacuations, or power outages, leading to financial losses.
	Natural, Historic, and Cultural Resources	*Vulnerability:* Vegetation and wildlife habitats are vulnerable to wildfires. *Impacts:* Wildfires can burn thousands of acres of forests, grasslands, and habitats, displacing wildlife. Loss of vegetation can lead to erosion, landslides, and long-term environmental damage.
	Critical Facilities and Infrastructure	*Vulnerability:* Power, water, and transportation infrastructure are vulnerable to wildfire damage. *Impacts:* Fire can damage electrical grids, transformers, and transmission lines. Roads may be closed due to flames, smoke, or fallen trees. If the water supply systems are damaged, firefighting efforts become more difficult. Emergency services and hospitals may be overwhelmed.
	Community Activities	*Vulnerability:* Community events/activities are vulnerable to disruption from wildfires. *Impacts:* Fairs, markets, or recreation events may be canceled or postponed. Schools may close due to damage. Workplaces may remain closed for days or weeks due to evacuation and/or damage.
Dam Failure	People	*Vulnerability:* The Draper Irrigation Company has a storage reservoir located at the mouth of Corner Canyon, which is classified as a high-hazard dam by the state of Utah. In addition, the Point of the Mountain Raw Water Reservoir poses risks. The failure of these reservoirs could have an impact on residential areas in the city.

Hazard	Vulnerable Asset	Description of Vulnerability and Impacts
	Structures	*Vulnerability:* Homes and buildings in inundation areas are vulnerable to dam failure impacts. *Impacts:* Structures can be damaged; basements and lower floors of buildings may be completely submerged or filled with mud or debris.
	Economic Assets	*Vulnerability:* Businesses in inundation areas and property values are vulnerable to dam failure. *Impacts:* Homeowners, businesses, and the city may face millions in damage, leading to rising insurance premiums.
	Natural, Historic, and Cultural Resources	*Vulnerability:* Ecosystems are vulnerable to dam failure impacts. *Impacts:* Floodwaters can wash away soil, trees, and plant life, resulting in damage to local ecosystems.
	Critical Facilities and Infrastructure	*Vulnerability:* No critical facilities were located within dam inundation boundaries. However, infrastructure such as power and transportation are vulnerable is vulnerable. *Impacts:* Flooding could damage electrical grids, substations, and transformers leading to power outages. Gas lines could be damaged, increasing the risk of fires and explosions, roads could be impassable, and emergency services may struggle to reach people due to these conditions and may become overwhelmed.
	Community Activities	*Vulnerability:* Community events are vulnerable to disruption from dam failure. *Impacts:* Community events and activities may be postponed or canceled.
Civil Disturbance	People	If demonstrations escalate, people could suffer injuries from physical altercations, tear gas, and projectiles.
	Structures	Businesses, government buildings, and public spaces could be targeted for graffiti, broken windows, arson, or other damage.
	Economic Assets	Civil unrest can force store closures, reducing revenue. Tourists and shoppers may avoid certain areas, affecting local businesses and restaurants. Businesses may struggle with costly repairs.
	Natural, Historic, and Cultural Resources	Demonstrations in parks or streets may result in environmental damage.
	Critical Facilities and Infrastructure	Protestors may block access to roads, delaying emergency response.
	Community Activities	Large community gatherings or activities may be postponed or canceled due to safety concerns.
Cyberattack	People	Cyberattacks could interrupt government work, public safety, and critical infrastructure operation. A data breach could result in cybercriminals stealing personal information, tax documents, and other critical records.
	Structures	Cyberattacks on government or private businesses could disable security systems, HVAC controls, and other infrastructure management systems, potentially causing significant damage

Hazard	Vulnerable Asset	Description of Vulnerability and Impacts
	Economic Assets	Cyberattacks can disrupt financial systems, causing delays in payroll and payment processing, licensing and permitting, and other essential services and records management.
	Natural, Historic, and Cultural Resources	A cyberattack on Draper's water supply or power grid could disrupt irrigation systems, impacting parks and other natural areas.
	Critical Facilities and Infrastructure	A cyberattack on Rocky Mountain Power or Enbridge gas could lead to power outages, gas shortages, and water system failures. A breach at Intermountain Healthcare could compromise patient records, delay medical treatment, and disrupt emergency services. Attacks on 911 dispatch systems could increase emergency response times.
	Community Activities	Cyberattacks can disrupt school and education, delay government services, and spread misinformation, which can lead to public distrust
Hazardous Materials Incident (Transporta-tion & Fixed Facility)	People	Exposure to toxic chemicals, fumes, or radiation can cause burns, respiratory issues, poisoning, and long-term diseases (cancer or organ damage). Immediate health effects include nausea, dizziness, difficulty breathing, and skin irritation. Residents and businesses near the spill or explosion site may need to evacuate, and people may need to temporarily shelter somewhere.
	Structures	A hazardous materials explosion at a gas station, industrial site, or transportation route could destroy nearby homes, businesses, and other critical infrastructure.
	Economic Assets	Businesses within hazard zones may be forced to close for weeks or months for cleanup. Road closures due to a spill on I-15, Bangerter, or nearby railways could disrupt supply chains and daily commutes. Government agencies and businesses may face millions of dollars in cleanup expenses and legal claims from affected residents.
	Natural, Historic, and Cultural Resources	Chemicals could seep into groundwater, rivers, and wetland areas, impacting Draper's water supply and local ecosystems
	Critical Facilities and Infrastructure	Firefighters, police, and local hospitals could be overwhelmed, delaying response times for other emergencies. Powerlines could be damaged, causing power outages. A train derailment or truck accident involving hazardous chemicals could close transportation routes.
	Community Activities	Community events and activities may be postponed or canceled due to air quality concerns or evacuation orders.
Public Health Epidemic/ Pandemic	People	A public Health Epidemic/Pandemic could infect thousands of residents, with elderly individuals, children, and immunocompromised people at higher risk. Fear of infection could cause panic, distrust, and social unrest. Isolation from quarantines, lockdowns, and social distancing can lead to depression, anxiety, and stress.
	Structures	Public buildings, public transportation systems, and shared public spaces may require frequent cleaning and modifications to prevent the spread of disease.
	Economic Assets	Retail stores, restaurants, and small businesses may suffer from reduced foot traffic, workforce shortages, or mandatory shutdowns.

Hazard	Vulnerable Asset	Description of Vulnerability and Impacts
		Increased demand for hospital care, medications, and vaccines could become costly.
	Natural, Historic, and Cultural Resources	Parks and natural hiking trails and events may close or have limited access to prevent gatherings and disease spread.
	Critical Facilities and Infrastructure	Hospitals and urgent care clinics may become overwhelmed, leading to long wait times and shortages of medical staff. Fewer people may use public transportation systems, if utility workers and emergency service providers get sick, critical services may slow down, leading to increased response times.
	Community Activities	Large gatherings like sports games, religious services, and community events may be canceled or restricted. Schools and workplaces may implement virtual classes and remote work.
Terrorism	People	A terrorist attack in a public area (such as a shopping center, school, or public event) could result in mass casualties and injuries.
	Structures	A terrorist attack could damage businesses, schools, government buildings, transportation hubs, and other public facilities.
	Economic Assets	Attacks on business, districts, bans, or commercial centers could result in closures and loss of revenue. Tourism and local businesses may suffer if people avoid public places out of fear. Businesses, schools, and government/public buildings may need to invest in security upgrades, increasing operational costs. Property and business owners may have higher insurance premiums and expensive rebuilding costs after an attack.
	Natural, Historic, and Cultural Resources	If an attack targeted churches or monuments it would be devastating for the community. A biological, chemical, or radiological attack could cause environmental damage.
	Critical Facilities and Infrastructure	Physical attacks on substations, transformers, and water treatment facilities could cause long-term power outages and water shortages. Disruptions in communications systems could delay emergency response efforts. A terrorist attack on a major highway like I-15 or public transit could shut down travel and disrupt supply chains. Hospitals and ERs can become overwhelmed, delaying care for other medical emergencies that do not just stop.
	Community Activities	Schools, shopping centers, and office buildings may close temporarily or indefinitely after an attack. Large community gatherings and events may be postponed or canceled due to safety concerns.

Jurisdiction-Specific Changes in Vulnerability

Hazard events can impact communities, infrastructures, and ecosystems. The severity of these impacts can be influenced by climate change, population patterns, and land use developments. Understanding these factors is crucial for the city of Draper in developing a resilient community and minimizing the impacts of hazards. Table 10 displays the changes within the city and the related effects of each hazard on the city of Draper.

