WEST BOUNTIFUL CITY

RESOLUTION #541-23

A RESOLUTION ADOPTING AN EMERGENCY OPERATIONS PLAN FOR WEST BOUNTIFUL CITY AND APPOINTING AN EMERGENCY MANAGER

WHEREAS, an Emergency Operations Plan is an essential tool in planning for and managing disasters of all types; and,

WHEREAS, Utah Code 53-2a-1403 requires that each city adopt an Emergency Operations Plan; and,

WHEREAS, Utah Code 53-2a-1402 requires that each city designate an Emergency Manager responsible for keeping the Emergency Operations Plan up-to-date and coordinating with other emergency managers to ensure efficient, appropriate, and coordinated emergency preparedness, response, mitigation, and recovery;

NOW THEREFORE, BE IT RESOLVED by the City Council of West Bountiful City that

- 1. The West Bountiful City Emergency Operations Plan is hereby adopted as shown as Exhibit A with updates approved by the mayor and police chief and sent to council.
- 2. Jason Meservy is hereby designated as the West Bountiful City Emergency Manager.

EFFECTIVE DATE. This resolution shall take effect immediately upon passing.

Passed and approved by the City Council of West Bountiful City this 19th day of September 2023.

Kenneth Romney, Mayor

Voting by the City Council:

Councilmember Ahlstrom

Councilmember Bruhn

Councilmember Enquist

Councilmember Preece

Councilmember Wood

ATTEST:

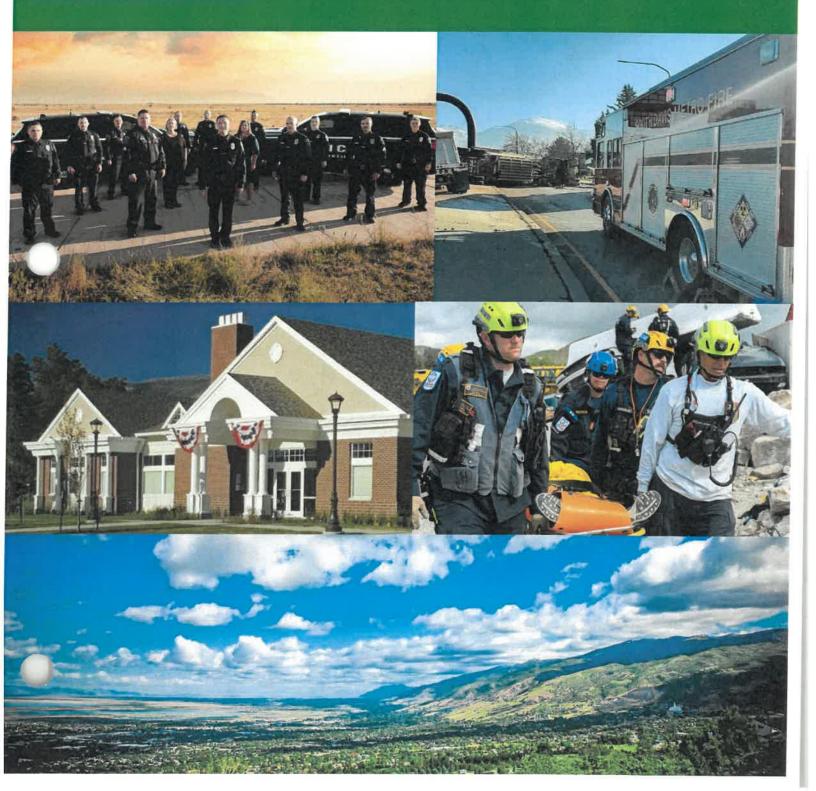
Remington Whiting, City Recorder

Resolution 541-23 Exhibit A

EMERGENCY OPERATIONS PLAN FOR WEST BOUNTIFUL CITY



West Bountiful City Emergency Operations Plan



PREFACE AND PROMULGATION

The elected officials and city staff of each local government have the crucial responsibility to prepare for, prevent, mitigate, respond to, and recover from all natural and man-made disasters that may impact the residents within their city's limits. The purpose of this Emergency Operations Plan (EOP) is to provide information, plans, and processes to enable city leaders and other city staff to effectively protect and care for the city's residents. The objectives of this document are to:

- 1. Identify the threats and hazards the city faces through a detailed threat and hazard identification and risk assessment (THIRA)
- 2. Detail the organizations that will be formed in the event of a city emergency and establish the roles and responsibilities for city officials and staff
- 3. Clearly outline key emergency response logistics
- 4. Provide detailed descriptions of how to respond to a variety of natural and man-made disasters

In the event of a city emergency, this EOP will direct city officials and staff to perform emergency management functions, notify the public, coordinate with other entities, and effectively allocate resources. The EOP is a living document and should be regularly updated to reflect the most up to date information and city capabilities. This EOP is purposefully limited in that it may not address every possible scenario that the city may face, and that key city emergency response capabilities may be reduced or eliminated if key infrastructure is negatively impacted in the event of certain man-made or natural disasters.

This document will become essential and will be utilized in anticipation of or in immediate response to a natural or man-made disaster that has resulted in or threatens the health and safety of the City's residents.

In recognition of the crucial nature of emergency management efforts, and with the authority vested in me as the City Administrator of West Bountiful, I hereby promulgate the West Bountiful City Operations plan.

[CITY ADMINISTRATOR SIGNS HERE]

Duane Huffman
City Administrator
XXX XX, 202X

RECORD OF CHANGES TO THE PLAN

This Emergency Operations Plan was last updated in August 2023.

It is the responsibility of the emergency manager to ensure that this document is current and best able to be used to protect the residents of West Bountiful. This plan will be revised by the emergency manager annually and/or in the event of the plan failing during a training exercise or during an emergency.

The following table will be used to record the changes made to this plan:

DATE OF CHANGE(S)	PAGE(S) AFFECTED	NAME OF EDITOR
	-	
	DATE OF CHANGE(S)	DATE OF CHANGE(S) AFFECTED

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SECTION 1 - THREAT AND HAZARD IDENTIFICATION AND RISK ASSESSMENT

1.0 - PURPOSE

The purpose of this Threat and Hazard Identification and Risk Assessment (THIRA) is to provide a detailed view regarding the potential hazards and risks facing the residents of West Bountiful City. This THIRA will serve as the first step to a holistic and detailed emergency management plan. After identifying the community's hazards and risks, plans can be made to mitigate, prepare for, respond to, and recover from any natural or manmade disaster within the City.1

Emergency management plans serve as a guide for municipal and community leaders to use before, during, and after emergencies to identify resources and outline responsibilities. Such a plan is not intended to arouse fear. It is a common-sense approach to preparedness that encourages action, not reaction. This plan does not replace the requirement for individual, family, or neighborhood preparedness.

A THIRA consists of three major components:

- Identify threats and hazards
- 2. Give threats and hazards context
- 3. Establish capability targets

This document will identify and provide context for all of West Bountiful's threats and hazards, but it is the responsibility of the City's staff and elected officials to establish capability targets. These targets specify the desired threshold of capability and preparedness for each threat and hazard. More detail about establishing capability targets can be found in FEMA materials.2

The remainder of this THIRA will cover the following information:

- 2.0 West Bountiful community profile
- 3.0 Introduction to the hazard analysis
- 3.1 Hazard profiles for natural disasters
- 3.2 Hazard profiles for technological disasters

2 https://www.fema.gov/sites/default/files/2020-04/CPG201Final20180525.pdf

Some aspects of the general form and outline of this THIRA were inspired by the Multi-Hazard Mitigation Plan created by Dustin Lewis for South Jordan, UT.

2.0 - WEST BOUNTIFUL COMMUNITY PROFILE

2.1 - Geography and Climate

West Bountiful City is located in the southern end of Davis County and was settled in 1848. The City is situated at an elevation of slightly under 4,500' and has a high desert climate characterized by hot, dry summers and cold, wet winters. Average annual precipitation is approximately 19 inches of rain and 54 inches of snow.³ Highway I-15 and Legacy Parkway are both major commuter routes used by many thousands of cars and trucks every day. Both of these thoroughfares run partially through the City. Almost all City residents live west of I-15 and east of Legacy Highway. A small number of residents and a majority of the businesses are located east of I-15. There are major railroads running next to I-15 that support UTA Frontrunner and commercial shipping traffic.

West Bountiful sits atop the bed of ancient Lake Bonneville. The City is built lower than the Lake Bonneville shoreline levels. The City is very close to the Wasatch Fault. Over many thousands of years, tectonic forces built the Wasatch Mountains that rise majestically to the east of the City. The west side of the City has marsh and wetland grass areas. A majority of the City has a high groundwater table.

West Bountiful is largely a small rural community, having limited commercial businesses or public services. Fire protection, ambulance service and EMT (Emergency Medical Technician) services are contracted through the South Davis Metro Fire Department, while police protection is provided by the West Bountiful City Police Department with interagency agreements with the neighboring city police departments.

2.2 - Population

West Bountiful is home to a population of approximately 5,917 (2020) people, of which 92.9% are U.S. citizens. As of 2020, 10.9% of West Bountiful residents were born outside of the country (approximately 2,340 people). The median age of the City is 36 years old.⁴

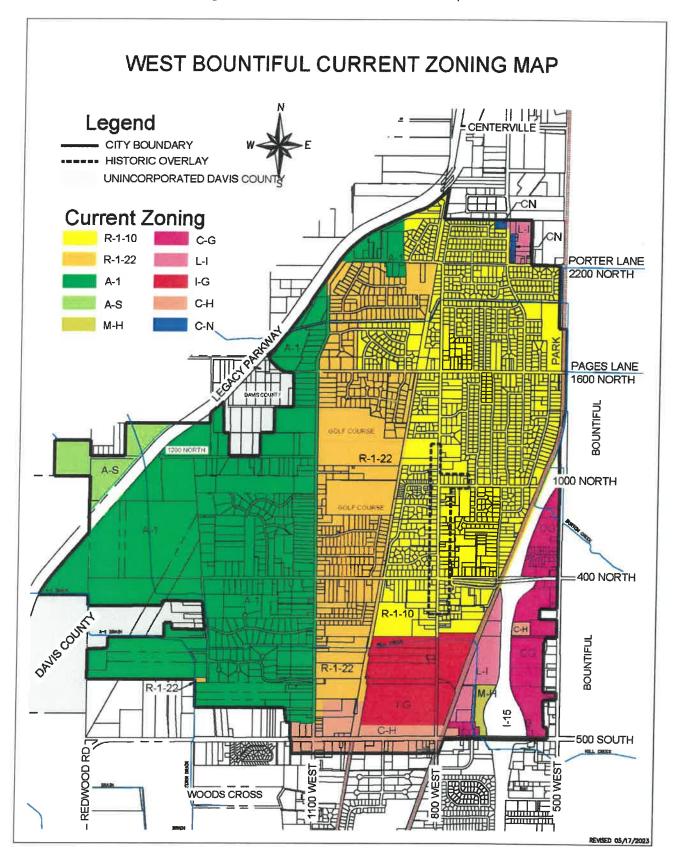
2.3 - Socioeconomic

West Bountiful has a median household income of \$99,797 (2020) and a median property value of \$342,600 (2020). Of the 5,800 residents, approximately 3,025 are employed and approximately 11.9% live in poverty.

https://www.bestplaces.net/climate/city/utah/west_bountiful

⁴ https://datausa.io/profile/geo/west-bountiful-ut

2.4 – Land UseThe boundaries and current zoning of West Bountiful is shown on this map.



3.0 - HAZARD ANALYSIS

West Bountiful is potentially at risk to a number of natural and technological hazards. The following hazard analysis section provides a detailed explanation of each potential risk that either has occurred or may occur within the City limits.

Natural Disasters

- Earthquake (3.1.1)
- Severe Winter Weather (3.1.2)
- High Winds (3.1.3)
- Tornado (3.1.4)

- Flooding (3.1.5)
- Drought (3.1.6)
- Severe Thunderstorm/Rain (3.1.7)

Technological & "Man-Made" Disasters

- Cyber Attack (3.2.1)
- Terrorism/Mass Violence (3.2.2)
- HAZMAT Incident (3.2.3)
- First-Responder Shortage (3.2.4)
- Loss of Clean Water (3.2.5)
- Pandemic/Epidemic (3.2.6)
- Oil Refinery Incidents (3.2.7)

- Long-Term Power Outage (3.2.8)
- Train Accident (3.2.9)
- Fallen Aircraft (3.2.10)
- Civil Disturbance (3.2.11)
- Bridge Collapse (3.2.12)
- Supply Chain Disruption (3.2.13)

Hazard Profile Details

A hazard profile has been created for each hazard in the previous section. These profiles provide information about the hazards' likelihood, magnitude, location, duration, seasonal pattern, speed of onset, and availability of warning.

