



SECTION 9. JURISDICTIONAL ANNEXES

9.4 Village of Fairchilds

This section presents the jurisdictional annex for the Village of Fairchilds that provides resources and information to assist public and private sectors to reduce losses from future hazard events. This annex is not guidance of what to do when a disaster occurs. Rather, this annex concentrates on actions to reduce or eliminate damage to property and people that can be implemented prior to a disaster. Information presented includes a general overview of the municipality, the Village of Fairchilds representatives who participated in the planning process, an assessment of the Village of Fairchild’s risk and vulnerability, the different capabilities used in the Village of Fairchilds, and an action plan that will be implemented to achieve a more resilient community.

9.4.1 Hazard Mitigation Planning Team

The Village of Fairchilds identified the primary and alternate points of contact and developed the 2023 Hazard Mitigation Plan (HMP) over the course of several months with input from many Village of Fairchilds departments, including the assistant County Engineer. The Fire Chief represented the community on the Fort Bend County HMP Planning Partnership and supported the local planning process requirements by securing input from persons with specific knowledge to enhance the plan. All departments were asked to contribute to the annex development through reviewing and contributing to the capability assessment, reporting on the status of previously identified actions, and participating in action identification and prioritization.

The following table summarizes municipal officials that participated in the development of the annex and in what capacity. Additional documentation on the municipality’s planning process through Planning Partnership meetings is included in Volume 1, Section 2 (Planning Process) and Appendix C (Meeting Documentation).

Table 9.5-1. Hazard Mitigation Planning Team

Primary Point of Contact		Alternate Point of Contact	
Name/Title:	Lance Bertolino	Name/Title:	Matt Chastain
Address:	8713 Fairchild Rd, Richmond Tx 77469	Address:	8713 Fairchild Rd, Richmond Tx 77469
Phone Number:	713-805-7145	Phone Number:	214-686-6344
Email:	Lance.bertolino@fairchildstx.us	Email:	matt.chastain@fairchildstx.us
NFIP Floodplain Administrator			
Name/Title:	Sean Eglinton/Assistant County Engineer *		
Address:	8715 Fairchild Rd., Richmond, TX 77469		
Phone Number:	281-633-7513		
Email:	sean.eglington@fortbendcountytexas.gov		
Additional Contributors:			
Name/Title:	Jan Vacek/Secretary		
Method of Participation:	Provided critical information in the planning process		

*Information received from <https://www.texasflood.org/flood-basics/fpa.html>

9.4.2 Municipal Profile





The Village of Fairchilds is in the south of Fort Bend County. Located 20 miles southwest of Sugar Land, the Village of Fairchilds is known for its historical park and numerous restaurants. A tributary of the Brazos River flows through the Village of Fairchilds. The Village of Fairchilds has a total area of 2.2 square miles with 0.01 square miles of water.

According to the American Community Survey, the 2021 population for the Village of Fairchilds was 755. Data from the 2021 American Community Survey indicates that 3.4 percent of the population is 5 years of age or younger and 21.7 percent is 65 years of age or older. Communities must deploy a support system that enables all populations to safely reach shelters or to quickly evacuate a hazard area.

9.4.3 Jurisdictional Capability Assessment and Integration

The Village of Fairchilds performed an inventory and analysis of existing capabilities, plans, programs, and policies that enhance its ability to implement mitigation strategies. Volume 1, Section 5 (Capability Assessment) describes the components included in the capability assessment and their significance for hazard mitigation planning. The jurisdictional assessment includes the following analyses:

- An assessment of legal and regulatory capabilities
- Development and permitting capabilities
- An assessment of administrative and technical capabilities
- An assessment of fiscal capabilities
- An assessment of education and outreach capabilities
- Classification under various community mitigation programs
- The community’s adaptive capacity to withstand hazard events

For a community to succeed in reducing long-term risk, hazard mitigation must be integrated into the day-to-day local government operations. As part of the hazard mitigation analysis, planning/policy documents were reviewed, and each jurisdiction was surveyed to obtain a better understanding of their progress toward plan integration. The updated mitigation strategy provided an opportunity for the Village of Fairchilds to identify opportunities for integration of mitigation concepts that can be incorporated into municipal procedures.

Planning, Legal, and Regulatory Capability and Integration

The table below summarizes the regulatory tools that are available to the Village of Fairchilds. The comment field provides information as to how the capability integrates hazard mitigation and risk reduction.