Table 10: Jurisdiction-Specific Changes in Vulnerability in the City of Draper

Type of Hazard Event	Description of Potential Impacts	Effects of Climate Change	Changes in Population Patterns	Changes in Land Use and Development	Overall Vulnerability
Avalanche	The likelihood of avalanches impacting the city of Draper is limited. The area on the east side of the city is adjacent to the Wasatch Mountains, but there has been no historical avalanche activity in that area of the city. Avalanches pose a threat to outdoor enthusiasts, leading to injuries and fatalities.	More-extreme winter storms and changes in temperature may increase the risk of avalanche in new areas or larger avalanches in expected areas. It is unknown if risk is greater in the city due to climate change.	Development may continue in the city, and may expand into the foothills, but no known avalanche paths are mapped in the area, and risk is not expected to increase.	Development in Draper has not been on the eastern side of the city where the avalanche risk is located and has not changed avalanche risk.	Stayed the Same
Drought	The city of Draper has large swings in temperature and in precipitation amounts during any year and is susceptible to drought. The city encourages landscaping that is friendly to the desert climate of Utah and when drought conditions occur the city would restrict the use of water for outdoor landscaping. Recreational activities may decline, harming tourism, while the risk of wildfires increases, threatening safety and property. In addition, lower water levels can lead to water quality issues and public health concerns.	Climate change affects drought incidents by altering precipitation patterns and increasing temperatures. Warmer weather can lead to longer dry periods and more severe droughts, while changes in rainfall can reduce snowpack in nearby mountains, crucial for summer water supply. Higher temperatures also increase evaporation rates, further straining local water resources.	Drought can significantly influence population patterns by impacting economic opportunities and the quality of life. Water scarcity often leads to reduced agricultural productivity, prompting residents to migrate to areas with more stable job prospects. Increased water costs can make living less affordable, driving some residents away. Conversely, efforts to address drought, such as sustainable development or improved water management, may attract newcomers, resulting in changes in the community's	The increase in residential and commercial facilities across Draper City will increase the demand for water.	Increased

Type of Hazard Event	Description of Potential Impacts	Effects of Climate Change	Changes in Population Patterns	Changes in Land Use and Development	Overall Vulnerability
			demographic composition over time.		
Earthquake	Perhaps the most feared incident in Draper is the potential for a large earthquake. Reports indicate that thousands of deaths, billions of dollars of damage to private property, extended loss of utility services, overwhelmed medical facilities, and other catastrophic incidents will occur if a major earthquake occurs in the Salt Lake and/or Utah Valley. Fine-grained, lake-bottom sediments are common in western Draper and are susceptible to liquefaction-induced ground failure during a large earthquake. Each incident may require a unique response from the city of Draper and for a major earthquake, outside assistance will be necessary.	Increased rainfall and flooding can erode soils, weakening structural integrity and heightening vulnerability during earthquakes. Although the direct links between climate change and earthquakes are still under investigation, environmental effects may impact the region's seismic risk.	Earthquakes can significantly alter population patterns by prompting residents to leave for safer areas after a seismic event. This migration can lead to changes in population density and attract new residents and businesses during the rebuilding process. The perception of the area as a safe place to live may shift, impacting long-term demographics, as some residents return to rebuild while others relocate permanently.	Newly constructed homes and business do slightly increase the risk from earthquakes, but these new buildings are constructed according to the 2021 building codes, which provide advanced protection against earthquakes.	Stayed the Same

Type of Hazard Event	Description of Potential Impacts	Effects of Climate Change	Changes in Population Patterns	Changes in Land Use and Development	Overall Vulnerability
Extreme Heat	Extreme heat can significantly affect public health, increasing the risk of heat-related illnesses, especially among vulnerable populations. It also strains energy resources due to the higher demand for air-conditioning, potentially leading to power outages. In addition, extreme temperatures worsen air quality by raising ozone levels, which poses respiratory risks. Urban infrastructure may also suffer damage, leading to increased maintenance costs and safety concerns.	Climate change significantly impacts extreme heat by increasing the frequency and intensity of heat waves. Rising global temperatures lead to longer and hotter summers, affecting residents and local infrastructure while heightening health risks, especially for vulnerable populations. Urban heat islands from reduced vegetation and extensive pavement further amplify these effects.	Extreme heat can lead residents to relocate due to damaged homes or safety concerns. Some may move to areas perceived as safer or seek better job opportunities elsewhere. The economic impact and infrastructure damage can also make certain neighborhoods less desirable, leading to shifts in demographics and the socioeconomic landscape as new residents with different backgrounds move in.	Higher density from increased development, particularly in the northern and central parts of the city, may lead to more frequent extreme heat events.	Unknown
Extreme Cold	Extreme cold can lead to health risks such as frostbite and hypothermia, especially among vulnerable populations. Transportation may be disrupted by icy conditions, affecting commutes and emergency services. Infrastructure is at risk, with water pipes potentially freezing and bursting, resulting in costly repairs. In addition, energy demands surge as residents rely on heating, straining the	By increasing the intensity of winter storms. Higher atmospheric temperatures allow for more moisture, resulting in heavier snowfall and potentially lower temperatures during these events. In addition, fluctuations in weather patterns may disrupt seasonal cycles, leading to unpredictable periods of extreme cold	By driving some residents to relocate to warmer areas. Harsh winters can hinder economic activities and deter new residents and businesses, influencing housing demand and the attractiveness of certain neighborhoods. This may disproportionately affect lower-income families, leading to changes in demographics and socioeconomic	New subdivisions mean the city has increased responsibility for plowing and evacuation during heavy snow events.	Unknown

Type of Hazard Event	Description of Potential Impacts	Effects of Climate Change	Changes in Population Patterns	Changes in Land Use and Development	Overall Vulnerability
	electrical grid and increasing utility costs. Low temperatures can also impact local agriculture and wildlife.	mixed with warmer spells.	stratification in the community.		
Flooding	The city of Draper is subject to thunderstorms and snowmelt flooding. Significant flooding occurred in the Salt Lake Valley in 1983 and to a lesser extent in 1984, and again in 2011 resulted in the construction of some sediment basins, installation of stream-bank protection, and the cleaning of stream channels to reduce flood hazards. Flood plains along the Jordan River and its tributaries have been rated for expected flood heights by the Federal Emergency Management Agency (FEMA) and areas susceptible to flooding have been delineated on the Federal Insurance Rate Maps (FIRM). These maps are updated as development occurs and channel obstructions, culvert modifications, and other changes alter potential flood heights and velocities.	Higher temperatures increase the frequency and intensity of extreme weather events and alter precipitation patterns. They lead to more intense rainstorms and accelerated snowmelt from nearby mountains, raising water levels in rivers and streams. This combination raises the risk of flooding, especially in areas with inadequate drainage and urban development in flood-prone zones, heightening the potential for damage to homes and infrastructure.	Flooding can significantly alter population patterns by displacing residents from affected areas, leading them to seek shelter elsewhere. This may cause a population decline where flooding occurs, as individuals might hesitate to return due to ongoing risks or property damage. As neighborhoods become less desirable, people may migrate to safer areas, changing demographic trends and putting pressure on housing in those regions. Over time, these shifts can influence urban planning and development, as local governments address flooding risks and changing population needs.	Several streams run through the City of Draper and converge with the Jordan River that runs along the western border. Thirty-seven (37) structures are vulnerable to the 1% annual chance event and there is additional development planned in the 1% annual chance floodplain.	Increased
Landslide/ Slope Failure	Steep mountains adjacent to the city create a potential for landslides, debris flows, rock	Climate change increases the risk of landslides through	Landslides and slope failures can impact population patterns by	The new developments have mostly not been in the eastern or	Stayed the Same

Type of Hazard Event	Description of Potential Impacts	Effects of Climate Change	Changes in Population Patterns	Changes in Land Use and Development	Overall Vulnerability
	falls, and snow avalanches. The town's steep terrain is vulnerable, especially during heavy rainfall or rapid snowmelt. Properties on slopes may suffer damage, resulting in displacement and economic losses. Transportation networks can be disrupted, complicating emergency responses. In addition, landslides can harm local ecosystems by displacing vegetation.	heavier rainfall and greater temperature fluctuations. Intense rain saturates soil, destabilizing slopes, while freeze–thaw cycles weaken the ground. Changes in vegetation can also reduce stability, leading to a higher potential for landslides.	making some areas unsafe, leading to displacement and lower property values. This prompts residents to move to safer regions, thereby increasing density in more stable areas. Concerns about future landslides may also deter newcomers from high-risk zones, shaping long-term demographic trends.	southeastern parts of the city, where landslides are most likely to occur.	
Radon	Radon poses significant health risks, particularly lung cancer, as it can enter homes through foundation cracks. Many residents may not test for radon, making them unaware of dangerous levels. Increased awareness and public health initiatives are vital for protection, especially with regard to population growth. Incorporating radon-resistant construction in new developments is also essential for safety.	Climate change can affect radon levels by altering soil temperatures and moisture conditions. Higher temperatures may increase radon emissions from the ground, while heavy rainfall can change groundwater and soil saturation, impacting radon migration into buildings.	Radon exposure can influence population patterns, as increased health awareness may drive families to move away from areas with high radon levels. This shift could particularly affect vulnerable groups, changing demographics and demand in the housing market. Homes with lower radon levels may become more sought after, and public health campaigns can encourage community action, making previously undesirable areas more attractive once mitigation	Changes in development have affected the risk from radon.	Unknown