The Compounding Hazards section indicates if the occurrence of each hazard has the potential to cause/enable additional disasters.

- Frequency of Occurrence How often it is likely to occur. Frequency has been separated into four categories:
 - o Highly Likely Nearly 100% probability in the next year.
 - o Likely Between 10 and 100% probability in the next one year, or at least one chance in 10 years.
 - o Possible Between 1 and 10% probability in the next one year, or at least one chance in 100 years
 - o Unlikely Less than 1% probability in the next 100 years.
- Magnitude and Potential Intensity How bad it can get. Magnitude has been separated into four categories:
 - o Critical Affects more than 50% of the community.
 - o Severe Affects between 25% and 50% of the community.
 - o Limited Affects between 10% and 25% of the community.
 - o Negligible Affects less than 10% of the community.
- Location Where this hazard is most likely to occur in the community and the probable spatial extent
 or how large an area it is likely to affect.

- Duration How long the initial event or occurrence can be expected to last.
- Seasonal Pattern The time of year that an event is most likely to occur.
- Speed of Onset How fast it is likely to occur. Speed of onset has been separated into four categories:
 - o Minimal or no warning.
 - o 6 to 12 hours warning.
 - o 12 to 24 hours warning.
 - o More than 24 hours warning.
- Availability of warnings The types of warning systems (if any) in place to warn about the hazard.

The Compounding Hazards section indicates if the occurrence of each hazard has the potential to cause/enable additional disasters to occur. Also, a recording of historic events involving the hazard is included at the end of each hazard profile to help provide more context and insight. Some of the events listed in this section may not have taken place within the West Bountiful City limits, but the inclusion of the disaster provides insight into either what West Bountiful experienced during the same event or may experience during a similar future event.

3.1 - Natural Disasters

These hazards include all disasters that occur without any human prompting and that cannot be avoided or stopped through human effort.

3.1.1 - Earthquakes

This section assumes a hazard of an earthquake greater than 5.0 magnitude since smaller earthquakes may not cause much or any damage.

Earthquakes are one of the most serious natural hazards along the Wasatch Front. The Wasatch Fault is one of the most seismically active fault lines in the Intermountain Seismic Belt. Earthquakes have been recorded every year along the Wasatch front since the pioneers first settled the valley in 1847. Geologic studies and maps included in the West Bountiful City General Plan show recent fault scarps generally running north-south along the eastern part of the City. Seismic activity is common throughout the area and is expected to continue. In the last 100 years there have been at least 15 earthquakes above a 5.5 magnitude in the state of Utah.⁵ Two of these earthquakes have occurred in close proximity to West Bountiful City.⁶ One in 1949 and one in 2020. The conditions along the Wasatch Front create the potential for the region to experience a 7.0-7.5 magnitude earthquake in the future.

The greatest threat from an earthquake is the physical displacement of the ground and strong shaking that can cause liquefaction. There is evidence that some of the past earthquakes in this area have resulted in vertical displacements in excess of ten feet. Property and buildings located adjacent to the fault scarps are subject to damage from an earthquake. Liquefaction is when unconsolidated soils become unstable when subjected to earthquake ground shaking. When soil liquefies, it loses strength and behaves as a viscous liquid (like quicksand) rather than as a solid. This can cause buildings to sink into the ground or tilt; empty, buried tanks to rise to the ground surface; slope failures, etc. Recent seismographic studies have mapped the liquefaction potential for the Wasatch Front. Surface fault ruptures are another potential earthquake-related hazard. Strong earthquakes could cause the ground along and/or near the fault line to split a few inches to several feet. Because of Centerville's close location to the Wasatch Fault Line, the City may experience surface fault rupture during a powerful earthquake.⁷

⁵ geology.utah.gov/earthquakes

⁶ https://kutv.com/news/local/a-history-of-utahs-largest-earthquakes

Details about the effects earthquakes can have on a City were gathered from the Multi-Hazard Mitigation Plan created by Dustin Lewis for South Jordan

Only two fatalities have occurred due to earthquakes in Utah's history. But West Bountiful's close proximity to an active fault line brings the potential for structural damage and fatalities.

<u>Compounding Hazards</u>: Bridge Collapse, Loss of Clean Water, HAZMAT, Oil Refinery Incident, Long-Term Power Outage, Flooding, First-Responder Shortage, Supply Chain Disruption.

Frequency of Occurrence: POSSIBLE - Between 1 and 10% probability in next year, or at

least one chance in the next 100 years

Magnitude: CRITICAL – Affects more than 50% of the community.

Location: The entire City is at risk for ground shaking and some areas

are at risk for liquefaction. Fault Scarps run north to south on the eastern side of the City. The liquefaction potential in the West Bountiful area varies from very low to high, depending upon the proximity to high water tables such as around streams and wetlands. Some areas of particular liquefaction risk are:

1. Areas along Mill Creek (approx. W 100 N).

Areas along Deuel Creek (between (2000 N and 1850 N).
 An area between W 1600 N and 1850 N, and N 1100 W and

N 900 W.

4. An area between I-15 and 500 W, and 550 N and 1000 N.

5. Areas along Porter Ln.

Duration: The initial quake will likely last a few seconds to less than a

minute. Aftershocks may continue for days or weeks after, and

recovery will take weeks or months.

Seasonal Pattern: This hazard has no seasonal pattern.

Speed of Onset: Minimal or no warning.

Availability of Warnings: None.

Historic Events in West Bountiful:

2020: A 5.7 magnitude earthquake with an epicenter in Magna, UT.

1949: A 5.0 magnitude earthquake with an epicenter in Salt Lake City, UT.

3.1.2 - Severe Winter Weather

Utah has experienced many severe winter storms over the years. Severe winter weather has two main components: cold temperatures and snowfall. Utah is known to have very cold temperatures in the winter which can lead to a higher risk of exposure for people who are outdoors or who do not have proper insulation in their home. Snowfall in West Bountiful is often influenced by the Great Salt Lake which lies directly west of the City. Severe winter storms can dump several inches to well over a foot of snow in a short time. Such high amounts of snowfall can lead to transportation dangers, power outages, and increased risk of exposure.

Compounding Hazards: None.

Frequency of Occurrence: LIKELY - Between 10 and 100% probability in next one year.

or at least one chance in ten years.

Magnitude: CRITICAL – Affects more than 50% of the community.

Location: The entire City is at risk though some areas may experience

more severity than others.

Duration: The storm may last from hours to days. Recovery from the

storm may take days to a week.

Seasonal Pattern: Most likely to occur from late fall to early spring.

Speed of Onset: More than 24 hours warning.

Availability of Warnings: The National Weather Service issues watches, warnings, and

advisories.

Historic Events in West Bountiful:8

 February 2021: Heavy snow caused 219 automobile crashes statewide and dumped 11.7 inches of snow.

• January 2004: a windy snowstorm caused 60 traffic accidents in northern Utah.

• In November 1994: Bountiful experienced cold temperatures and received 17 inches of snow.

- January 6-11, 1993: A major heavy snow fell nearly continuously for a six-day period. Salt Lake International reported a record "storm" total of 23.3 inches/26 inches on the ground. This action activated the Utah National Guard who assisted in snow removal.
- November 1992: Bountiful received 16 inches of snow.
- April 1991: Bountiful received 12 inches of snow.
- March 1983: The bench areas of Salt Lake and Davis counties received over 18 inches of snow.
- December 1982: Heavy snow fell throughout northern Utah with the Bountiful bench receiving 17 inches.
- January 1981: Days of subzero temperatures.
- January 1960: Heavy snows caused 118 accidents in Utah.
- Winter of 1948 1949: It was the coldest winter on record with record snowfall along the Wasatch Front. 10 people died from exposure.

3.1.3 – High Winds

Davis County is particularly susceptible to high winds/microbursts. These events typically involve very high wind speeds that can result in damage to infrastructure. These winds can occur without an accompanying storm. These events can either be straight-line winds that often spawn from thunderstorms or down-slope winds that occur when winds accelerate down mountain slopes and result in high winds at the foot of the mountains.⁹

Compounding Hazards: Long-Term Power Outage, Fallen Aircraft.

Frequency of Occurrence: LIKELY - Between 10 and 100% probability in next one year, or

at least one chance in ten years.

Magnitude: LIMITED – Affects between 10% and 25% of the community.

Location: The entire City is at risk though some areas may experience

more severity than others.

Duration: A few minutes to hours, or potentially a day. Effects may last a

week.

⁸ https://sites.google.com/a/alpinedistrict.org/weather-almanac/

⁹ Some details about high winds were gathered from the Multi-Hazard Mitigation Plan created by Dustin Lewis for the City of South Jordan, UT.

Seasonal Pattern: May occur at any time of year. Most frequently occurs in the

spring or fall.

Speed of Onset: 12 - 24 hours of warning.

Availability of Warnings: The National Weather Service issues watches, warnings, and

advisories.

Historic Events in West Bountiful:10

Between the years 1855 and 2020, 23 major high wind events have resulted in everything up to 120 MPH winds, overturned railroad cars, severe building damage, widespread loss of power, and other various damages.

- September 2020: High wind caused nearly 125,000 Rocky Mountain Power customers to lose power. Hundreds/thousands of trees were destroyed.
- 2016: A strong wind hit Davis County.
- December 2011: Wind hit Centerville hard and caused \$6.1 M of damage in Davis County.
- January 2005: canyon winds gusted to 56 mph in Bountiful and 53 mph in Farmington.
- December 1997: Strong winds of 50 to 70 mph hit Davis and Weber Counties.
- July 1994: Bountiful had a wind gust to 82 mph.
- November 1991: Canyon winds up to 76 mph occurred in Centerville, flipping a semi-truck over.
- January 1988: Hurricane Force winds hit most of the Wasatch front.
- March 1988: A localized easterly canyon wind event in Davis County produced 80 mph winds.
- December 1988: A severe canyon wind episode began across northern Utah. Centerville had a gust to 104 mph. One-half million people were left without power. The winds uprooted trees, blew out windows, moved trailers off their foundations and damaged roofs.
- January 1987: Strong easterly winds blew into northern Utah. Some of the wind gusts were 98 mph in Centerville and 89 mph in Bountiful.
- July 1986: Microburst winds blew a roof off a building in Woods Cross.
- October 1986: Easterly canyon winds caused some damage in Davis County. Centerville had a gust to 84 mph.
- November 1986: Easterly winds gusted to 81 mph in Bountiful.
- April 4-5, 1983: A severe canyon wind was experienced along the Wasatch Front from Utah County northward. Widespread 60-80 mph gusts were noted with a peak gust of 104 mph measured in the Layton area. Utah Power and Light reported 54 major transmission towers from the Ben Lomond Substation were either damaged or destroyed. 12 flatbed railroad cars from the Union Pacific with loaded trailers were overturned near Farmington.
- The Bountiful Bench had a gust to 120 mph. The winds blew the roofs off buildings and homes and blew down power lines, signs and trees.
- November 1982, winds gusted to 70 mph at Bountiful.
- November 1978: Strong easterly canyon winds blew along the Wasatch Front.
- March 1974: A windstorm blew through northern Utah with gusts of 75 mph in Bountiful.
- May 1970: Winds up to 100-mph in Davis County injured 35 people, overturned airplanes and damaged hundreds of homes.
- October 1959: Gusty easterly canyon winds up to 90 mph caused extensive damage in Davis County.
- April 1931: Winds blew over thousands of trees, hundreds of power poles and a dozen railroad freight cars in Davis County.
- February 1910: Severe winds ripped down phone wires from Salt Lake City northward.
- December 1898: A severe canyon wind episode leveled many structures in Davis and Weber Counties.
- 1855: Pioneers reported easterly winds which blew down homes and blew carriages and wagons over from Logan to Woods Cross.

¹⁰ https://sites.google.com/a/alpinedistrict.org/weather-almanac/

3.1.4 – Tornado

Tornadoes occur when warm, humid air collides with cold, dry air, which usually results in a thunderstorm. As the warm air rises through the cold air, an updraft can be formed which can result in a telltale rotating funnel. Large tornadoes can be extremely destructive with wind speeds of 250 MPH or higher and can leave a wide trail of destruction multiple miles long. Tornados are also very unpredictable. Though tornados are uncommon in Utah, 27 tornadoes have touched down in Davis County since 1950. The diameter of most tornado funnels in Utah is between 10-20 yards, though the largest reported funnel was 440 yards across. Utah tornados usually are gray or brown in color, but have also been red, black, and white 12

Compounding Hazards: Loss of Clean Water, Long-Term Power Outage, HAZMAT Incident, Bridge Collapse.