Table 9.5-2. Planning, Legal, and Regulatory Capability and Integration

	Jurisdiction has this? (Yes/No)	Code Citation and Date (code chapter, name of plan, date of plan)	Authority (local, county, state, federal)	Individual / Department / Agency Responsible
Codes, Ordinances, & Regulations				
Building Code	No	-	-	-
<i>How does this reduce risk?</i>				
Zoning/Land Use Code	No	-	-	-
<i>How does this reduce risk?</i>				
Subdivision Ordinance	Yes	Subdivision Ordinance	Local	Board of Alderman
<i>How does this reduce risk?</i>				



	Jurisdiction has this? (Yes/No)	Code Citation and Date (code chapter, name of plan, date of plan)	Authority (local, county, state, federal)	Individual / Department / Agency Responsible
The purpose of this Ordinance is to provide for orderly, safe, and healthful development of the area within the Village and its exterritorial jurisdiction and to promote health, safety, morals and welfare of the community.				
Site Plan Ordinance	No	-	-	-
<i>How does this reduce risk?</i>				
Stormwater Management Ordinance	No	-	-	-
<i>How does this reduce risk?</i>				
Post-Disaster Recovery/ Reconstruction Ordinance	No	-	-	-
<i>How does this reduce risk?</i>				
Real Estate Disclosure	No	-	-	-
<i>How does this reduce risk?</i>				
Growth Management	No	-	-	-
<i>How does this reduce risk?</i>				
Environmental Protection Ordinance	No	-	-	-
<i>How does this reduce risk?</i>				
Flood Damage Prevention Ordinance	Yes	Flood Damage Prevention Ordinance	Local	Floodplain Administrator
<i>How does this reduce risk?</i>				
It is the purpose of this ordinance to promote the public health, safety and general welfare and to minimize public and private losses due to flood conditions in specific areas by provisions designed to:				
<ul style="list-style-type: none"> • Protect human life and health • Minimize expenditure of public money for costly flood control projects • Minimize the need for rescue and relief efforts associated with flooding and generally undertaken at the expense of the general public • Minimize prolonged business interruptions • Minimize damage to public facilities and utilities such as water and gas mains, electric, telephone and sewer lines, streets and bridges located in floodplains • Help maintain a stable tax base by providing for the sound use and development of flood-prone areas in such a manner as to minimize future flood blight areas • Ensure that potential buyers are notified that property is in a flood area. 				
Wellhead Protection	No	-	-	-
<i>How does this reduce risk?</i>				
Emergency Management Ordinance	No	-	-	-
<i>How does this reduce risk?</i>				
Climate Change Ordinance	No	-	-	-
<i>How does this reduce risk?</i>				
Other	No	-	-	-
Planning Documents				
Comprehensive/Master Plan	No	-	-	-
<i>How does this reduce risk?</i>				
Capital Improvement Plan	No	-	-	-
<i>How does this reduce risk?</i>				



	Jurisdiction has this? (Yes/No)	Code Citation and Date (code chapter, name of plan, date of plan)	Authority (local, county, state, federal)	Individual / Department / Agency Responsible
Disaster Debris Management Plan	No	-	-	-
<i>How does this reduce risk?</i>				
Floodplain Management or Watershed Plan	No	-	-	-
<i>How does this reduce risk?</i>				
Stormwater Management Plan	No	-	-	-
<i>How does this reduce risk?</i>				
Open Space Plan	No	-	-	-
<i>How does this reduce risk?</i>				
Urban Water Management Plan	No	-	-	-
<i>How does this reduce risk?</i>				
Habitat Conservation Plan	No	-	-	-
<i>How does this reduce risk?</i>				
Economic Development Plan	No	-	-	-
<i>How does this reduce risk?</i>				
Shoreline Management Plan	No	-	-	-
<i>How does this reduce risk?</i>				
Community Wildfire Protection Plan	No	-	-	-
<i>How does this reduce risk?</i>				
Community Forest Management Plan	No	-	-	-
<i>How does this reduce risk?</i>				
Transportation Plan	No	-	-	-
<i>How does this reduce risk?</i>				
Agriculture Plan	No	-	-	-
<i>How does this reduce risk?</i>				
Climate Action/ Resiliency/Sustainability Plan	No	-	-	-
<i>How does this reduce risk?</i>				
Tourism Plan	No	-	-	-
<i>How does this reduce risk?</i>				
Business/ Downtown Development Plan	No	-	-	-
<i>How does this reduce risk?</i>				
Other	No	-	-	-
Response/Recovery Planning				
Comprehensive Emergency Management Plan	No	-	-	-
<i>How does this reduce risk?</i>				
Continuity of Operations Plan	No	-	-	-