Type of Hazard Event	Description of Potential Impacts	Effects of Climate Change	Changes in Population Patterns	Changes in Land Use and Development	Overall Vulnerability
			measures are implemented.		
Heavy Rain	Heavy rain can cause flash floods, particularly in low-lying areas, disrupting traffic and emergency services. It may also lead to soil erosion, infrastructure damage, and increased landslide risk in hilly regions. In addition, heavy rainfall can overwhelm waterways, resulting in water quality issues from runoff, impacting public safety, local businesses, and agriculture.	Climate change increases the frequency and intensity of heavy rain, as higher temperatures allow the atmosphere to hold more moisture. This leads to stronger storms, flash flooding, and overwhelmed drainage systems.	Heavy rain can shift population patterns by pushing residents out of flood-prone areas and attracting them to safer neighborhoods. Frequent flooding may lead to evacuations and economic disruptions, prompting relocations. Over time, ongoing heavy rains can affect housing demand and community stability, altering the town's population distribution.	Higher density in the city, particularly in the northern and central areas, increases the risk of pluvial flooding due to more impervious surfaces.	Unknown
High Wind	High winds can cause property damage to roofs and windows, topple trees and power lines, and lead to power outages. They pose hazards for pedestrians and drivers and can worsen air quality by stirring up dust and pollutants, affecting residents' health.	Climate change affects high winds by altering atmospheric patterns and increasing extreme weather events. Rising temperatures may lead to more substantial, unpredictable winds and more frequent thunderstorms, posing risks to infrastructure and air quality.	High winds can alter population patterns by making certain areas less desirable. Frequent damage may drive residents to safer neighborhoods, deter newcomers, and slow growth in affected regions.	Increased development has not altered the risks associated with high winds.	
Lightning	Lightning can have several impacts, primarily posing risks to public safety with the potential for injuries or fatalities. It can spark wildfires	Climate change increases temperatures and alters precipitation, leading to more intense thunderstorms and	Lightning can influence population patterns by causing property damage and wildfires, leading some residents to	Increased development has not affected the risk associated with lightning.	

Type of Hazard Event	Description of Potential Impacts	Effects of Climate Change	Changes in Population Patterns	Changes in Land Use and Development	Overall Vulnerability
	in nearby areas, threatening property and the environment. In addition, lightning strikes can damage infrastructure, leading to electrical surges that cause power outages and service disruptions. This phenomenon also affects outdoor activities and tourism, while the economic burden includes increased insurance claims and repair costs.	frequent lightning strikes. Urbanization can enhance this effect, posing risks to public safety and infrastructure.	relocate. Areas with higher lightning activity may deter new residents, while safer locations could increase migration as people seek protection from severe weather.		
Severe Winter Weather	Heavy snow or blizzards can disrupt transportation, hinder emergency services, and cause infrastructure damage, such as roof collapses. These conditions can lead to increased municipal costs for snow removal and have a substantial economic impact on businesses, particularly in retail and tourism. Power outages may also occur, affecting heating during cold months.	Climate change impacts heavy snow and blizzards by altering precipitation patterns. Higher temperatures can lead to more rain than snow, affecting snowpack levels—additionally, increased storm intensity results in heavier, more unpredictable snowfall.	Increased population means more people need to get to work and snow removal must be quicker. Heavy snow or blizzards can impact population patterns by influencing where people live and work. Transportation disruptions may lead residents to seek housing closer to jobs, increasing density in some areas while depopulating others. Families might also avoid regions with frequent heavy snowfall, shifting demand to milder areas. Over time, these trends can alter community demographics and economic activity,	New development increases Draper City's responsibility for plowing and evacuating residents from new subdivisions.	

Type of Hazard Event	Description of Potential Impacts	Effects of Climate Change	Changes in Population Patterns	Changes in Land Use and Development	Overall Vulnerability
			prompting adjustments in town planning and resource allocation.		
Tornado	Tornadoes can cause serious damage to property and infrastructure, leading to injuries and economic challenges. Urban areas are especially vulnerable, complicating emergency responses and disrupting essential services. The psychological impact can affect community well-being, potentially leading to changes in demographics and land use as residents seek safer locations.	Climate change may increase the frequency and intensity of tornadoes. Higher temperatures lead to more moisture in the air, creating conditions for severe thunderstorms. Changes in wind patterns and precipitation can also heighten tornado risks, resulting in more destructive storms and greater threats to infrastructure and communities.	Tornadoes can influence population patterns by prompting residents to move to safer areas after damage occurs. This can decrease density in affected neighborhoods while increasing the demand for housing in safer regions. New residents may also move in for recovery opportunities, altering demographics. Over time, repeated tornado threats might push long-term residents to areas with better disaster preparedness, reshaping the town's population distribution.	New development has not affected the risk associated with tornadoes.	
Wildfire	Wildfires pose serious risks, including habitat damage, degraded air quality, and health issues for vulnerable populations. They can also lead to economic losses, property damage, and increased erosion that affects water quality.	By raising temperatures and creating drier conditions, prolonged droughts lead to more dry vegetation, which serves as fuel for fires. Erratic seasons extend the growing period, while more lightning strikes can ignite wildfires. These factors	Displaced individuals often seek safer areas, shifting demographics, while declining property values or perceived risk might deter newcomers. Conversely, some may be drawn to rebuilding efforts, impacting long-term growth and community dynamics.	A few developments have been constructed in southeastern Draper, where wildfire risk is highest.	

Type of Hazard Event	Description of Potential Impacts	Effects of Climate Change	Changes in Population Patterns	Changes in Land Use and Development	Overall Vulnerability
		heighten the threat to ecosystems and community safety.			
Dam Failure	The Draper Irrigation Company has a storage reservoir located at the mouth of Corner Canyon, which is classified as a dam by the State of Utah. The impacts of the failure of this storage reservoir could have impacts on residential areas in the city. Any dam failures in other areas of Utah would have little impact on Draper, except for the potential impact on water supplies. Dam failure could lead to severe flooding, damaging homes and infrastructure, isolating communities, and hindering emergency responses. This may cause loss of life, especially among vulnerable groups, and trigger economic losses for local businesses and property values. Long-term effects could affect community stability and public health, while floodwaters may contaminate local waterways and disrupt ecosystems.	Climate change raises the risk of dam failure by causing heavier rainfall and rapid snowmelt. These changes can overwhelm dams and compromise their integrity, highlighting the need for urgent safety assessments and upgrades to protect communities downstream.	Dam failure can impact population patterns by displacing residents and altering demographics. Evacuations can lead to an influx in safer areas, while destruction may deter new residents and contribute to population decline. Fear of future disasters may also prompt individuals to relocate, changing the community's composition and affecting population density and economic activity.	New development has not affected the risk associated with dam failure.	Stayed the Same

Type of Hazard Event	Description of Potential Impacts	Effects of Climate Change	Changes in Population Patterns	Changes in Land Use and Development	Overall Vulnerability
Civil Disturbance	Civil disturbances can cause economic losses for businesses, create social division, and increase tensions among community groups. They may overwhelm law enforcement, leading to fear and mistrust among residents. Essential services could be disrupted, affecting quality of life, while long-term impacts may include changes in community dynamics and public policy.	Climate change can increase civil disturbances by intensifying environmental stresses and social tensions. Rising temperatures may lead to droughts, wildfires, and poor air quality, particularly affecting vulnerable communities. Resource scarcity, especially water, can spark conflicts and protests. In addition, an influx of migrants from harder-hit areas may strain local resources, further escalating tensions. This cycle of unrest is driven by the impacts of climate change on the environment and community dynamics.	By encouraging residents to move for safety, leading to outflows and new arrivals. These events can reveal social issues, impacting community dynamics, employment, and property values, ultimately reshaping demographics, and social cohesion.	New development has not affected the risk associated with civil disturbances.	Increased
Cyberattack	Cyberattacks can disrupt critical infrastructure like power and water services, complicating emergency responses. Businesses may face financial losses from downtime and data breaches, eroding consumer trust. The public sector's essential services, including law	Possible attack on the industry, which is seen as producing large amounts of greenhouse gases and burning fossil fuels. Climate change can heighten cyberattack risk by increasing vulnerabilities during	Cyberattacks can change population patterns by eroding trust in essential services. Compromised systems may cause residents to leave due to safety concerns, while high-profile incidents can deter businesses, leading to job losses. This	New development has not affected the risk associated with cyberattacks.	Increased