Frequency of Occurrence: POSSIBLE - Between 1 and 10% probability in next year, or at

least one chance in the next 100 years.

Magnitude: LIMITED – Affects between 10% and 25% of the community.

Location: The entire City is at risk though some areas may experience

more severity than others.

Duration: The actual tornado funnel may only last for a few minutes, but

the associated storm may last hours or days longer.

Seasonal Pattern: Most likely to occur from late spring through early fall. Unlikely to

occur in the winter months. Most likely during the afternoon or

evening.

Speed of Onset: Minimal or no warning.

Availability of Warnings: The National Weather Service issues watches, warnings, and

advisories.

Historic Events in West Bountiful:

Twelve tornadoes touched down in Davis County between 1963 and 2021. A few of the most relevant events are:

- September 2, 2021 an E-F1 (weak tornado) touched down twice in Woods Cross City.¹³
- August 11, 1999: A strong F2 (113-157 MPH) tornado tore a destructive path through the Salt Lake metropolitan area of Salt Lake City. The tornado killed one person, injured more than 80 people, destroyed or damaged 500 trees, and caused about \$170 million in damage.
- July 1995: A tornado hit Centerville. The damage path was about one-half mile long and 175 yards wide. Roofs, fences, and trees were damaged.
- June 1993: A tornado hit Davis County.
- June 1972: A large dust devil in Bountiful tore part of the roof off a house under construction and broke several glass windows.
- June 1970: a tornado was photographed touching down between Farmington and Centerville.
- June 1963: A tornado also caused considerable damage in Bountiful.

3.1.5 - Flooding

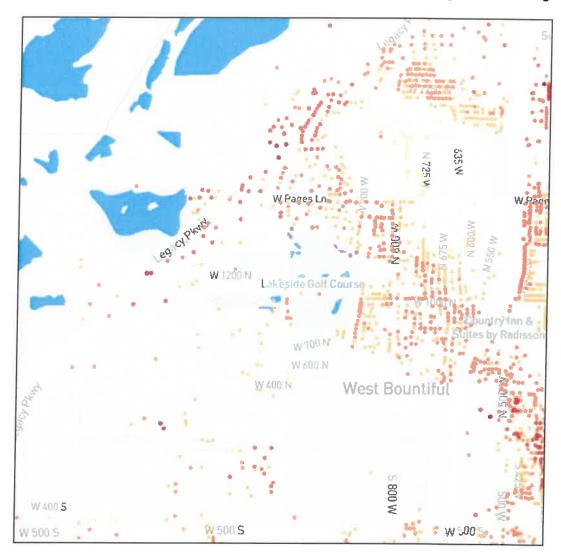
West Bountiful City has experienced damaging floods in the past. The high mountains to the east are subject to heavy precipitation and high snowfall that may result in heavy spring runoff. Flooding can also result from

¹¹ https://www.homefacts.com/tornadoes/Utah/Davis-County.html

¹² Details about tornadoes were gathered from the Multi-Hazard Mitigation Plan created by Dustin Lewis for the City of South Jordan, UT.

¹³ https://www.abc4.com/news/confirmed-tornado-touches-down-in-davis-county/

heavy rains. Despite mitigation, the potential for damaging flash floods remains high. In addition, the building of Legacy Parkway has caused some flooding in the areas to the east of the highway due to drainage issues.



Flooding can occur slowly over days or weeks, or it can occur in minutes. Flooding is likely only to occur in areas within the City's flood zones, but flood zones can change or increase over time and depending on the level of water. According to the Flood Factor website, approximately 822 properties are at risk of flooding in the City limits, and 230 of those properties have a 5% chance of being flooded this year.¹⁴

Cascading Disasters: None.

Frequency Occurrence:

of POSSIBLE - Between 1 and 10% probability in next year, or at

least one chance in the next 100 years.

Magnitude: NEGLIGIBLE – Affects less than 10% of the community.

Location: Flooding is likely to only affect areas of the City within the flood

zones. As outlined in the floodmap above

¹⁴ https://riskfactor.com/city/west-bountiful-utah/4982840 fsid/flood

Duration: May last hours or days. Large-scale flooding may last a week or

more in some areas.

Seasonal Pattern: Flooding caused by rapid snowmelt will most likely occur in the

spring. Flooding caused by heavy rainfall will likely occur in the

spring or summer.

Speed of Onset: 12 to 24 hours warning; May occur with more than 24 hours

warning.

Availability of Warnings: Monitoring situations may give some advanced notice. The

National Weather Service sometimes issues Watches, Warnings.

and Advisories relating to flooding.

Historic Events in West Bountiful:

• 1983: Rapid snowmelt caused many creeks to overflow their banks, fields to flood, and the Great Salt Lake level to rise.

 August 1923: One of Utah's most disastrous and deadly floods caused severe damage to Farmington, Centerville, and Willard. Observers in Farmington Canyon reported flood crests 75-100 feet high and 200 feet wide. Patrons at nearby Lagoon were rescued from trees and roofs as they sought refuge from the rapidly rising waters.

3.1.6 - Drought

A drought occurs when a region receives less than the necessary annual accumulated precipitation for the agricultural and metropolitan needs of the region. Arid regions and environments like south Davis County are particularly susceptible to droughts. Utah will often go several weeks during the summer and fall without any substantial rainfall. The vast majority of the State's precipitation is received during the winter as snowfall in the mountains. As this snow melts in the spring, the reservoirs, lakes, and rivers fill with water to supply the state life until the next winter. Dry winters lead to dry summers. Multiple subsequent dry winters lead to statewide droughts.

Droughts can severely impact the state's agricultural and livestock industries. High summer temperatures without the needed levels of water can result in livestock death and loss of crops. Though West Bountiful does not have an agricultural industry, the City is still susceptible to the effects of a drought, by creating shortages of water as less water fills reservoirs and other water storage containers which may limit the amount of water the residents can access. Some noticeable effects of droughts are lower levels of rivers, lakes, and reservoirs. Fluctuations of the level of the Great Salt Lake can also be an indication of droughts.

Additional drought information can be found through the State of Utah. 15

Cascading Disasters: None.

Frequency
Occurrence:

of LIKELY - Between 10 and 100% probability in next one year, or at

least one chance in ten years.

Magnitude:

CRITICAL - Affects more than 50% of the community.

Location:

The entire City is equally at risk.

Duration:

May last weeks, months, or potentially multiple years in a row.

¹⁵ https://site.utah.gov/dps-emergency/wp-content/uploads/sites/18/2019/02/6-Drought.pdf

Seasonal Pattern: Droughts primarily occur in the summer but may also extend into

the fall months. Major multi-year droughts occur in Utah every

5-10 years.

Speed of Onset: More than 24 hours warning.

Availability of Warnings: The National Weather Service Forecast Office monitors drought

conditions and makes forecasts and predictions regarding drought

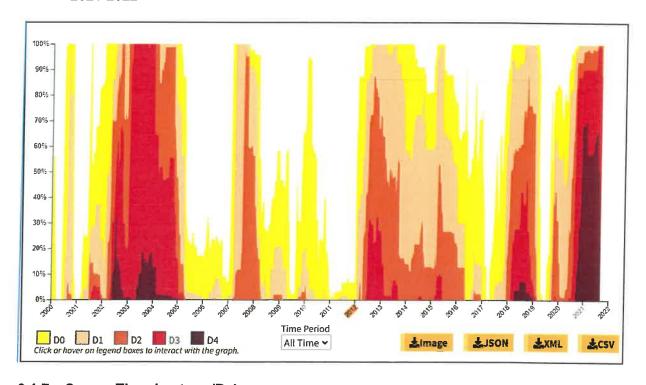
conditions.

Historic Events in West Bountiful:

Utah has experienced many droughts in the past and will likely continue to do so. Though no recent drought has affected West Bountiful specifically, the City will be affected by statewide droughts.

Statewide D2-D4 (severe-exceptional) droughts have occurred in Utah in the following years as outlined in the map below:¹⁶

- 1898-1905
- 1928-1936
- 1946-1964
- 1976-1979
- 1987-1992
- 1999-2004
- 2012-2016
- 2021-2022



3.1.7 - Severe Thunderstorm/Rain

Spring and summer thunderstorms can occur multiple times every year, and the associated lightning and potential for heavy rain can pose a threat to City residents. Lightning strikes can put residents in danger and cause structural damage and power outages. Heavy rain can cause flooding within the City. Thunderstorms in

¹⁶ https://www.drought.gov/states/utah

nearby areas such as in the mountains to the east of the City can result in hazards (such as flooding) in the City. According to the National Weather Service, a severe thunderstorm by definition is a thunderstorm that produces one inch hail or larger in diameter and/or winds equal to or exceeding 58 miles an hour. 17

Cascading Disasters: Flooding, High winds, Tornados, Fires.

Frequency of Occurrence: HIGHLY LIKELY - Near 100% probability in the next year.

Magnitude: NEGLIGIBLE – Affects less than 10% of the community.

Location: The entire City is at risk, though some areas may experience

more severity than others.

Duration: From a few minutes to hours.

Seasonal Pattern: Most likely to occur in the late spring to early fall. Most likely to

occur in the late afternoon and evening.

Speed of Onset: 12 to 24 hours warning; May have more than 24 hours warning.

Availability of Warnings: The National Weather Service issues watches, and warnings.

Historic Events in West Bountiful:

September 2021: Severe thunderstorms caused a fire burning over 300 acres.

• June 1995: Centerville received .79 inches of rain in 10 minutes.

• June 1993: One-inch diameter hail hit Davis County.

• July 1951: A severe electrical storm hit Salt Lake and Davis counties. Sections of the highway between Bingham and Copperton were destroyed. Two cars were completely buried by the mud.

 Summer 1943: Severe thunderstorms produced large hail, heavy rain, and caused extensive flooding that killed 23,300 turkeys in Box Elder, Davis, Weber, and Utah counties.

3.2 - Man-Made Disasters

These hazards include all disasters with human involvement.

3.2.1 - Cyber Attack

With the advancement of technology across all sectors and industries, the risk of experiencing a cyber attack has risen dramatically. Recent news headlines show that hackers are attacking local governments. This could be because 1) local governments have large amounts of money that can be paid as ransom, and 2) because local governments generally have invested less into cyber security. Cyber attacks may result in a decreased ability for the City to perform services for the residents.

Cyber attacks can happen in a variety of ways. Some common types of attacks are: 18

- Ransomware: Hackers will gain access to the organization's critical information and will "lock" this
 information so that it can not be accessed without a specific key that the hackers create. The hackers
 will then demand a ransom in return for this key. Hackers may threaten to publish this information,
 which may include personal information (taxpayer information, billing information, etc.) if the ransom is
 not paid within a certain timeframe.
- <u>Social Engineering Attack</u>: These attacks are when hackers exploit the human aspect of an
 organization in a variety of ways. Hackers may pose as the organization's leader or IT department, the
 organization's bank, or another "trusted" source and will ask a member of the organization to send

¹⁷ https://www.weather.gov/bgm/severedefinitions

¹⁸ https://www.mass.gov/service-details/know-the-types-of-cyber-threats

money to an account controlled by the hacker or to divulge sensitive information. Many of these attacks come via email, which are often known as "phishing" attacks. Hackers may include links in these emails that are embedded with a malicious virus that will lead to ransomware or other attacks. Hackers may also try to befriend employees to gain physical access to secure locations in the organization's IT infrastructure and may attempt to get employees to insert malicious thumb drives into network computers.

 <u>Denial of Service (DOS) Attack</u>: Hackers may flood an organization's server with an overload of requests with the intent to disrupt the server or cause it to crash. This attack may be targeted at the organization's firewall or other critical technology areas.

With these and many more types of attacks threatening all local governments, this particular hazard poses a significant threat to the City.

Cascading Disasters: None.

Frequency

of LIKELY - Between 10 and 100% probability in next one year, or at

Occurrence:

least one chance in ten years.

Magnitude:

CRITICAL - Affects more than 50% of the community.

Location:

The entire City is at equal risk.

Duration:

The initial attack may only last a few minutes, but recovery may last days, weeks, or months depending on what mitigation and

recovery preparations are in place.

Seasonal Pattern:

May occur any time of year.

Speed of Onset:

Minimal or no warning.

Availability of Warnings:

None; May have slight warning if cyber defense is strong.

Historic Events in West Bountiful:

Though there is no record of West Bountiful experiencing a cyber attack, the following attacks indicate the threat to the City.

- September 2022: Eagle mountain was tricked by cyber criminals who hacked an email and inserted themselves into a conversation. Ultimately leading to the transfer of \$1.14M being sent to the scammers.
- July 2021: Clearfield, UT was a target of a ransomware attack. Hackers demanded millions of dollars.
- April 2019: Garfield County, UT was attacked through phishing and ransomware. The ransom was paid.²⁰
- August 2016: San Juan & Emery Counties experienced a phishing attack.²⁰

3.2.2 - Terrorism/Mass Violence

The Federal Bureau of Investigation defines terrorism as violent, criminal acts committed by individuals and/or groups to further ideological goals stemming from domestic influences or inspired by foreign terrorist organizations or states.²¹ Many of these acts of terror that would affect West Bountiful are more likely to occur in other cities. For example, a domestic terror attack on nearby water treatment plants could result in a

¹⁹ https://www.ksl.com/article/50209154/hackers-demand-millions-of-dollars-from-clearfield

²⁰ https://www.seculore.com/resources/cyber-attack-archive/utah#public safety

²¹ https://www.fbi.gov/investigate/terrorism

shortage of drinking water in West Bountiful. Or a cyber attack on the City or State could limit the City's ability to provide services to the public.

Situations of mass violence, such as mass shootings at public places, are also a threat to metropolitan areas. However, because West Bountiful has few large gathering places that are targets for mass violence, the likelihood of an attack taking place in the City is lower than for other nearby cities.

Cascading Disasters: HAZMAT, Lack of first responders, Loss of access to clean water.

Frequency of Occurrence: POSSIBLE - Between 1 and 10% probability in next year, or at

least one chance in the next 100 years.

Magnitude: LIMITED – Affects between 10% and 25% of the community.

Location: West Bountiful Elementary, Costco, Lowes, the various Church of

Jesus Christ of Latter-day Saints meeting houses, and the Holly

Oil Refinery.

Duration: The initial attack may only last a few minutes, but recovery may

last days or weeks.

Seasonal Pattern: May occur any time of year.

Speed of Onset: Minimal or no warning.

Availability of Warnings: None.

Historic Events in or near West Bountiful

No events of Terrorism/Mass Violence have occurred in the City.

3.2.3 - HAZMAT Incident

Many disasters include the spill or release of harmful or toxic materials. These hazardous materials are either flammable, explosive, radioactive, toxic, corrosive, or oxidizable. Despite many federal laws in place to reduce the likelihood of a HAZMAT incident, this type of incident occurs frequently and may include accidents of trains or trucks transporting hazardous materials, hazardous pipeline leaks, and hazardous gasses being released into the air. Many of these incidents may not affect anyone, but others have the potential for widespread damage.

Cascading Disasters: Lack of Clean Water.

Frequency of Occurrence: HIGHLY LIKELY - Nearly 100% probability in the next year.

Magnitude: NEGLIGIBLE – Affects less than 10% of the community.

Location: Some potential locations of a HAZMAT incident are:

- Railroad tracks, I-15, and Legacy Parkway

- Questar High-pressure Natural Gas. Goes west down 2200

north into the distribution/pump station at 870 west.

- Questar Low-pressure Natural Gas. Goes southwest through

the City starting at the distribution/pump station

at 870 west 2200 north.

²² https://www.fema.gov/sites/default/files/2020-07/hazardous-materials-incidents.pdf

- Gas pipe running on the east side of the prospector rail trail.

- Above ground fuel tanks at City Hall (100 gallons and the golf

course shops (three tanks of 2,000 gallons total).

- West Bountiful also has 2 main sewer lines going through the City to the treatment plant west of the City. One runs west near 1200 north from Bountiful and is a 36" pipe. Another runs southwest, starting at 640 west and 2350 north, and runs to the

treatment plant.

Duration:

May last minutes to hours.

Seasonal Pattern:

May occur any time of year.

Speed of Onset:

Minimal or no warning.

Availability of Warnings:

None.

Historic Events in or near West Bountiful

According to the Utah Environmental Incidents Database, there have been approximately 86 total incidents of varying severity in West Bountiful since 1991. Approximately 71 incidents related to the Holly Oil Refinery in West Bountiful.²³ More information will be given about the Holly Oil Refinery specifically in a subsequent section.

3.2.4 - First-Responder Shortage

West Bountiful City does not have any fire/emergency first response and instead relies on the South Davis Metro Fire for all fire and medical emergency response. The South Davis Metro Fire Department provides emergency and public services to the cities of Bountiful, Centerville, North Salt Lake, West Bountiful, Woods Cross and the unincorporated areas of South Davis County. The emergency services provided include fire, ambulance, paramedic, hazardous material and technical rescue response.²⁴

The area covered by South Davis Metro Fire serves nearly 100,000 residents. In the event of a Severe regional disaster, this limited number of first responders will be responding to many areas around Davis County which will decrease the number of available first-responders within West Bountiful. If such a disaster has a high number of casualties, then the lack of available first-responders will exacerbate the initial effect of the regional disaster.

Cascading Disasters: None.

Frequency
Occurrence:

of POSSIBLE - Between 1 and 10% probability in next year, or at

least one chance in the next 100 years.

Magnitude:

CRITICAL - Affects more than 50% of the community. This may

change depending on the type of disaster.

Location:

Depends on the type of regional disaster; May affect residents

Citywide.

Duration:

Depends on the type of regional disaster; May last hours or days.

Seasonal Pattern:

Depends on the type of regional disaster; May occur any time of

year or be season specific.

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²³ https://eqspillsps.deq.utah.gov/Search_Public.aspx

²⁴ https://www.sdmetrofire.org/

Speed of Onset:

Depends on the type of regional disaster; May have advanced or

no warning.

Availability of Warnings:

Depends on the type of regional disaster; may have available

warning or no warning whatsoever.

Historic Events in or near West Bountiful

Such an event has not yet occurred in the South Davis County Area.

3.2.5 - Loss of Clean Water

West Bountiful has two water tanks east of the City. One is a 1,500,000-gallon concrete tank built in 1996 and the other is a 1,000,000-gallon concrete tank built in the early 1970s. The City has two wells that provide drinking water to residents, with the well located at 400 N 600 W also having backup power in the event of a power outage. The wells do not have a tank but pump water into the other two tanks or supply the City directly.

The main water pipes come into the City under I-15 around 200 north. West Bountiful also has two open canals that run through the City which are maintained by the county. One is the DSB Canal that runs under the north end of the City park, and opens up at 600 west and 2000 north, running west and crossing under 1100 west about 1875 north and ending at Bountiful Pond. The other starts at 1-15 just south of 500 south, goes north about 725 west, on the west side of the trailer park and is open starting about 450 south. It goes north and turns west down the north end of Holy Refinery property at about 50 north. It runs west until 1450 west, where it turns north. There is a canal that continues west from there for overflow / high water, but most if not all is directed north until 300 north, then turns west again until about 1600 west. From there it is directed north going under Legacy Parkway and emptying into Bountiful Pond. The overflow goes west until 1800 west, and then is directed north under Legacy Parkway and into the Treatment Plant. More details of the City's water systems can be found in Appendix 7.

Loss of access to clean drinking water would be catastrophic. Humans can survive for a maximum of three days without water. During the heat of the summer months, that time would be shortened. Even a partial loss of access would pose a significant threat to life. A loss of access to clean water could come from a terrorist incident, another natural disaster, or an infrastructure malfunction.

Cascading Disasters: None.

Frequency Occurrence:

of POSSIBLE - Between 1 and 10% probability in next year, or at

least one chance in the next 100 years.

Magnitude:

CRITICAL - Affects more than 50% of the community. This may

change depending on the type of disaster.

Location:

The City well, the pipes that bring water into the City, or the water

treatment plant

Duration:

May last hours, days, or weeks depending on the damage.

Seasonal Pattern:

May occur any time of year.

Speed of Onset:

Minimal or no warning.

Availability of Warnings:

None.

Historic Events in or near West Bountiful

Such an event has not yet occurred in the Davis County Area.

3.2.6 - Pandemic/Epidemic

Frequency

A pandemic/epidemic is when there is an outbreak of an infectious disease that spreads across a geographical region or the entire world. The COVID-19 pandemic highlights the fact that a pandemic/epidemic has the potential to cripple society.

In today's age of frequent international travel and urban living, diseases often spread rapidly. These outbreaks can cause fear, supply shortages, illness, and death. Though pandemics/epidemics range in magnitude, this section will assume a serious disease that has the potential to spread quickly and result in death.

Cascading Disasters: Disrupted supply chains, First-Responder Shortage.

of POSSIBLE - Between 1 and 10% probability in next year, or at

Occurrence: least one chance in the next 100 years.

Magnitude: CRITICAL – Affects more than 50% of the community,

Location: The entire City is at risk, though some areas may experience

more severity than others.

Duration: May last weeks, months, or over a year.

Seasonal Pattern: May occur any time of year, but infection rates of all diseases

usually increase in the winter months.

Speed of Onset: More than 24 hours warning.

Availability of Warnings: The U.S. Center for Disease Control and the Salt Lake Health

Department may issue warnings, and advisories.

Historic Events in or near West Bountiful:

The following past pandemics/epidemics have directly affected Utah.²⁵

- 2020: COVID-19.
- 2013: Hepatitis C.
- 2011: Swine Flu.
- 2011: Measles.
- 2003: West Nile.
- 1993: Hantavirus.1985: Rheumatic Fever.
- 1918: Spanish Flu.
- 1880: Diphtheria.

3.2.7 – Oil Refinery Incident

West Bountiful is home to the HollyFrontier Corporation's oil refinery. This facility is located at 393 S 800 W, Woods Cross, UT 84087 (the facility property is primarily positioned within the West Bountiful City limits). This facility has a crude oil capacity of 45,000 barrels per day. The products of the refinery are marketed primarily in Utah, Idaho, Nevada, Wyoming, and eastern Washington.²⁶

Potential hazards surrounding an oil refinery incident include the release of hazardous gasses into the air, spilling hazardous liquids, contaminating water sources, fires, and explosions. Based on the frequency of historical incidents at the refinery, the likelihood of another event is very high. Historically, these events have had a low magnitude and only affected a small percentage of the City. However, the oil refinery has the potential to create an incident that would be a major threat to the safety of the residents of West Bountiful and

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²⁵ https://www.ksl.com/article/46727920/7-serious-disease-outbreaks-in-utah-history

²⁶ https://www.hfsinclair.com/home/default.aspx

the surrounding areas, such as creating a toxic cloud that covers the City or a large explosion. The analysis of this hazard will assume a "worst-case scenario" incident. Incidents of lesser magnitude are likely to happen much more frequently.

Cascading Disasters: None.

Frequency of POSSIBLE – Between 1 and 10% probability in the next one year.

Occurrence: or at least one chance in 100 years

Magnitude: SEVERE – Affects more than 50% of the community.

Location: The areas close to the refinery are at the greatest risk, specifically

areas north of 200 N and 1000 N. A large incident has the

potential to affect the entire City.

Duration: May last seconds, minutes, or hours, but the recovery may take

hours or days.

Seasonal Pattern: May occur any time of year.

Speed of Onset: Minimal or no warning.

Availability of Warnings: None.

Historic Events in or near West Bountiful

According to the Utah Environmental Incidents Database, there have been approximately 86 total incidents of varying severity in West Bountiful since 1991. Approximately 71 incidents related to the Holly Oil Refinery.

3.2.8 – Long-Term Power Outage

Power outages lasting from a few minutes to a few hours are fairly common and can be caused by a variety of things. This type of event does not pose any real threat. However, power outages that extend for several hours or days could cause a variety of problems in West Bountiful. Providing critical services to residents would become much more difficult. A long-term loss of power could also reduce resident's ability to keep perishable food and stay protected from the elements.

Cascading Disasters: HAZMAT Incident, Flooding, Loss of clean water.

Frequency of Occurrence: UNLIKELY – Less than 1% probability in the next 100 years.

Magnitude: CRITICAL – Affects more than 50% of the community. This may

change depending on the type of disaster.

Location: The entire City is at risk, though some areas may experience

more severity than others.

Duration: Hours or days.

Seasonal Pattern: May occur any time of year.

Speed of Onset: Minimal or no warning.

Availability of Warnings: None.

Historic Events in or near West Bountiful

No long-term power outage has been recorded in West Bountiful or in the surrounding area.

3.2.9 - Train Accident

West Bountiful has multiple railroad tracks running north to south on the eastern border of the City. These tracks are used by the UTA Frontrunner and various major railroad shipping companies.