Type of Hazard Event	Description of Potential Impacts	Effects of Climate Change	Changes in Population Patterns	Changes in Land Use and Development	Overall Vulnerability
	enforcement and public health, could be compromised, leading to fear and reduced community confidence.	extreme weather. Disruptions like power outages offer cybercriminals opportunities, but focusing on emergency responses can weaken cybersecurity measures. As organizations adopt new technologies to cope with climate impacts, they may unintentionally introduce additional vulnerabilities.	perception of vulnerability may also make the town less appealing to newcomers, resulting in demographic shifts and affecting local development.		
Hazardous Materials Incident (Transportation & Fixed Facility)	Hazardous materials incidents can severely impact public health, the environment, and the economy. Health risks include serious illnesses from exposure, while environmental damage may lead to soil and water contamination. Economically, incidents can cause property damage, lower property values, and disrupt businesses. The community also faces stress from evacuations and anxiety over safety.	Climate change elevates the risk of hazardous materials incidents by increasing extreme weather events like heavy rain and wildfires. These events can breach storage tanks and heighten material volatility. Vulnerable infrastructure can lead to more spills or accidents, while climate shifts may also introduce new challenges for managing hazardous	By causing evacuations and temporary declines in density. In the long run, unsafe areas may deter new residents, affecting growth and diversity. In addition, negative perceptions can lower property values and economic prospects, leading families to relocate, which impacts local demographics.	New development has not affected the risk associated with hazardous materials incidents.	Increased

Type of Hazard Event	Description of Potential Impacts	Effects of Climate Change	Changes in Population Patterns	Changes in Land Use and Development	Overall Vulnerability
		substances and public health.			
Public Health Epidemic/ Pandemic	Epidemics and pandemics can disrupt healthcare by overwhelming facilities and leading to resource shortages, diminishing care for all patients. Economic impacts may include business closures and job losses, particularly in hospitality and retail. The strain on public health services can affect routine care, while mental health issues may arise due to isolation and uncertainty. Shifts to remote learning can hinder student development, and vulnerable populations face heightened risks. Erosion of public trust in health authorities might reduce compliance with guidelines.	By increasing the spread of vector-borne diseases and raising the risk of waterborne illnesses due to flooding or drought. Worsening air quality can also exacerbate respiratory conditions like asthma, especially in vulnerable populations.	By prompting migration for safety and better healthcare. Vulnerable groups may move to areas with improved services, while economic instability can drive people to seek new employment opportunities. In addition, restrictions like quarantine measures can limit movement and social interactions, reshaping the community's demographics and impacting local economies.	New development has not affected the risk associated with epidemics/pandemics.	Increased
Terrorism	Terrorism incidents can have significant impacts, including loss of life and emotional trauma for the community. Economically, they disrupt local businesses and tourism while creating fear and anxiety that affect social cohesion. Emergency services might be overwhelmed, requiring	Terroristic activity is sometimes centered around climate change. Climate change impacts terrorism incidents by creating conditions of resource scarcity and social unrest. Increased competition for essential resources,	Terrorism incidents can alter population patterns by instilling fear and prompting residents to relocate to perceived safer areas, resulting in demographic shifts and potential declines in property values. Some neighborhoods may see an outflow of residents,	New development has not affected the risk associated with terrorism incidents.	Increased

Type of Hazard Event	Description of Potential Impacts	Effects of Climate Change	Changes in Population Patterns	Changes in Land Use and Development	Overall Vulnerability
	additional support, and increased security measures can alter daily life and raise concerns about civil liberties. Damage to critical infrastructure necessitates long-term repairs, and such incidents may deepen social divisions and prompt changes in security policies, highlighting the need for effective preparedness and response strategies.	such as water, can fuel tensions, making communities more vulnerable to extremist ideologies. Extreme weather events may disrupt social order and infrastructure, offering terrorist groups opportunities to exploit crises. In addition, climate-driven population displacement can heighten tensions in receiving areas, raising the risk of domestic terrorism. Law enforcement's focus on climate-related challenges can also limit its capacity to address terrorism threats.	while others could experience an influx of people seeking refuge from violence. In addition, increased security measures may deter businesses and residents from certain locations, leading to long-term changes in population density and urban development patterns.		

Additional Public Involvement

The city of Draper provided several opportunities for public participation. Figure 1 is an example of public outreach.

Figure 1: Social Media Post for Public Participation

Plan Integration

Incorporating the underlying principles of the Hazard Mitigation Plan and its recommendations into other plans is a highly effective and low-cost way to expand their influence. All plan participants will use existing methods and programs to implement hazard mitigation actions where possible. As previously stated, mitigation is most successful when it is incorporated into the day-to-day functions and priorities of government and public service. This plan builds on the momentum developed through previous and related planning efforts and mitigation programs, and it recommends implementing actions where possible through these other program mechanisms. These existing mechanisms include the following:

- Regularity Capabilities
- Administrative Capabilities
- Fiscal Capabilities

Respective planning stakeholders will conduct implementation and incorporation into existing planning mechanisms and will be done through the routine actions of:

- Monitoring other planning/program agendas
- Attending other planning/program meetings
- Participating in other planning processes; and

- Monitoring community budget meetings for other community program opportunities.

The successful implementation of this plan will require constant and vigilant review of existing plans and programs for coordination and multi-objective opportunities that promote a safe, sustainable community. Regular efforts should be made to monitor the progress of mitigation actions implemented through other planning mechanisms. Where appropriate, priority actions should be incorporated into planning updates. Table 11 lists existing planning mechanisms in which the Hazard Mitigation Plan has been integrated. Table 12 lists the opportunities for integrating elements of this plan into other plans.

Table 11: Integration of Previous Plans by the City of Draper

Plan	Description
None	N/A

Table 12: Opportunities to Integrate into Future Plans of the City of Draper

Plan	Description
General Plan	Overview of the city's long-term goals and strategies.
Comprehensive Emergency Management Plan	Future update of the Emergency Operations Plan—a framework for mitigation, preparedness, response, and recovery from disasters in the city.
Suncrest and Traverse Mountain Community Wildfire Protection Plan	Identifies wildfire hazards, education, and mitigation actions needed to reduce risk in areas of Draper.
Active Transportation Plan	A collaborative effort between Draper, Sandy City, and the Wasatch Front Regional Council to enhance transportation options for pedestrians, bicycles, and transit.
Drinking Water System Master Plan	Identifies water use needs, growth projections, source and storage requirements, and distribution system needs.
Master Transportation Plan	Addresses transportation goals and future development needs to address growth. Anticipates traffic impacts as a result of development.
Storm Drain Master Plan	Presents activities and public policies to manage and regulate stormwater runoff caused by development to help mitigate flooding and environmental impacts.
Stormwater Pollution Prevention Plan	Identifies potential pollutant sources, procedures to prevent spills/leaks, erosion and sediment control, runoff management, employee training, and inspection procedures.
Town Center Station Area Plan	Guides the future of the area surrounding the Draper Town Center TRAX Station.
Parks, Recreation, and Trails Master Plan	Addresses existing conditions, priorities, levels of service, and other considerations of the city's comprehensive parks, recreation, and trail system.
Open Space Plan	Provides an analysis and detailed description of the natural resource and recreation issues, strategies and recommendations for management, and potential funding opportunities.

Capability Assessment

Local mitigation capabilities are existing authorities, policies, programs, and resources that reduce hazard impacts or could help carry out hazard mitigation activities.

Planning and Regulatory Capabilities

Planning and regulatory capabilities are the plans, policies, codes, and ordinances that prevent and reduce the impacts of hazards.