A train accident could happen in several ways. Someone could commit suicide on the tracks. A vehicle could get stuck on the tracks or try to beat the train at a railroad crossing and be struck. And a mechanical malfunction could cause a train to derail or experience another form of accident. Some within the railroad industry have warned that many train companies are spending less time ensuring safety in an effort to save costs. This may increase the likelihood of a train accident within the West Bountiful limits.

Cascading Disasters: HAZMAT Incident, Fire.

Frequency of Occurrence: LIKELY - Between 10 and 100% probability in the next one year.

or at least one chance in 10 years.

Magnitude: NEGLIGIBLE – Affects less than 10% of the community.

Location: The train(s) involved and the infrastructure along the tracks in the

immediate vicinity of the accident.

Duration: The initial accident will last seconds or a minute, but the recovery

time may last hours or days.

Seasonal Pattern: May occur any time of year.

Speed of Onset: Minimal or no warning.

Availability of Warnings: None; Inspection of the track may indicate potential risk.

Historic Events in or near West Bountiful

Utah has experienced over 244 accidents state-wide over a four-year period. Below are some recent examples of events within the West Bountiful City limits.²⁷

- March 2020: A man was left in critical condition after stopping on the Union Pacific railroad tracks.
- September 2014: A pedestrian was struck by a Frontrunner train and recovered.
- November 2012: A Union Pacific train hit an intoxicated man who recovered.²⁸

3.2.10 - Fallen Aircraft

West Bountiful is surrounded by Salt Lake International Airport, Hill Air Force Base, and multiple small airports including Skypark Airport in Woods Cross Utah. Various aircraft fly over the City regularly. The close proximity to locations where airplanes take off and land creates the risk of an aircraft crashing within the City limits.

Cascading Disasters: Bridge Collapse, Fire.

Frequency of Occurrence: POSSIBLE - Between 1 and 10% probability in the next one

year, or at least one chance in 100 years

Magnitude: NEGLIGIBLE – Affects less than 10% of the community.

Location: The entire City is at risk.

https://christensenhymas.com/utah-train-accident-lawyer/statistics/

https://www.ksl.com/article/22786910/train-hits-20-year-old-man-in-west-bountiful

Duration: The initial accident will last a few seconds, but the recovery time

may last hours or days depending on aircraft size and location.

Seasonal Pattern: May occur any time of year.

Speed of Onset: Minimal or no warning.

Availability of Warnings: None.

Historic Events in or near West Bountiful

There have been at least 22 fallen aircraft in the area surrounding West Bountiful since 2001.

3.2.11 - Civil Disturbance

A civil disturbance occurs when an individual or group of people intentionally violate laws, policies, or ordinances. A civil disturbance also disturbs or troubles the community by the conduct of the participants. If left unchecked, civil disturbance has the potential to escalate into more volatile and violent scenarios. Please note, a peaceful protest for the redress of grievances is not the same thing as a civil disturbance. Incidents of civil disturbance often occur in urban, downtown areas and rarely occur in suburban or rural areas. Since West Bountiful does not have any main social gathering places or urban areas, it is unlikely that a civil disturbance will occur within the City limits. Civil disturbance is much more likely to occur in larger cities.

Cascading Disasters: Terrorism/Mass Violence.

Frequency of Occurrence: UNLIKELY - Less than 1% probability in the next 100 years.

Magnitude: NEGLIGIBLE – Affects less than 10% of the community.

Location: Public gathering places, government buildings, schools, parks.

commercial areas. Could occur anywhere in the City.

Duration: An hour to several hours. May occur over multiple consecutive

days.

Seasonal Pattern: May occur any time of year. Most commonly occurs between

May and October. Usually occurs in the evening or at night.

Speed of Onset: 6 to 12 hours warning; May have more than 24 hours warning.

Availability of Warnings: Community reactions can be determined through an investigation

on social media. Many events that could lead to civil disturbance

are organized on social media.

Historic Events in or near West Bountiful

No incidents are on record.

3.2.12 - Bridge Collapse

Bridges provide a convenient, staple element of modern transportation infrastructure. West Bountiful has at least 13 bridges within the City limits. A bridge collapse has the potential to not only injure or kill anyone on or under the bridge but to also limit transportation around the City. This could either be a mild inconvenience or a life-threatening hazard. The location of a bridge collapse determines much of the magnitude of the hazard. A small bridge that receives little traffic will not impact the City like if a large bridge on a key evacuation route were to collapse.

A bridge over a freeway in Florida collapsed recently which sounded an alarm among some here in Utah. Over 200 bridges built around Utah used the same design as the collapsed Florida bridge. Some are concerned that some bridges in Utah may be at risk of collapsing as well. However, it is unknown if any of those 200 bridges were built in West Bountiful. Public agencies regularly inspect bridges and provide maintenance to avoid a bridge collapse. A bridge is much more likely to collapse in conjunction with another disaster like an earthquake.

Cascading Disasters: None.

Frequency of Occurrence: UNLIKELY – Less than 1% probability in the next 100 years.

Magnitude: LIMITED – Affects between 10% and 25% of the community.

Location: Bridge Locations:

The I-15 bridge over W 500 South
 The W 400 North bridge over I-15.
 The I-15 bridge over W 1600 North

4. 600 West 400 North5. 1700 North 1100 West6. 1800 North 800 West7. 350 North 1450 West

8. West End of 500 South Street.9. 0.7 Mi. North 500 South Interchange.

10. 2500 North 850 West 12. 1500 West 1200 North 13. 1500 West 1200 North

Duration: The initial event will last a few seconds to a minute. The

after-effects will last hours or days.

Seasonal Pattern: No seasonal pattern.

Speed of Onset: Minimal or no warning.

Availability of Warnings: None; Regular inspection may inspire repairs that will avoid a

bridge collapse.

Historic Events in or near West Bountiful

There is no record of a bridge collapse in West Bountiful.

3.2.13 – Supply Chain Disruption

Most grocery stores, department stores, and other businesses rely on the just-in-time inventory management method. Under this method, stores identify how frequently they need new shipments of supplies to meet their average historic needs and then receive just enough inventory to meet this average demand before the next shipment comes. Each shipment arrives to each store through the supply chain.

Though this method reduces costs for stores, it also creates a potential hazard for the community. If the supply of products is quickly reduced or the demand is suddenly increased, a store will run out of its on-hand supply very quickly. If there is any kind of disruption to the supply chain, restocking that product may take a long time, may become very costly, or may not be possible. A terrorist attack, natural disaster, pandemic, or a handful of other events could take place in another part of the country or world that would start a chain reaction of events that could decrease the supply of or increase the demand for food and supplies that people expect to be on the shelves in West Bountiful.

Cascading Disasters: Civil Disturbance, Loss of Water.

Frequency of Occurrence: POSSIBLE - Between 1 and 10% probability in next year, or at

least one chance in the next 100 years.

Magnitude: Severe – Affects more than 50% of the community. This may

change depending on the type of disaster.

Location: The entire City is at risk, though some areas may experience

more severity than others.

Duration: Days, weeks, or months.

Seasonal Pattern: Could happen any time of year. Depends on the cause of the

disruption.

Speed of Onset: More than 24 hours warning.

Availability of Warnings: News, social media, or consumer actions will likely indicate that

there could be a supply chain disruption, a decrease of supply, or

an increase in demand.

Historic Events in or near West Bountiful

 March 2020: As the COVID-19 pandemic caused lockdowns in Utah, many stores and businesses experienced supply chain disruptions. This led to a decrease in supply and an increase in demand for many essential products.

SECTION 2 - ORGANIZATION AND RESPONSIBILITIES

Section 2 provides elected officials and City staff with information regarding individual emergency response organization and responsibilities relating to the Emergency Operations Center (EOC).

The Emergency Operations Center (EOC)

The EOC is a physical location that City officials and staff can direct efforts to mitigate, prepare for, respond to, and recover from natural and man-made disasters. The EOC will provide City officials and staff with a means for organization, collaborations, and clear communication. When this EOP is activated, at least a portion of the EOC should be activated as well. During minor emergencies, the EOC may only need to be partially activated for a short time until a resolution has been reached. During large scale disasters, the EOC may be fully operational for weeks or months to oversee response and recovery efforts.

EOC Activation Process

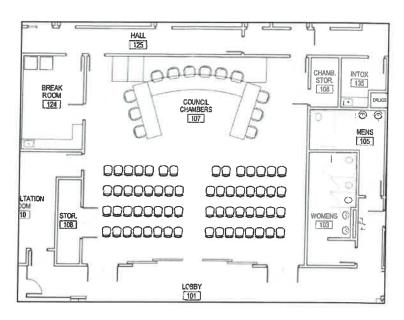
The EOC may be activated as needed to address any natural or man-disasters and/or other needs. The following levels of activation will be used:

- Phase 1: Partial activation to address disasters or emergencies that are limited in scale
- Phase 2: Activation of the entire EOC to address a large-scale disaster

The decision to activate the EOC to each relevant phase of operation will be jointly made by the Policy Group (see below). Once the decision is made, relevant City staff will immediately be notified to attend to the immediate needs of their families and report to the EOC. Upon arrival to the EOC, communications will be established with responding staff and with any other relevant entities.

EOC Location(s)

The EOC is located in the Council Chambers at the West Bountiful City Hall (located at 550 N 800 W). The following floor plan provides an overview of the Council Chambers and adjacent rooms.



Section 2 - Organization and Responsibilities

Backup EOC locations can be used in the event that the primary EOC location is compromised or unavailable during an emergency. The secondary EOC location will be the City's Public Works facility which is located at 1410 W 1200 N. During some disasters, it may be helpful for the City to also set up temporary locations called *staging areas* near the disaster scene to provide closer oversight and enable more effective preparation and response. The decision to establish a staging area may be made by the policy group.

Positions and Responsibilities for EOC Staff

When the EOC is activated, the following positions will report to the EOC to fulfill their assigned functions and all other duties as needed. See Appendix 1 for a complete list of the names, addresses, and contact info of all relevant EOC staff and their successors. The following paragraphs detail these individual's responsibilities.

Incident Commander

The incident commander is the individual who is "in charge" of the disaster response/recovery and is responsible for ensuring that all other members of EOC staff perform their responsibilities. The default incident commander will be the Mayor, though this responsibility may be delegated as needed. See Section 3 for details regarding the succession of the Mayor/Incident Commander. Upon arriving to the EOC, the incident commander will:

- Gather relevant information regarding the disaster
- Assess the situation and identify current and potential future hazards
- Ensure coordination with other entities that may be involved in the response
- Communicate with the incident commanders of other entities involved in the response or recovery for the emergency/disaster

The Policy Group

The Mayor, City Council, City Manager, Chief of Police, Emergency Manager, and the Public Works Director constitute the policy group. This group's responsibilities include but are not limited to:

- Oversee the City's overall response to each emergency/disaster in order to protect life and property
- · Establish response objectives, an action plan, and priorities
- Issue emergency proclamations and rules (i.e. a curfew)
- · Coordinate on-the-ground response actions
- Notify state officials and seek support as needed
- Communicate with impacted or supporting public and private entities
- Communicate with local, state, and federal partners
- Ensure the continued operation of critical city functions; non-essential functions may be suspended for the duration of a disaster
- Ensure the proper funding for and accounting/record keeping of emergency response actions

Emergency Manager

The Emergency Manager's responsibilities include but are not limited to:

- Coordinate the execution of the objectives and direction set by the Policy Group
- Ensures clear and frequent communication between the disaster site(s) and the Policy Group so EOC staff can be aware of the status of the response and/or recovery. Communication topics will include:
 - o Boundaries of the disaster area
 - o Perceived social, economic, or political impact
 - Status of transportation systems
 - Access points to the disaster area

Section 2 - Organization and Responsibilities

- Status of any deaths and critical and non-critical casualties
- Status of key personnel
- Resource shortfalls
- o Other key information, details, and concerns

Communications

The Community Development Specialist will serve as the City's Public Information Officer (PIO) in the event of a disaster. The PIO will have the following responsibilities (see ESF #2 in Section 4 for additional detail):

- Ensure that communication channels are available between the EOC and response efforts and external parties; distribute radios among key members of the EOC (established radio frequencies for use during emergency communication can be found in Appendix 8)
- Establish communications with local news agencies to report on the status of the disaster response/recovery
- Ensure that CERT members providing backup amateur radio communications are functional

Police & First Response

The Police Chief will serve on-scene commander in the event of a natural or man-made disaster. The City Police Department will serve as the "boots on the ground" to protect the lives of the City's residents. The 12 police officers will receive direction for priorities and objectives from the Incident Commander and the Policy Group. As needed, the Policy Group may request additional support from the Davis County Sheriff's Office and other nearby cities as part of existing mutual aid agreements.