Table 13: Assessment of the Planning Capabilities of the City of Draper

Plan	Does it address hazards? (Y/N)	How can it be used to implement mitigation actions?	When was the last update? When is the next update?
General Plan	Y	Inform mitigation strategies based on long-term goals	2024
Capital Improvement Plan	Y	Can inform funding sources for mitigation actions	2025
Climate Change Adaptation Plan		N/A	
Community Wildfire Protection Plan	Y	Can inform wildfire mitigation actions	2023
Economic Development Plan	Y	Can inform funding sources for mitigation actions	Unknown
Land Use Plan	Y	Can inform any land use-related mitigation actions and responsible parties	Unknown
Local Emergency Operations Plan	Y	Can inform priorities for mitigation actions	2017
Stormwater Management Plan	Y	Can inform flood mitigation actions	2012
Transportation Plan	Y	The transportation plan can provide information on known transportation challenges to inform mitigation actions.	2023
Substantial Damage Plan	Y	Can inform mitigation actions concerning clean up or damage assessments	Unknown
Other? (Describe)			

Table 14: Assessment of the Regulations and Ordinances of the City of Draper

Regulation/Ordinance	Does it effectively reduce hazard impacts?	Is it adequately administered and enforced?	When was the last update? When is the next update?
Building Code	Y; the most recent code adopted by the state includes international building code (IBC 2021), international residential code (IRC 2021), international plumbing code, international mechanical code, national electrical code, international energy conservation code, international fuel gas code, the HUD code, and the model manufactured home installation standard.	Y	2021
Flood Insurance Rate Maps	Y	Y	2024
Floodplain Ordinance	Y	Y	2009
Subdivision Ordinance	Y	Y	2019
Zoning Ordinance	Y	Y	2020
Natural Hazard-Specific Ordinance (Stormwater, Steep Slope, Wildfire)	Y	Y	2023
Acquisition of Land for Open Space and Public Recreation Use	Y	Y	2022
Prohibition of Building in At-Risk Areas	Y	Y	2023
Other? (Describe)			

Administrative and Technical Capabilities

Administrative and technical capabilities include staff and their skills. They also include tools that can help carry out mitigation actions.

Table 15: Assessment of the Administrative Capabilities of the City of Draper

Administrative Capability	In Place? (Y/N)	Is staffing adequate?	Are staff trained on hazards and mitigation?	Is coordination between agencies and staff effective?
Chief Building Official	Y	N	Y	Y
Civil Engineer	Y	Y	Y	Y
Community Planner	Y	Y	N	Y
Emergency Manager	Y	N	Y	Y

Administrative Capability	In Place? (Y/N)	Is staffing adequate?	Are staff trained on hazards and mitigation?	Is coordination between agencies and staff effective?
Floodplain Administrator	Y	Y	Y	Y
Geographic Information System (GIS) Coordinator	Y	Y	N	Y
Planning Commission	Y	Y	N	Y
Fire Safe Council	Y	Y	Y	Y
CERT (Community Emergency Response Team)	Y	N	N	Somewhat
Active VOAD (Voluntary Agencies Active in Disasters)	Y	N	N	Somewhat
Other? (Please describe.)				

Table 16: Assessment of the Technical Capabilities of the City of Draper

Technical Capability	In Place? (Y/N)	How has it been used to assess/mitigate risk in the past?	How can it be used to assess/mitigate risk in the future?
Mitigation Grant Writing	Y	Wildfire mitigation	Can be used to mitigation actions
Hazard Data and Information	Y	Identify at-risk areas	Identify at-risk areas and determine priority of mitigation projects
GIS	Y	Used to map and track mitigation efforts	Can be used to track mitigation projects over time
Mutual Aid Agreements	Y	Used to complete mitigation projects	Established agreements in place to assist in completing mitigation actions over time
Other? (Please describe.)			

Financial Capabilities

Financial capabilities are the resources to fund mitigation actions. Talking about funding and financial capabilities is important to determine what kinds of projects are feasible, given their cost. Mitigation actions like outreach programs are lower cost and often use staff time and existing budgets. Other actions, such as earthquake retrofits, could require substantial funding from local, state, and federal partners. Partnerships, including those willing to donate land, supplies, in-kind matches, and cash, can be included.

Table 17: Assessment of the Financial Capabilities of the City of Draper

Funding Resource	In Place? (Y/N)	Has it been used in the past and for what types of activities?	Could it be used to fund future mitigation actions?	Can it be used as the local cost match for a federal grant?
Capital Improvement Project Funding	Y	Wildfire mitigation	Can be used to mitigation actions	Wildfire mitigation
General Funds	Y	Identify at-risk areas	Identify at-risk areas and determine priority of mitigation projects	Identify at-risk areas
Hazard Mitigation Grant Program (HMGP/404)	Y	Used to map and track mitigation efforts	Can be used to track mitigation projects over time	Used to map and track mitigation efforts
Building Resilient Infrastructure & Communities (BRIC)	Y	Used to complete mitigation projects	Established agreements in place to assist in completing mitigation actions over time	Used to complete mitigation projects
Flood Mitigation Assistance (FMA)	Y	Wildfire mitigation	Can be used for mitigation actions	Wildfire mitigation
Public Assistance Mitigation (PA Mitigation/406)	Y	Identify at-risk areas	Identify at-risk areas and determine priority of mitigation projects	Identify at-risk areas
Community Development Block Grant (CDBG)	Y	Used to map and track mitigation efforts	Can be used to track mitigation projects over time	Used to map and track mitigation efforts
Natural Resources Conservation Services (NRCS) Programs	Y	Used to complete mitigation projects	Established agreements in place to assist in completing mitigation actions over time	Used to complete mitigation projects
U.S. Army Corps (USACE) Programs	Only dealing with wetlands	Wildfire mitigation	Can be used for mitigation actions	Wildfire mitigation
Property, Sales, Income, or Special Purpose Taxes	Y	Identify at-risk areas	Identify at-risk areas and determine priority of mitigation projects	Identify at-risk areas
Stormwater Utility Fee	Y	Used to map and track mitigation efforts	Can be used to track mitigation projects over time	Used to map and track mitigation efforts

Funding Resource	In Place? (Y/N)	Has it been used in the past and for what types of activities?	Could it be used to fund future mitigation actions?	Can it be used as the local cost match for a federal grant?
Fees for Water, Sewer, Gas, or Electric Services	Y	Used to complete mitigation projects	Established agreements in place to assist in completing mitigation actions over time	Used to complete mitigation projects
Impact Fees from New Development and Redevelopment	Y-Not adequate	Wildfire mitigation	Can be used for mitigation actions	Wildfire mitigation
General Obligation or Special Purpose Bonds	Y	Identify at-risk areas	Identify at-risk areas and determine priority of mitigation projects	Identify at-risk areas
Federal-funded Programs (Please describe)	Y	Used to map and track mitigation efforts	Can be used to track mitigation projects over time	Used to map and track mitigation efforts
Private Sector or Nonprofit Programs	N	Used to complete mitigation projects	Established agreements in place to assist in completing mitigation actions over time	Used to complete mitigation projects
Other?		Wildfire mitigation	Can be used for mitigation actions	Wildfire mitigation

Education and Outreach Capabilities

Education and outreach capabilities are programs and methods that could communicate about and encourage risk reduction. These programs may be run by a participant or a community-based partner. Partners, especially those who work with underserved communities, can help identify additional education and outreach capabilities.

Table 18: Assessment of the Education and Outreach Capabilities of the City of Draper

Education and Outreach Capability	In Place? (Y/N)	Does it currently incorporate hazard mitigation?	Could it be used to support mitigation in the future?
Community Newsletter(s)	Y	Wildfire mitigation	Can be used to track mitigation actions
Hazard Awareness Campaigns (such as Firewise, Storm Ready, Severe Weather Awareness Week, School Programs)	Y	Identify at-risk areas	Identify at-risk areas and determine priority of mitigation projects

Education and Outreach Capability	In Place? (Y/N)	Does it currently incorporate hazard mitigation?	Could it be used to support mitigation in the future?
Public Meetings/Events (Please describe.)	Y	Used to map and track mitigation efforts	Can be used to track mitigation projects over time
Emergency Management Listserv		Used to complete mitigation projects	Established agreements in place to assist in completing mitigation actions over time
Local News	Y	Wildfire mitigation	Can be used to track mitigation actions
Distributing Hard Copies of Notices (e.g., public libraries, door-to-door outreach)	Y	Identify at-risk areas	Identify at-risk areas and determine priority of mitigation projects
Insurance Disclosures/ Outreach	Y	Used to map and track mitigation efforts	Can be used to track mitigation projects over time
Organizations that Represent, Advocate for, or Interact with Underserved and Vulnerable Communities (Please describe.)	N	Used to complete mitigation projects	Established agreements in place to assist in completing mitigation actions over time
Social Media (Please describe.)	Y	Wildfire mitigation	Can be used to track mitigation actions
Other? (Please describe.)		Identify at-risk areas	Identify at-risk areas and determine priority of mitigation projects

Opportunities to Expand and/or Improve Capabilities

Actions that can expand and improve existing authorities, plans, policies, and resources for mitigation include budgeting for mitigation actions, passing policies and procedures for mitigation actions, adopting and implementing stricter mitigation regulations, approving mitigation updates, and making additions to existing plans as new needs are recognized. Table 19 lists the opportunities for the city of Draper.