In the event of a disaster, the Policy Group may request a South Davis Metro Fire Department (SDMFD) coordinator be assigned to the City EOC. This individual will serve as acting fire marshall. However, during regional disasters, this assignment may be unavailable if all SDMFD have responsibilities elsewhere.

Public Works

The City's Public Works Director will have the following responsibilities:

- Oversees field disaster response operations relating to public works functions such as eliminating any
 unsanitary conditions or repairing critical infrastructure within the City. Coordinates any needed repairs
 and restoration of the sewage system with the South Davis Sewer District
- Provides damage assessments to the Policy Group for all damaged infrastructure
- Supervises restoration, maintenance and operation of essential City facilities
- Supervises the clearance of debris from disaster sites
- Coordinates with utility companies for the repair and restoration of water, electrical and gas services

Finance

Prior to a disaster, the City Finance Specialist is responsible for understanding and preparing for the process by which the City can seek state or federal reimbursement for expenditures relating to disaster response and/or recovery. In the event of a disaster, the City Finance Specialist performs the following responsibilities:

- Keeps detailed records of all expenditures made in the response or recovery phases of a disaster.
 These records will later be used to seek reimbursement from the state and/or federal government
- · Keeps detailed records of volunteer time and resources used to track these numbers for reimbursement
- Records photos of areas impacted by disasters for record keeping
- Reports on the City's financial status to the Incident Commander and Policy Group as needed
- Procures needed equipment, materials, and/or supplies and maintains a detailed purchase list

Section 2 - Organization and Responsibilities

Managing the City's various insurances that may be applicable for the disaster response/recovery

Engineering

The City Engineer performs the following responsibilities:

- Coordinates actions with the Building Authority Officer and with other City departments for the repair or demolition of hazardous structures and public improvements
- Reports all damage assessment information to the Incident Commander and Policy Group

Other EOC Support Staff

In the event of a lack of communications, or in other needed scenarios, runners will be used to relay updates and communications between the EOC and the disaster location.

Phases of Disaster Operations

Each disaster will include the following bullet points, and each phase of the disaster can be managed through the EOC.

- 1. Preparation: Includes taking steps to ensure that plans and processes are understood by key elected and appointed leaders such that action can be immediately taken as soon as an incident takes place.
- 2. Mitigation: Includes taking steps to increase the City's resilience to potential natural and man-made disasters. This phase is constantly applied before, during, and after an incident.
- 3. Response: Includes responding to incidents that take place and protecting life and property.
- 4. Recovery: Includes cleanup and restoration, reimbursement requests to the state and federal government, and other efforts to return the City to full strength and capacity.

SECTION 3 - ADMINISTRATION AND LOGISTICS

Section 3 details administrative and logistical details to be used in the event of a natural or man-made disaster.

Declaration of Emergency

Pursuant to <u>UC Section 53-2a-208</u>, the Mayor of West Bountiful has the authority to declare a state of emergency. The emergency declaration will last for 30 days, but the City Council may vote to reduce or extend the length of the declaration.

Evacuation Orders

Pursuant to <u>UC Section 53-2a-205</u>, the Mayor of West Bountiful has the authority to issue an evacuation order in the event of a threat to the loss of human life and property. If the Mayor is unavailable, then the Chief of Police may issue evacuation orders for up to 36 hours if it is needed to protect the lives of residents.

Evacuations risk residents having increased exposure to the impacts of natural or man-made disasters, so the decision to evacuate will be made only as needed. The City will utilize the CodeRed emergency notification system to inform residents of the need to evacuate. Evacuation orders may also be shared with the community through social media, public announcements via police cruisers, communications through local church leaders (see Appendix 3 for a contact list for church leaders) and any other method that is deemed necessary.

Shelter in Place/Curfew Orders

[WEST BOUNTIFUL TO INCLUDE THE CITY ORDINANCE DICTATING THE SHELTER IN PLACE/CURFEW ORDERS]

The City will utilize the CodeRed emergency notification system to inform residents of shelter in place/curfew orders. Evacuation orders may also be shared with the community through social media, public announcements via police cruisers, communications through local church leaders (see Appendix 3 for a contact list for church leaders) and any other method that is deemed necessary.

Succession of Authority

Pursuant to UC Section 53-2a-807, West Bountiful's succession of authority for disaster operations is:

- 1. The Mayor
- 2. The Mayor Pro Tem
- 3. The City Administrator
- 4. The City Police Chief

The seniority of the City Council can be found in Appendix 1.

Evacuation Routes

In the event of evacuation orders being issued, residents may be instructed to evacuate. Appendix 9 shows a map of several possible evacuation routes for residents to follow. The City will utilize the CodeRed emergency notification system to inform residents of the need to evacuate. As needed, this communication may also be disseminated to residents through social media, volunteer response teams, and local church leaders.

Shelter Locations

In the event of a natural or man-made disaster, certain locations may be used to temporarily house City residents. These locations may include West Bountiful Elementary School and local meetinghouses of the Church of Jesus Christ of Latter-day Saints. These options will not provide a long-term shelter solution for residents, and long-term arrangements would likely take place in structures with more suitable accommodations within surrounding cities.

Policy for the Church of Jesus Christ of Latter-day Saints states that church meetinghouses should not be used as shelter locations unless no other shelter locations are available.²⁹ In the event of all other options being exhausted, the Policy Group may pursue using church meeting houses as temporary shelters. See Appendix 2 for the locations of these meetinghouses.

Mutual Aid Agreements

The City is a participant in mutual aid agreements. Two of these agreements include:

- <u>Utah Public Works Emergency Management</u>: Signed parties will provide requesting jurisdictions with personnel, equipment, materials, and other services to respond to damage caused by disasters.
- <u>Interlocal Agreement for Cooperative Fire Protection and Emergency Services</u>: Signed parties will send requesting jurisdictions available resources to address situations involving fires, public safety, public order, and other emergencies.

Available City Equipment

The City has the following equipment available to be used in disaster preparedness, mitigation, response, and recovery efforts:

	AVAILABLE CITY EQUIPMENT	
2015 Cat Asphalt Roller	2016 Kawasaki Mule	International Plow Truck
Case Backhoe 580 Super M	Groundsmaster 3500-G (13014)	Case 580
John Deer 5075 E	John Deer Utility Cart	Case Super Backhoe
John Deer 7400 A	John Deer Md#420 (LKE03851)	Leak Response Trailer
Caterpillar Wheel Loader 938	Mini Excavator	Leak Detection System
John Deer 2030 Pro Gator	Freightliner 106SD - HT	Chevy Silverado 1-Ton Dump

Managing Volunteer Efforts

The City's Emergency Manager is responsible for establishing and building relationships with local groups willing to volunteer in emergency response and recovery efforts. The City operates a Community Emergency Response Team (CERT) that is ready and willing to help as needed. The Emergency Manager is responsible for making regular contact with the CERT personnel in the City to understand capabilities and to make plans. The CERT team can be called on to respond to and recover from any number of disasters.

Non-Governmental Organizations

Non-governmental entities have the ability to provide the City with key support and help in the event of a disaster. It is incumbent upon the City's elected officials and staff to build relationships with these organizations

²⁹ https://www.churchofjesuschrist.org/study/manual/emergency-response/use-of-church-buildings-in-a-disaster?lang=eng

Section 3 - Administration and Logistics

such that the maximum amount of resources are available in the event of a disaster. Major non-governmental organizations are identified below. See Appendix 5 for the addresses and contact information for each entity.

Nonprofits

The following entities may assist the City with coordinated efforts and/or resources in the event of a disaster:

- The American Red Cross (see ESF #4 in Section 4)
- United Way of Northern Utah

Church of Jesus Christ of Latter-day Saints

Local church leaders often have means to share messages and information with their congregations rapidly through digital communications. Key communications such as a state of emergency or evacuation orders may be distributed in this manner. Local church congregations also have the means to provide volunteer support in response and recovery capacities. Coordinating with each local leader will help determine each congregation's capacity. Please see Appendix 2 for a map of all church buildings in West Bountiful and Appendix 3 for the contact info of local church leaders.

Private Sector

Private sector organizations have the capacity to provide support in times of disaster mitigation, response, and recovery. Appendix 4 details the location and contact information for relevant businesses in the City.

Radio Communication Frequencies

Radios will be used by the City in the event that standard phone call and text communication are not available. Appendix 8 details the radio frequencies that will be used by both handheld devices and radios in City Hall.

SECTION 4 - EMERGENCY SUPPORT FUNCTIONS

To better prepare the City for a variety of potential natural and man-made disasters, Section 4 provides several sets of emergency operating procedures through detailed plans called Emergency Support Functions (ESF). The ESFs dictate specific emergency support functions to be followed in response to specific types of emergencies. These ESFs are meant to be general blueprints that can be applied and adapted as needed either individually or collectively to meet the individual demands of each disaster that the City may face. All ESFs will be activated when needed and as dictated by the Incident Commander and Policy Group. More than one ESF can be activated at a time, as many disasters may have cascading impacts.

- ESF #1 Transportation
- ESF #2 Communications
- ESF #3 Public Works
- ESF #4 Mass Casualty
- ESF #5 Urban Search & Rescue
- ESF #6 Hazardous Materials Response
- ESF #7 Acts of Terror/Mass Violence
- ESF #8 Maintaining Law and Order

ESF #1 - TRANSPORTATION

Responsible Parties: Public Works Department, Police Department

Purpose

Many natural and man-made disasters may damage or block critical roadways and/or may require mass evacuations.

Policies

The City's Public Works Director (Director) is responsible for ensuring that roadways are passable and that all debris and/or snow is cleared from impacted areas. The Director may accomplish this by working in collaboration with teams of City staff, volunteers, and county/state partners.

The City's Police Department is responsible for ensuring the orderly and safe evacuation of residents from their homes or places of origin to the shelter locations. The Police Chief (Chief) may accomplish this through his/her staff of police officers, with trusted community volunteers, and other county/state partners.

Action Plans

Initial Response Actions

In the immediate aftermath of a disaster, the Director will assess the state of the City's roadways and other transportation channels and provide the Policy Group with a summary of that assessment. For each impacted roadway, the Director will prioritize the severity of any damage and the resources required for essential repairs or removal of blocking obstacles. The Director will collaborate with the Policy Group and other EOC staff to prioritize efforts to repair and clear key transportation corridors priority will be given to clearing the evacuation routes identified in Appendix 9.

The Chief will monitor threat levels to residents and make preparations to evacuate if needed. In the event of an evacuation, evacuation orders may be shared with the community through the CodeRed emergency notification system, social media, public announcements via police cruisers, and communications through local church leaders (see Appendix 3 for contact list for church leaders). Police Officers will oversee the evacuation to ensure that order is maintained and vulnerable residents are supported. In the event of an evacuation taking place while children are in school at West Bountiful Elementary, children will be taken to identified shelter locations and protected by police officers until their parents/guardians arrive.

Ongoing Actions

The Director will continuously monitor roadways and update the Policy Group and EOC staff as conditions change. The Director will coordinate additional road repair and debris clearing as needed. After the resolution of the immediate threats of a disaster and residents return to their homes, the Chief will also ensure that order is maintained.

ESF #2 - COMMUNICATIONS

Responsible Parties: Community Development, Public Works Department, City Engineer

Purpose

Clear and frequent communication is essential for effective disaster response and recovery. In the event that standard modes of communication (phone call, text messages, email, etc.) are lost as the result of a natural or man-made disaster, communications must be established between the EOC and those performing response and recovery efforts.

Policies

The Community Development Specialist (Specialist) is responsible for ensuring communications are maintained. Emergency communications resulting from 911 calls are routed to West Bountiful via the Bountiful 911 Center. In the event of standard modes of communication being lost, the Specialist may utilize other means to establish communication not limited to the following.

Radio

To direct response and recovery efforts, the City may utilize radio frequencies as outlined in Appendix 8. If needed, members of the Community Emergency Response Team will provide alternative communications via amateur radio frequencies. Radio frequencies should be assigned for various types of communications within the City's emergency response and recovery.

Runners

If other means of communication are unavailable, the Policy Group may utilize City staff and/or volunteers to serve as runners to relay information between the EOC and any needed location. These runners will deliver written messages to and/or solicit information from individuals or groups within or without the City as needed.

Signals

Signal systems such as by using flags or lights provide another means of communication. The Policy Group and response teams can assign certain signals to specific information that can be relayed quickly over distances to provide updates.

Action Plans

Initial Response Actions

Immediately following a natural or man-made disaster and the activation of the EOC, the Specialist will confirm that standard modes of communication are usable. In the event that cell communication and/or WIFI networks are out of commission, the Specialist will establish communications between the EOC and response efforts through radio communications with the support of amateur radio groups. If radio communications cannot be established, then the Specialist will ensure direct and regular communication to and from the EOC while the City Public Works Department and City Engineer work to establish additional means of communication.

Ongoing Actions

The Specialist will ensure that ongoing communication between the EOC and other parties remains clear. The Public Works Department and City Engineer work to establish additional means of communication within the City and will coordinate with external parties as needed to establish any communications that have been lost and provide the Policy Group with anticipated timelines of restored service.

ESF #3 - PUBLIC WORKS

Responsible Parties: Public Works Department

Purpose

Natural and man-made disasters have the potential to result in widespread property damage and destruction of key infrastructure that residents depend on (i.e. drinking water systems, roadways, etc.). Disasters may also render buildings and other infrastructure a danger to the public, and mitigating actions will need to be taken to ensure that life and safety is protected.

Policies

The Public Works Department (Department) is responsible for repairing critical infrastructure to preserve the wellbeing of residents. The Public Works Director (Director) will lead these efforts. In the event of critical services being lost from sources without the City (power, etc.), the Department will work with the external parties to have the services resumed as soon as possible.

Action Plans

Initial Response Actions

Immediately following a natural or man-made disaster and the activation of the EOC, the Department will evaluate all critical infrastructure to determine functionality. If any critical infrastructure (i.e. drinking water, roadways, power, etc.) is non-operational, the Director will immediately notify the Policy Group who may disseminate the information to the City's residents. Residents will be informed in situations that threaten public safety such as damaged infrastructure that requires the boiling of water before human consumption.

The Department will immediately begin work with external service providers (power, etc.) to restore services if those services are lost in a disaster. The Department will also monitor the safety of structures and other infrastructure in the City and will close, repair, or demolish structures or infrastructure that poses a threat to the safety of the residents.

Ongoing Actions

The Department will continue to monitor the state of the City's critical infrastructure and various structures and the Director will provide the policy group with regular updates. The Department will continually make needed repairs and work with external service providers to re-establish services to residents as needed.

ESF #4 - MASS CASUALTY

Responsible Parties: Emergency Manager, Policy Group, American Red Cross, County, State, Federal

Purpose

Natural and man-made disasters can lead to widespread destruction, widespread casualties, and the overwhelming of medical centers. Many residents may be displaced and will need shelter, food, water, and medical assistance.

Policies

The City Emergency Manager is responsible for overseeing the response for mass-casualty events through either in-person oversight or through delegation. The Policy Group communicates closely with the Emergency Manager to establish objectives, coordinate resources, and remain informed. The American Red Cross (ACR) has the capacity to help communities such as West Bountiful during disaster response and recovery by providing shelter, food, water, supplies, and medical assistance.³⁰ It is imperative that the Emergency Manager establish and maintain relationships with the ACR so the City can have the best possible access to services in the event of a disaster. Please see the contact info for the local ACR Chapter in Appendix 5.

The Emergency Manager will seek input from responding medical professionals for how response actions should be conducted to establish order and treat casualties as quickly as possible. As required, the Emergency Manager (in consultation with responding medical professionals) will triage the needs of casualties and establish priorities to focus response efforts.

Shelter Locations

As needed, the Emergency Manager will secure and establish shelter locations for residents to receive assistance and protection. These locations may include West Bountiful Elementary School and local meetinghouses of the Church of Jesus Christ of Latter-day Saints (see Appendix 2).

Food & Water

As needed, the City may purchase food, water, and other emergency supplies to distribute among impacted residents from businesses within West Bountiful and the surrounding area (see Appendix 4). However, in the event of a large-scale emergency, it is anticipated that many individuals and entities will attempt to secure supplies from these same businesses which may lead to a lack of resources for the City.

Medical

The American Red Cross routinely provides medical care in response to a natural or man-made disaster. As supporting NGO, county, state, and federal agencies are not anticipated to be in West Bountiful in the immediate aftermath of a disaster, casualties may be transported to the nearby medical centers highlighted in Appendix 6 via police cruisers and other vehicles. The Emergency Manager will periodically check the capacity (i.e. hospital beds) from each of the entities listed in Appendix 6 and provide updates to the Policy Group.

³⁰ https://www.redcross.org/content/dam/redcross/atg/PDF_s/GuideToServices.pdf

Section 4 - Emergency Support Functions

Action Plans

Initial Response Actions

First responders from the West Bountiful Police Officers and the South Davis Metro Fire will provide initial response from the 911 calls resulting from a large-scale disaster. The Emergency Manager will assess the situation and determine the level of severity and highest concentrations of casualties. The Mayor of West Bountiful will Declare a State of Emergency and request assistance from Davis County, the State of Utah, and the ACR (assistance can be requested from the ACR by calling 801-733-2767). The Emergency Manager will provide regular status updates to the Policy Group on the response efforts.

Ongoing Actions

The Emergency Manager will continue to provide updates to the Policy Group, which will influence the Group's decision making and objective setting. The Policy Group will continue to seek support from NGO, County, State, and Federal sources until the situation has stabilized and all casualties have been addressed.

ESF #5 - URBAN SEARCH & RESCUE

Responsible Parties: Police Chief, Police Department, Davis County Sheriff's Office S&R, Public Works

Purpose

Urban Search & Rescue (S&R) efforts may be initiated in response to a variety of natural or man-made disasters including and not limited to collapsed buildings, extreme flooding, and water rescues. The intent of S&R operations is to locate and rescue residents that cannot rescue themselves.

Policies

The City Police Chief (Chief) is responsible for initiating and overseeing S&R efforts within the City. The Chief will provide regular status updates to the Policy Group. The City Police Department has primary responsibility for S&R efforts, but may request the assistance of the Davis County S&R Team (County S&R). The County S&R is available upon request free of charge 24/7/365. The County S&R has capabilities to search collapsed structures and also has a dive team for water rescues and/or recoveries.³¹

Action Plans

Initial Response Actions

In the event of a disaster, the Police Department will respond to the disaster site, identify objectives (in collaboration with the Policy Group where possible), and begin S&R as quickly as possible in order to preserve life and safety. If an initial assessment of the needs for the disaster response determines that the County S&R team would be helpful, then the Chief will request assistance through the contact information outlined in Appendix 5, or other available means such as radio or personal connections.

Ongoing Actions

The Chief will continue to provide regular status updates to the Policy Group regarding the results of the S&R operations. At the conclusion of the formal S&R operations, the Chief will work with the Public Works Department to make any necessary repairs to City infrastructure.

³¹ https://www.dcsar.org/

ESF #6 - HAZARDOUS MATERIALS (HAZMAT) RESPONSE

Responsible Parties: Emergency Manager, Police Department, Mayor (or successor)

Purpose

The City of West Bountiful is exposed to hazardous materials through the Holley Refinery, train shipments on the railroad tracks, and trucking shipments on I-15. Each of these three exposures create an opportunity for a HazMat situation that may threaten the lives, health, and safety of City residents. The City does not have the capability to resolve a HazMat incident and will need to rely on County and State assistance.

Policies

The City's Emergency Manager is responsible for protecting health and life during a HazMat incident and will also spearhead response and recovery efforts in collaboration with County and State partners.

Action Plans

Initial Response Actions

After a reported HazMat incident:

- With the assistance of the Police Department, the Emergency Manager will immediately secure a
 generous perimeter around the scene to keep non-emergency response personnel from being close to
 the incident site.
- The Emergency Manager will immediately request the assistance of the South Davis Metro Fire Department to assist with the response to and containment of the hazardous materials. Additional assistance may be requested from Davis County as needed.
- The Emergency Manager will identify the source of the HazMat incident and will immediately inform the Policy Group.
- If the hazardous materials presence poses a threat to human health and safety, then the Mayor will give
 evacuation orders for all residential housing and/or business operations within a one-half mile radius of
 the incident.³² However, this evacuation radius may need to be extended considerably depending on
 the type of hazardous materials, wind speed, etc. Emergency shelters will likely need to be activated for
 evacuated residents.
- The Emergency Manager will report the incident to the State's Department of Environmental Quality through the contact information in Appendix 5.

Ongoing Actions

The Emergency Manager will keep the policy group informed on the development of the incident, any resulting casualties, and the response efforts being conducted. As the City does not have the capability to resolve HazMat incidents, the City will mostly play a support and coordinating role for ongoing HazMat response and recovery actions performed by the state and/or county. Upon the resolution of the incident, the evacuation orders will be lifted and the Police Department will oversee the orderly return of residents to their homes.

³² https://emilms.fema.gov/is 0005a/groups/176.html

ESF #7 - ACTS OF TERROR/MASS VIOLENCE

Responsible Parties: Chief of Police; Police Department; Policy Group; Supporting County, State, or Federal Law Enforcement Agencies

Purpose

Man-made disasters can be the result of intentional acts by bad actors who are intent on causing mass violence or fear among the people of an area. These acts of terror/mass violence can occur in a variety of ways and locations outside City boundaries that may still result in the death and/or injuries of City residents. Depending on the scale of these events, City emergency response capabilities may be overwhelmed.

Policies

Due to the criminal nature of acts of terror/mass violence, the City's Chief of Police (Chief) is responsible for managing all response and recovery efforts. The Chief will regularly attend Local Emergency Planning Committee (LEPC) meetings with Davis County to increase coordination with other cities in the event of an act of terror or mass violence.

All threats of terrorism/mass violence will be considered credible and will be investigated. Critical infrastructure will be protected if it is the source of a threat. The Chief will provide regular updates to the policy group. Due to the emotionally charged nature of such incidents, the Chief and the Mayor will provide updates to the residents and media. The Chief will request additional assistance as needed from other local, county, and/or state law enforcement agencies (the Davis County Sheriff's Office has contact with the federal Joint Terrorism Task Force). However, there is often a significant delay between when state/federal assistance is requested and when the assistance arrives.

Action Plans

Initial Response Actions

Immediately following the report of an act of terror/mass violence, the Chief will mobilize all on-duty police officers to respond to the threat. The Police Chief will evaluate the situation, update the Policy Group, and make determinations for what response is needed. Typical terrorist events or acts of mass violence usually result in widespread panic and chaos. Initial responders may face injured and/or contaminated victims fleeing the scene. It is critical to establish inner and outer control perimeters around the scene as quickly as possible and designate areas where victims can be directed for treatment and assistance.

The Chief will ensure that emergency medical personnel are on-scene to treat any casualties. If additional support is needed, the Chief will request assistance from nearby cities according to existing mutual aid agreements. If further support is needed, the Chief will request that assistance from county, state, and/or federal law enforcement agencies. While the situation is active, and in the immediate aftermath, the Chief will continue to update the Policy Group and make himself/herself available to answer media questions.

Ongoing Actions

Though acts of terror/mass violence are usually relatively brief, the impact can negatively affect a community for extended periods of time. The Chief will update the Policy Group on all response and recovery efforts. The Policy Group will also make efforts to support any grieving residents and facilitate community healing.

ESF #8 - MAINTAINING LAW AND ORDER

Responsible Parties: Police Chief, Police Department

Purpose

The high density of people living in urban environments provide many opportunities for people to gather. Emotionally charged public gatherings may result in situations where groups of individuals unite in destructive, violent, and/or otherwise unlawful activities. These types of efforts are often done with the intent to communicate displeasure and frustration with events, decisions, or outcomes. These situations may be initiated from within West Bountiful or may be initiated by outside groups traveling to West Bountiful.

Policies

Since efforts to maintain law and order result from either laws being broken or the threat of laws being broken, the City's Chief of Police (Chief) is responsible for managing all response and recovery efforts. The Police Department will periodically monitor social media and other online sources to have advanced warning about any public gathering that has the potential to turn destructive or violent. Attempts will be made to contact the leaders of groups involved to identify ways for desired actions to take place in a safe and lawful manner.

Action Plans

Initial Response Actions

Immediately following the development or outbreak of a destructive or unlawful situation, the Chief will direct appropriate numbers of City police officers to respond to the situation. If the number of police officers is insufficient to address the threat, then additional assistance may be requested from nearby police departments or Davis County. The Chief will also provide the Policy group with regular updates on the situation.