Table 19: Opportunities to Expand or Improve the Capabilities of the City of Draper

Capability	Opportunity to Expand and/or Improve
Planning and Regulation	The city can expand current wildfire planning capabilities by developing and publicizing evacuation plans. Evaluating and designating clear evacuation routes can help reduce the risk of loss of life from hazards like wildfire. These activities can also be aligned with future Community Wildfire Protection Plan updates for high-risk areas.
Administrative and Technical	The city could expand its early warning systems and technical capabilities. Acquiring an enhanced emergency notification communications system would help reduce the loss of life.
Financial	Developing sources for local match, including through impact fees or other private/nonprofit partners, could help expand the city's mitigation financial capabilities. Additionally, Draper has experience in developing wildfire mitigation grants. This capability could be expanded to other types of grant applications, which could be utilized for other types of hazards as well, such as addressing flooding

Capability	Opportunity to Expand and/or Improve
	through Flood Mitigation Assistance or earthquakes through the Hazard Mitigation Grant Program.
Education and Outreach	In addition to sharing local progress on mitigation, Draper can expand current public education and outreach capabilities by promoting a deeper understanding of how the public can take steps to mitigate their own risk as well as what local resources are available to support their efforts. Stakeholders, including community organizations such as the Community Emergency Response Team (CERT), can help spread the mitigation message. An improved understanding of local resources and mitigation opportunities will help improve overall understanding of hazard risk and what to do about it.

Mitigation Strategy

Mitigation strategies provide proactive measures that are designed to minimize the impacts of hazards on the city of Draper. Table 20 shows mitigation action alternatives, and

Table 21 shows the status of previous mitigation activities. Table 22 is the 2025 mitigation action plan for the city of Draper

Table 20: Mitigation Action Alternatives for the City of Draper

Action	Type of Action	Selected for inclusion in the plan?	If not selected, why not?
Improve regulations for development to reduce damage from landslides.	Planning and Regulatory	Yes	

Table 21: Status of Prior Mitigation Actions of the City of Draper[3]

Action	Hazard(s)	Agency Lead	Support Agency(ies)	Status Update
Conduct seismic retrofitting	Earthquake	Draper EM	Public Works	Ongoing. Draper has numerous URM structures that could benefit from retrofitting.
Design Wildfire Evacuation Plan and Route designations	All hazards	Draper EM	GIS, Fire Department, Police Department	Ongoing. Routes are identified but require regular evaluation.
Install Notification System to Alert the Public	All hazards	Draper EM	Draper Communications	Ongoing. Civic Ready alerting/ notification system.

[3] EM = Emergency Management, IPAWS = Integrated Public Alert and Warning System, PIO = Public Information Officer, SLCo = Salt Lake County, WUI = Wildland–Urban Interface.

Action	Hazard(s)	Agency Lead	Support Agency(ies)	Status Update
				(Must sign up or be in a geographical range of tower for cell phones). The city is coordinating with SLCo IPAWS implementation.
Bury powerlines	All hazards	Draper EM	Public Works	Incomplete. This occurs in some new developments but has not yet been implemented citywide.
Increase defensible space and wildfire mitigation	Flood (Riverine and Urban/ Flash Flooding)	Draper EM	Fire Department – Wildland Fuels Crew	Ongoing. A large fuel reduction project is underway in the WUI areas, particularly Suncrest.
Assess critical facilities for hazard exposure, structural weaknesses, power, communications and equipment resources and redundancy, and adequate emergency procedures	All hazards	Draper EM	Engineering Building Planning and Zoning	Ongoing. Begun but needs to continue.
Compile inventory of mutual-aid agreements and memoranda of understanding (MOU) and identify deficiencies	All hazards	City of Draper	Unknown	Ongoing. Begun but still undergoing evaluation.
Pursue and implement needed mutual-aid agreements	All hazards	City of Draper	Unknown	Ongoing. Will add MOUs as needed, according to the inventory described above.
Provide education regarding all natural hazards through live trainings and web-based, print, and broadcast media	All hazards	City of Draper	Fire, Police, Public Works, Draper PIO	Ongoing. Completed on as-needed basis and seasonally. Information is shared on the city website and social media.
Repair, maintain, and improve water distribution infrastructure to prevent	Drought	City of Draper	Public Works	Ongoing. There are scheduled projects to improve water infrastructure.

Action	Hazard(s)	Agency Lead	Support Agency(ies)	Status Update
loss from leakage, breaks, etc.				
Identify structures at risk of earthquake damage	Earthquake	City of Draper	Engineering/ Building	Ongoing. The city is aware there are URMs but not aware of a comprehensive list of structures at risk.
Complete seismic rehabilitation/ retrofitting projects at public buildings at risk	Earthquake	City of Draper	Engineering/ Building	Incomplete. Retrofitting of public buildings has not been completed and should remain a priority.
Provide educational materials to unreinforced masonry home and business owners	Earthquake	City of Draper	Engineering/ Building	Ongoing. Information has been shared but will continue.
Procure engineering consultant to perform the nonstructural design and geotechnical assessment and review.	Earthquake	City of Draper	Engineering/ Building	Incomplete. This has not been completed and will be carried forward to 2025 actions.
Determine potential flood impacts and identify areas in need of additional flood control structures	Flooding	City of Draper	Public Works, Engineering	Incomplete. The flooding and heavy rain events in 2023 highlighted a need for continued evaluation to identify areas in need of flood control.
Address identified problems through construction of debris basins, flood retention ponds, energy dissipaters, or other flood control structures	Flooding	City of Draper	Public Works, Engineering	Incomplete. The city is evaluating areas in need of improved flood risk data and implementation of additional flood control structures.
Establish maintenance and repair programs to remove debris, improve resistance, and otherwise maintain effectiveness of stormwater and flood control systems	Flooding	City of Draper	Public Works	Ongoing. This is a repetitive process to ensure flood control systems are functional.

Action	Hazard(s)	Agency Lead	Support Agency(ies)	Status Update
Identify and assess structures for deficiencies	Flooding	City of Draper	Engineering/ Building	Ongoing. The city continues to monitor structures at risk to various natural hazards.
Modify structures as needed to address deficiencies	Flooding	City of Draper	Engineering/ Building	Ongoing. The city continues to identify how to modify structures found to be at risk to hazards.
Coordinate with the Utah Geological Survey and other agencies to understand current slope failure threats/potential	Landslide/ Slope Failure	City of Draper	Engineering, Public Works, GIS	Incomplete. UGS coordinated with the City following the 2023 landslide. Ongoing communication is needed to monitor conditions.
Increase public awareness through "Firewise" program	Wildfire	City of Draper	Fire Department	Ongoing. Annually Combined with Firewise action listed in 2025 Mitigation action plan
Educate homeowners on the need to create defensible space near structures in wildland–urban interface (WUI)	Wildfire	City of Draper	Fire Department	Ongoing. The city provides information to residents annually
Work with experts and communities to develop or update evacuation plans	Wildfire	City of Draper	Emergency Management, School Districts, Local Hospitals	Ongoing. Repeats the previously listed evacuation action. Not carried forward.
Reduce fuels around publicly owned structures	Wildland Fire	City of Draper	Fire Department, Parks/Rec	Ongoing. As needed, evaluated at least annually.
Assess existing water flow capabilities, both public and private, and address deficiencies	Wildland Fire	City of Draper	Public Works/ Draper Water, Water Pro	Ongoing. Continuing to look for areas in need of improvement.
Assist communities in developing Community Wildfire Protection Plans or similar plans	Wildland Fire	Draper EM	Fire Department	Complete. CWPP was completed in 2021 for Suncrest and Traverse Mountain

Action	Hazard(s)	Agency Lead	Support Agency(ies)	Status Update
Establish Firewise Community Program for SunCrest and the entire East Bench.	Wildland Fire	Draper EM	Draper City Emergency Preparedness, Draper City Public Works, Fire Department	Ongoing. Draper City fire department participates in Firewise and conducts yearly activities to reduce wildfire risk.
Continue to enforce master drainage plan requirements	Flood	Draper City Engineering and Public Works		Ongoing. The Storm Drain Master plan describes public policies to mitigate flooding and environmental impacts of storm water runoff.
Continue Utah Shakeout activities to promote earthquake awareness	Earthquake	Emergency Manager, Police Department, and the City's Emergency Preparedness Committee		Ongoing. The city participates annually to promote awareness of earthquake risk and actions to improve safety if one occurs.
Purchase hazard public notification boards	All hazards	Draper City Public Works and Police Department		Ongoing. Two boards purchased and in use. Additional boards needed. Combined with other alert action for 2025 mitigation action plan.
Educate residents and businesses through the city of Draper website and Twitter	All hazards	Public Relations Officer, Emergency Manager, Draper City Building Inspection Division and Draper City Community Development Department	Draper PIO	Ongoing. Continual updates Combined with other public education action in 2025 action plan.

Table 22: 2025 Mitigation Action Plan for the City of Draper[4]

#	Action	Hazard(s)	Lead Agency	Potential Partners	Benefits (Losses Avoided)	Cost Estimate	Funding Source(s)	Timeframe	Priority	Comments
1	Develop an enhanced emergency notification communications system.	Avalanche, Civil Disturbance, Dam Failure, Drought, Wildfire, Earthquake, Extreme Heat, Extreme Cold, Flooding, Hazardous Materials Incident, Heavy Rain, High Wind, Landslide, Lightning, Public Health Epidemic, Radon, Severe Winter Weather, Terrorism, Tornado, Wildfire	Draper PIO	Draper EM, SLCo EM, Draper FD, Draper PD, Civic Plus/ Ready	Early notification of impending disasters to decrease loss of life. Improved relationships with the public and stakeholders. Faster delivery of information with plans ready to go.	Medium	Draper City General Fund	Short term	Medium	
2	Design or update wildfire evacuation plan and route designations.	Wildfire	Draper FD	Draper EM, Draper PD, GIS, SLCo EM, FFSL	Improve Fire safety in the WUI areas, Cut fire breaks into the mountain side also functioning as trails.	Medium	Draper City General Fund, CWDG grant, WUIPPM	Medium	High	Currently working on and completing a prior 3-year grant commitment
3	Enhance security at critical infrastructure locations to prevent potential for terrorist acts.	Terrorism (including Cyberattacks)	Draper EM	Draper IT, Draper PD, Draper Public Works, SIAC, SLCo EM	Increased security protocols (both in technology and policy) for staff/first responders, clear expectations/understanding for the public.	Medium	Draper City General Fund, Draper EM General Fund, SHSP Grant	Short term	Medium	
4	Promote the Firewise initiative and regularly review/update the Community Wildfire Protection Plans (CWPP) for at-risk communities.	Wildfire	Draper FD	Draper EM, Draper Fuels Crew, SLCo EM, FFSL	Increased awareness of plans (for the public and stakeholders), improved eligibility for grants/other funding sources, and regular review of CWPP.	Medium	Draper City General Fund, Draper EM General Fund, CWDG grant	Short term	Medium	
5	Partner with SLCo EM to develop a city-wide single source of information sharing/ gathering for intelligence.	Civil Disturbance, Terrorism	Draper EM	Other Draper City departments, SLCo EM, Draper PD, SLCo Sheriff's Office, SIAC, local jurisdictions	Improve communication and coordination between Draper City agencies and SLCo.	Medium	Draper City General Fund, Draper EM General Fund, SHSP grant.	Short term	Medium	One platform to report and share information
6	Install xeriscaping on government-owned buildings.	Drought	Draper Facilities	Draper Water, Water Pro, State of Utah, SLCo EM, local utility companies	Decrease the cost of landscape irrigation, decrease water use.	Low	Water districts, Draper City General Fund (Facilities, Parks and Recreation)	Short term	Low	
7	Complete seismic retrofitting for critical facilities and other community assets.	Earthquake	Draper City Building and Engineering	Draper City, MSD, Draper EM	Decrease the potential for building collapse and catastrophic injury to occupants.	High	Draper City General Fund, BRIC grant, HMGP grant	Medium	Low	

[4] BRIC = Building Resilient Infrastructure and Communities, CWDG = Community Wildfire Defense Grant, EM = Emergency Management, EMPG = Emergency Management Performance Grant, FD = Fire Department, FFSL = Division of Forestry, Fire, and State Lands, FMA = Flood Mitigation Assistance, GIS = Geographic Information System, HHPD = High Hazard Potential Dam, HMGP = Hazard Mitigation Grant Program, IPAWS = Integrated Public Alert and Warning System, IT = Information Technology, LEPC = Local Emergency Planning Committee, MSD = Municipal Services District, NWS = National Weather Service, PD = Police Department, PIO = Public Information Officer, SHSP = State Homeland Security Program, SIAC = Statewide Information and Analysis Center, SLCo EM = Salt Lake County Emergency Management, UDEM = Utah Division of Emergency Management, WUI = Wildland–Urban Interface, WUIPPM = Wildland Urban Interface Prevention, Preparedness, and Mitigation Fund.

#	Action	Hazard(s)	Lead Agency	Potential Partners	Benefits (Losses Avoided)	Cost Estimate	Funding Source(s)	Timeframe	Priority	Comments
8	Improve communication to the public and stakeholders on resources available when Code Blue is in effect during severe winter weather.	Severe Winter Weather, Extreme Cold	Draper EM	Draper City PIO, Draper EM, SLCo EM, The Office of Homeless and Criminal Justice Reform	Prevents further damage to critical infrastructure, ensures that homeless individuals have warming resources available, offloads some of the pressure on local homeless resource providers with standard protocols to follow with Code Blue.	Low	Draper City General Fund, Draper EM	Short term	Low	
9	Determine potential flood impacts and identify areas in need of additional flood control structures.	Flooding and Heavy Rain	Draper Public Works	Draper City, Draper EM, SLCo. Flood Control Engineering, Water Districts	Improve understanding of where flood mitigation is a priority.	High	Draper City General Fund, Draper Public Works, SLCo General Fund, FMA, HMGP grant, EMPG grant	Long term	Medium	
10	Address identified problems through construction of debris basins, flood retention ponds, energy dissipaters, or other flood control structures.	Flooding, Heavy Rain, Dam Failure	City of Draper	Public Works Engineering	Reduce risk of damage or injury from flooding.	High	Draper City General Fund, Draper Capital Improvement Fund, HMGP grant	Medium	Medium	
11	Identify and assess structures for deficiencies.	Flooding, Heavy Rain, High Wind, Lightning, Tornado, Severe Winter Weather	City of Draper	Engineering/Building	Identify and prioritize facilities for hardening to reduce damage and loss of functionality during hazard events.	Low	Draper City General Fund	Medium	Medium	
12	Modify structures as needed to address deficiencies.	Flooding, Heavy Rain, High Wind, Lightning, Tornado, Severe Winter Weather	City of Draper	Engineering/Building	Hardening facilities can reduce damage and maintain functionality during hazard events.	High	Draper City General Fund, Draper Capital Improvement Fund, HMGP grant	Long term	Medium	
13	Reinforce or rebuild existing culverts and bridges, and add new culverts and bridges in newly identified hazard areas.	Flooding and Heavy Rain	Draper Public Works	Draper City, Draper EM, SLCo. Flood Control Engineering, Water Districts	Allow for greater handling of heavy rain and spring melt runoff, and decrease potential debris buildup.	High	Draper City General Fund, Draper Public Works General Fund, SLCo General Fund, FMA, HMGP grant, EMPG grant	Long term	Medium	
14	Establish maintenance and repair programs to remove debris, improve resistance, and otherwise maintain the effectiveness of stormwater and flood control systems.	Flooding and Heavy Rain	Draper Public Works	Draper City, Draper EM, SLCo. Flood Control Engineering, Water Districts	Allow for greater handling of spring melt runoff and a decrease in the potential debris buildup.	High	Draper City General Fund, Draper Public Works General Fund, SLCo General Fund, FMA, HMGP grant, EMPG grant	Long term	Medium	
15	Conduct a public awareness campaign on Tier 2 reporting software for chemical reporting.	Hazardous Materials incident	Draper Fire Marshal	Draper FD, Draper EM, Draper PD, SLCo EM, LEPC	Improved understanding of tier 2 reporting and how local agencies/jurisdictions can find and submit information. A common operating platform for hazardous materials reporting.	Low	Draper City General Fund, LEPC	Long term	Medium	