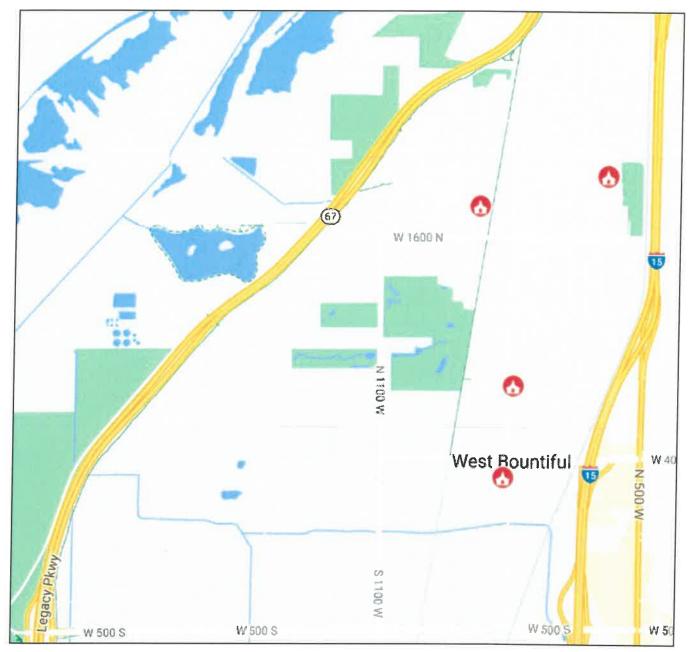
Ongoing Actions

Situations that risk destruction and/or violence may last for extended periods of time. The Chief will monitor developments and provide the Policy Group with regular updates. When law enforcement action is required to maintain law and order, the City's police officers will respond and take needed actions while being supported by other law enforcement agencies as needed.

APPENDIX TO THE WEST BOUNTIFUL EMERGENCY OPERATIONS PLAN

Appendix 1 - EOC Responsibilities and Contact Info [WB to enter information where highlighted]

POSITION	NAME	CELL PHONE	HOME ADDRESS
Mayor	Ken Romney		
Mayor Pro Tem	Mark Preece		
City Council Member	James Bruhn		
City Council Member	James Ahlstrom		
City Council Member	Kelly Enquist		
City Council Member	Rod Wood		
City Administrator	Duane Huffman		
Police Chief	Brandon Erekson		
Emergency Manager	Jory Moran		
Public Works	Steve Maughan		
Community Development	Cathy Brightwell		
Finance	Patrice Twitchell		
City Clerk/Recorder	Cathy Brightwell		
Engineer	Kris Nilsen		
Human Resources	Patrice Twitchell		
CERT Volunteer Leader	Jason Meservy		



Appendix 2 - West Bountiful Church of Jesus Christ of Latter-day Saint Meetinghouse Locations

Meetinghouse Locations:

- 840 N 800 W
- 1930 N 600 W
- 311 N 800 W
- 1750 N 900 W

NOTE: Policy for the Church of Jesus Christ of Latter-day Saints' states that church meeting houses should not be used as shelter locations unless no other shelter locations are available.³³

 $^{{\}color{red} {\bf \underline{https://www.churchofjesuschrist.org/study/manual/emergency-response/use-of-church-buildings-in-a-disaster?lang=eng} \\$

<u>Appendix 3</u> - West Bountiful Church of Jesus Christ of Latter-day Saint Leader Contact Information

WARD	CHURCH LEADER	PHONE NUMBER	CHURCH ADDRESS
West Bountiful 1st Ward	Bishop Cluff		311 N 800 W
West Bountiful 2nd Ward	Bishop Holmes		840 N 800 W
West Bountiful 3rd Ward	Bishop Shupe		1750 N 900 W
West Bountiful 4th Ward	Bishop Bringhurst		1930 N 600 W
West Bountiful 5th Ward	Bishop Wood		840 N 800 W
West Bountiful 6th Ward	Bishop Broderick		1750 N 900 W
West Bountiful 7th Ward	Bishop Coleman		311 N 800 W
West Bountiful 8th Ward	Bishop Wilson		311 N 800 W
West Bountiful 9th Ward	Bishop Feinauer		1930 N 600 W
West Bountiful 10th Ward	Bishop Meidell		1930 N 600 W
West Bountiful 11th Ward	Bishop Vaterlaus		1750 N 900 W

<u>Appendix 4</u> - Private Sector Organizations Within City Limits

ORGANIZATION NAME	ADDRESS	PHONE NUMBER	INDUSTRY
Professional Tree and Stump Removal	230 N 1100 W, West Bountiful, UT 84087	801-298-1069	Tree Service
Bountiful HVAC	2005 N 800 W. West Bountiful. UT 84087	801-755-2335	Air Conditioning Contractor
Holiday Inn and Suites	999 N 500 W, Bountiful, UT 84010	801-292-8100	Hospitality
Green Co Electric	786 W 2095 N, West Bountiful, UT 84087	801-867-4543	Electrical
CG Plumbing	759 W 1450 N, West Bountiful, UT 84087	801-707-4592	Plumbing
M Y Enterprises Inc.	710 N 660 W, West Bountiful, UT 84087	801-295-0723	General Contractor
HF Sinclair (Holy Refinery)	1070 W 500 S. West Bountiful, UT 84087	801-299-6600	Oil Manufacturing
Mighty Fleet Services	1116 W 500 S #5, West Bountiful, UT 84087	801-388-7233	Truck Repair Shop
Riggs Landscaping	976 W 700 N, West Bountiful, UT 84087	801-682-0405	Landscaping
Dewaal & Sons Towing	423 N 800 W, West Bountiful, UT 84087	801-292-8036	Towing Service
Lowes	350 545 W. West Bountiful. UT 84087	801-813-4200	Construction/Home Improvement Store
The Tool Hall, LLC	1035 W 600 N, West Bountiful, UT 84087	385-212-4747	Tool Rental Service
Action Alternator & Starter Inc.	485 N 500 W. Bountiful, UT 84010	801-292-1270	Auto Repair Shop
Gary Bangerter Plumbing	1121 N 700 W, West Bountiful, UT 84087	801-292-4724	Plumber
Costco	573 W 100 N, Bountiful, UT 84010	801-299-3940	Warehouse Store
Various Restaurants	South East Corner of West Bountiful City Limits	Multiple	Food Services

<u>Appendix 5</u> - Contact Information for Government and NGO Emergency Service Agencies

ORGANIZATION NAME	ADDRESS	PHONE	NOTES
Davis County Sheriff's Office Search & Rescue	800 W State Street, Farmington UT 84025	801-451-4150	
<u>Utah State Fire Marshal</u>	410 West 9800 South, #372 Sandy, UT 84070	801-256-2499	24-7 HazMat help number
Utah Department of Environmental Quality	195 North 1950 West, Salt Lake City, UT 84116	801-536-4123	Emergency help number
American Red Cross	2955 Harrison Blvd Suite 204. Ogden, UT 84405	801-627-0000	
Davis County Search & Rescue	800 West State Street, Farmington, UT 84025	801-451-4100	
United Way of Northern Utah	2955 Harrison Blvd, Ogden, UT 84403	801-399-5584	
Utah Division of Emergency Management	4315 S 2700 W., Suite 2200 Taylorsville, UT 84129	801-538-3400	
<u>Utah Poison Control</u>	30 S 2000 E Suite 4540 Salt Lake City. Utah 84112	800-222-1222	
Utah Department of Public Safety	Address Vary By Division	#s Vary By Division	
Federal Bureau of Investigation	5425 W Amelia Earhart Drive Salt Lake City. UT 84116	801-579-1400	For cyber crimes

<u>Appendix 6</u> - Information for Hospitals and Other Medical/Crisis Centers

HOSPITAL FACILITY	ADDRESS	PHONE	DIST. FROM City HALL
Bountiful InstaCare	390 N Main St, Bountiful, UT 84010	801-397-6320	1.4 Miles
FirstMed Urgent Care	1512 S Renaissance Towne Dr #100, Bountiful. UT 84010	801-295-6483	2.3 Miles
Lakeview Hospital	630 Medical Dr. Bountiful, UT 84010	801-299-2200	2.4 Miles
U of U Health Centerville Health Center	26 S Main St. Centerville, UT 84014	801-693-7900	2.7 Miles
American Red Cross	2955 Harrison Blvd Suite 204, Ogden, UT 84405	801-627-0000	23.7 Miles

MEDICAL FACILITY	ADDRESS	PHONE
Walgreen Bountiful 24-hour Pharmacy	515 S. 500 W. Bountiful, Utah	801-294-9107
Utah Adult Protective Services	Not Applicable	800-371-7897
Davis Behavioral Health	150 N Main St #101, Bountiful, UT 84010	801-693-4509
National Domestic Violence Hotline	Not Applicable	800-799-7233
National Center for Missing & Exploited Children	Not Applicable	800-843-5678

<u>Appendix 7</u> - City of West Bountiful Public Works Infrastructure Details

[TO BE ADDED BY WEST BOUNTIFUL]

Appendix 8 - City Radio Frequencies for Emergency Use

HANDHELD RADIO FREQUENCIES					
	Rece	eive	Transmit		
NAME	FREQ.	FREQ. CTCSS		CTCSS	
WB CERT	159.19500	67.0	159.19500	67.0	
WBCERTCMD	156.18000	67.0	156.18000	67.0	
WB LDS	154.60000	67.0	154.60000	67.0	
STN Creek	154.57000	67.0	154.57000	67.0	
WB CTC	154.40000	67.0	154.40000	67.0	
WB EQUIP	151.77500	67.0	151.77500	67.0	
CENT LDS	154.54000	none	154.54000	none	
BTFL DISP	155.67000	none	155.67000	none	
CENT EOC	154.87500	none	154.875	none	
WX PW	155.43000	110.9	159.10500	110.9	
WB PW	159.39750	67.0	159.39750	67.0	
STWD U.H.P.	155.50500	none	155.50500	none	
DCSO CTC	155.64000	205.5	155.64000	205.5	
C.A.P.	148.15000	none	148.15000	none	
NAT S.A.R	155.16000	none	155.16000	none	
Weather	162.55000	none	162.55000	none	

FREQUENCIES FOR USE AT City HALL					
	Rece	eive	Transmit		
NAME	FREQ.	CTCSS	FREQ.	CTCSS	
WBPolice	159.39000	67.0	159.39000	67.0	
WB PW	159.39750	67.0	159.39750	67.0	
WBCERTCMD	156.18000	67.0	156.18000	67.0	
WB CERT	159.19500	67.0	159.19500	67.0	
WB LDS	154.60000	67.0	154.60000	67.0	
STN Creek	154.57000	67.0	154.57000	67.0	
WB CTC	154.40000	67.0	154.40000	67.0	
WB EQUIP	151.77500	67.0	151.77500	67.0	
BTFL DISP	155.67000	none	155.67000	none	
WX PW	155.43000	110.9	159.10500	110.9	
CENT EOC	154.87500	none	154.875	none	
CENT PW	155.94000	167.9	155.94000	167.9	
CENT LDS	154.54000	none	154.54000	none	
NSL RPT	158.92500	114.8	156.07500	114.8	
NSL DIR	156.07500	114.8	156.07500	114.8	
STWD U.H.P.	155.50500	none	155.50500	none	
DCSO CTC	155.68500	none	155.68500	none	
C.A.P.	148.15000	none	148.15000	none	
VAT S.A.R	155.16000	none	155.16000	none	
Weather	162.55000	none	162.55000	none	
MAR 68	156.42500	none	156.42500	none	
MAR 69	156.47500	none	156.47500	none	
MAR 70	156.52500	none	156.52500	none	

GRMS / FRS	FREQ.	WOUXUN	
1	462.5625	FRS1	5 w.
2	462.5875	FRS2	5 w.
3	462.6125	FRS3	5 w.
4	462.6375	FRS4	5 w.
5	462.6625	FRS5	5 w.
6	462.6875	FRS6	5 w.
7	462.7125	FRS7	5 w.
8	467.5625	FRS8	
9	467.5875	FRS9	
10	467.6125	FRS10	
11	467.6375	FRS11	
12	467.6625	FRS12	
13	467.6875	FRS13	
14	467.7125	FRS14	
15	462.5500	GRMS 1	50 w.
16	462.5750	GRMS 2	50 w.
17	462.6000	GRMS 3	50 w.
18	462.6250	GRMS 4	50 w.
19	462.6500	GRMS 5	50 w.
20	462.6750	GRMS 6	do not use
21	462.7000	GRMS 7	50 w.
22	462.7250	GRMS 8	50 w.

Appendix 9 - Evacuation Route Map

Potential evacuation routes are marked by the blue lines.

- 400 North to 500 West or 1100 West
- 800 West to 500 South or north to Pages Lane or Porter Lane
- 1100 West to 500 South or north to Pages Lane or Porter Lane
- 640 West north to Parrish or Pages Lane.