#	Action	Hazard(s)	Lead Agency	Potential Partners	Benefits (Losses Avoided)	Cost Estimate	Funding Source(s)	Timeframe	Priority	Comments
16	Enact city regulations and codes for development to reduce damage to critical infrastructure and buildings from landslides and slope failure.	Landslide and Slope Failure	SLCo Office of Regional Development	Draper Building and Engineering, MSD, SLCo EM	Reduce the likelihood of landslides and critical infrastructure/building damage. Ensure that future development is up to code and follows policy to avoid repetitive loss properties.	Low	Draper City General Fund	Long term	Medium	
17	Develop and implement public education programs on disaster awareness and mitigation.	Avalanche, Civil Disturbance, Dam Failure, Drought, Wildfire, Earthquake, Extreme Heat, Extreme Cold, Flooding, Hazardous Materials Incident, Heavy Rain, High Wind, Landslide, Lightning, Public Health Epidemic, Radon, Severe Winter Weather, Terrorism, Tornado, Wildfire	Draper EM	Draper City, Draper FD, Draper PD, Draper Public Works, SLCo EM, NWS, UDEM	Improve understanding of local resources, improve relationships with the public and stakeholders. Outline plans/SOPs for programs.	Low	Draper City General Fund	Short term	Medium	
18	Enhance and promote the implementation of CERT and SAFE Hubs.	Avalanche, Civil Disturbance, Dam Failure, Drought, Wildfire, Earthquake, Extreme Heat, Extreme Cold, Flooding, Hazardous Materials Incident, Heavy Rain, High Wind, Landslide, Lightning, Public Health Epidemic, Radon, Severe Winter Weather, Terrorism, Tornado, Wildfire	Draper EM	Draper City, Draper FD, Draper PD, SLCo EM	Improved awareness of local resources	Low	Draper City General Fund, Draper EM General Fund, SLCo EM General Fund	Short term	Medium	
19	Provide education regarding all natural hazards through live trainings and web-based, print, broadcast, and social media.	Avalanche, Civil Disturbance, Dam Failure, Drought, Wildfire, Earthquake, Extreme Heat, Extreme Cold, Flooding, Hazardous Materials Incident, Heavy Rain, High Wind, Landslide, Lightning, Public Health Epidemic, Radon, Severe Winter Weather, Terrorism, Tornado, Wildfire	Draper EM	Draper City, Draper Public Relations Officer, Draper PIO, Draper Community Development, Draper FD, Draper PD, Draper Public Works, Draper PIO, SLCo EM, NWS, UDEM	Improved awareness of potential natural hazards affecting the city of Draper. For example, materials can be shared on: home weatherization (extreme heat/extreme cold/severe winter weather), avalanche warning signs and safety protocols (avalanche), tree trimming and reinforced window installation (high wind, tornado), and home retrofits including elevation and utility elevations (flooding, heavy rain, dam failure), and defensible space and home hardening (wildfire).	Low	Draper City General Fund, BRIC grant, HMGP grant	Short term	Low	
20	Install a notification system for public alerts. Expand opportunities for sharing information with the public through communication systems, public notification boards, and other tools.	Avalanche, Civil Disturbance, Dam Failure, Drought, Earthquake, Extreme Heat, Extreme Cold, Flooding, Hazardous Materials Incident, Heavy Rain, High Wind, Landslide, Lightning, Public	Draper EM	Draper Communications, SLCo EM	Reduce the loss of life and injury from hazards by facilitating timely information to the public.	Medium	Draper General Fund	Medium	Medium	Civic Ready alerting/ notification system. (Must sign up or be in a geographical range of a tower for cell phones).

#	Action	Hazard(s)	Lead Agency	Potential Partners	Benefits (Losses Avoided)	Cost Estimate	Funding Source(s)	Timeframe	Priority	Comments
		Health Epidemic, Radon, Severe Winter Weather, Terrorism, Tornado, Wildfire								SLCo EM has been working on developing IPAWS templates and identifying streamlined communication.
21	Bury power lines.	Extreme Heat, Extreme Cold, Flooding, Heavy Rain, High Wind, Lightning, Tornado, Severe Winter Weather.	Draper EM	Public Works	Reduce the risk of power outages from severe weather. Reduce risk of wildfire sparked by power lines.	Medium	Draper General Fund, Utility Company Operating Budgets	Medium	Medium	
22	Assess critical facilities for hazard exposure, structural weaknesses, power, communications and equipment resources, and redundancy, and adequate emergency procedures.	All hazards	Draper EM	Engineering, Building, Planning and Zoning	Use data to identify city assets and possible vulnerabilities to hazards to plan risk reduction actions.	Low	Draper General Fund	Medium	Medium	
23	Compile inventory of mutual-aid agreements and memoranda of understanding (MOU) and identify deficiencies.	All hazards	City of Draper	SLCo EM, Neighboring Jurisdictions' EM, Police, Fire and Public Works	Clarify capabilities for addressing various hazards. Improved relationships with other agencies and improved capabilities will reduce hazard risk.	Low	Draper General Fund	Short term	Medium	
24	Pursue and implement needed mutual-aid agreements.	All hazards	City of Draper	SLCo EM, neighboring jurisdictions EM, Police, Fire and Public Works	Strengthened relationships with local jurisdictions, agencies, and organizations for assistance and outlined options for assistance depending on the incident.	Low	Draper General Fund	Medium	Medium	
25	Coordinate with the Utah Geological Survey and other agencies to understand current slope failure threats/potentials.	Landslide/Slope Failure	City of Draper	Engineering, Public Works, GIS	Greater understanding of hazard potential can guide efforts to reduce future losses.	Low	Draper General Fund	Short-term	Medium	
26	Educate homeowners on the need to create defensible space near structures in the wildland–urban interface (WUI).	Wildfire	City of Draper	Fire Department	Encourage and empower residents to take steps to protect their homes and reduce potential losses from wildfire.	Low	Draper General Fund	Short-term	Medium	
27	Reduce fuels around publicly owned structures.	Wildland Fire	City of Draper	Fire Department, Parks/Rec	Reduce the potential for a fire to spread to public buildings and reduce losses and impacts to the community.	Medium	Draper General Fund, Draper Fire Dept. General Fund	Short-term	Medium	
28	Assess existing water flow capabilities, both public and private, and address deficiencies.	Wildland Fire	City of Draper	Public Works/Draper Water, Water Pro	Ensure that water flow can sustain firefighting capabilities in the event of a wildfire and help reduce potential losses.	Medium	Draper General Fund	Short-term	Medium	
29	Assist communities in developing Community Wildfire Protection Plans or similar plans.	Wildland Fire	Draper EM	Fire Department	Develop long-term planning to reduce risk of wildfire to community.	Medium	Draper General Fund	Medium	Medium	
30	Establish a Firewise Community Program for SunCrest and the entire East Bench.	Wildland Fire	Draper EM	Draper City Emergency Preparedness, Draper	Use Firewise or a similar program to educate residents regarding wildfire risk and potential	Medium	Draper General Fund	Medium	Medium	

#	Action	Hazard(s)	Lead Agency	Potential Partners	Benefits (Losses Avoided)	Cost Estimate	Funding Source(s)	Timeframe	Priority	Comments
				City Public Works, Fire Department	mitigation such as defensible space, and focus efforts in areas of high risk.					
31	Continue to enforce master drainage plan requirements.	Flood, Heavy Rain	Draper City Engineering and Public Works	Draper EM	Reduce potential losses from flooding or heavy rain.	Low	Draper General Fund	Medium	Medium	
32	Continue participating in Utah Shakeout activities to promote earthquake awareness.	Earthquake	Draper EM	Draper Police Department, and the City's Emergency Preparedness Committee, Draper PIO	Improved awareness and information regarding earthquake risk and safety precautions that people can take to reduce potential loss of life or injury from an earthquake.	Low	Draper General Fund	Medium	Medium	
33	Conduct risk studies or engineering assessments to determine approaches to address issues identified in dam safety inspection reports.	Dam Failure	SLCo EM	Salt Lake County Public Works Flood Control Engineering, Utah Division of Water Rights Dam Safety Section, Salt Lake City Public Utilities, Local Governments	Reduce potential losses from failure of HHPDs.	Medium	Salt Lake County General Fund, HHPD Grant, HMGP Grant	Medium	Medium	
34	Rehabilitate or complete other safety projects for high hazard dams based on dam safety reports or risk studies.	Dam Failure	SLCo EM	Salt Lake County Public Works Flood Control Engineering, Utah Division of Water Rights Dam Safety Section, Salt Lake City Public Utilities, Local Governments	Reduce potential losses from failure of HHPDs.	High	Salt Lake County General Fund, HHPD Grant, HMGP Grant	Long term	High	