	Jurisdiction has this? (Yes/No)	Code Citation and Date (code chapter, name of plan, date of plan)	Authority (local, county, state, federal)	Individual / Department / Agency Responsible
<i>How does this reduce risk?</i>				
Strategic Recovery Planning Report	No	-	-	-
<i>How does this reduce risk?</i>				
Threat & Hazard Identification & Risk Assessment (THIRA)	No	-	-	-
<i>How does this reduce risk?</i>				
Post-Disaster Recovery Plan	No	-	-	-
<i>How does this reduce risk?</i>				
Public Health Plan	Yes	The Fort Bend County Health and Human Services Department (FBHHS) provides public health services for the Village. FBCHHS has public health plans as part of Annex H of the Fort Bend County Emergency Operations Plan.	County	FBHHS
<i>How does this reduce risk?</i>				
Other	No	-	-	-
<i>How does this reduce risk?</i>				

Development and Permitting Capability

The table below summarizes the capabilities of the Village of Fairchilds to oversee and track development.

Table 9.5-3. Development and Permitting Capability

Indicate if your jurisdiction implements the following	Yes/No	Comment:
Do you issue development permits? • If yes, what department is responsible?	No	Done at County level
If you do not issue development permits, what is your process for tracking new development?	N/A	-
Are permits tracked by hazard area? (For example, floodplain development permits.)	No	Done at County level
Do you have a buildable land inventory? • If yes, please describe	Yes	Farmland for sale in Village
Describe the level of build-out in your jurisdiction.	N/A	-

Administrative and Technical Capability

The table below summarizes potential staff and personnel resources available to the Village of Fairchilds and their current responsibilities that contribute to hazard mitigation.



Table 9.5-4. Administrative and Technical Capabilities

Resources	Available? (Yes/No)	Comments (available staff, responsibilities, support of hazard mitigation)
Administrative Capability		
Planning Board	No	-
Zoning Board of Adjustment	No	-
Planning Department	No	-
Mitigation Planning Committee	No	-
Environmental Board/Commission	No	-
Open Space Board/Committee	No	-
Economic Development Commission/Committee	No	-
Public Works/Highway Department	Yes	Public works director is responsible for compliance with flood damage prevention ordinance. Participate in MPC.
Construction/Building/Code Enforcement Department	No	-
Emergency Management/Public Safety Department	Yes	Management of Village-level HMP updates. Could attend mitigation information session to learn about community risks and mitigation strategy.
Warning Systems / Services (mass notification system, outdoor warning signals, etc.)	No	-
Maintenance programs to reduce risk (stormwater maintenance, tree trimming, etc.)	No	-
Mutual aid agreements	No	-
Human Resources Manual	No	-
Other	No	-
Technical/Staffing Capability		
Planners or engineers with knowledge of land development and land management practices	No	-
Engineers or professionals trained in building or infrastructure construction practices	No	-
Planners or engineers with an understanding of natural hazards	No	-
Staff with expertise or training in benefit/cost analysis	No	-
Professionals trained in conducting damage assessments	No	-
Personnel skilled or trained in GIS and/or Hazards United States (HAZUS) – Multi-Hazards (MH) applications	No	-
Environmental scientist familiar with natural hazards	No	-
Surveyor(s)	No	-
Emergency manager	No	-
Grant writer(s)	No	-
Resilience officer	No	-
Other (this could include stormwater engineer, environmental specialist, etc.)	-	-

Fiscal Capability

The table below summarizes financial resources available to the Village of Fairchilds.

Table 9.5-5. Fiscal Capabilities

Financial Resources	Accessible or Eligible to Use? (Yes/No)
Community development Block Grants (CDBG, CDBG-DR)	Yes
Capital improvements project funding	Yes





Financial Resources	Accessible or Eligible to Use? (Yes/No)
Authority to levy taxes for specific purposes	No
User fees for water, sewer, gas or electric service	No
Impact fees for homebuyers or developers of new development/homes	No
Stormwater utility fee	No
Incur debt through general obligation bonds	No
Incur debt through special tax bonds	No
Incur debt through private activity bonds	No
Withhold public expenditures in hazard-prone areas	No
Other federal or state funding programs	Yes
Open Space Acquisition funding programs	No
Other (for example, Clean Water Act 319 Grants [Nonpoint Source Pollution])	-

Education and Outreach Capability

The table below summarizes the education and outreach resources available to the Village of Fairchilds.

Table 9.5-6. Education and Outreach Capabilities

Outreach Resources	Available? (Yes/No)	Comment:
Public information officer or communications office	No	-
Personnel skilled or trained in website development	No	-
Hazard mitigation information available on your website	No	-
Social media for hazard mitigation education and outreach	No	-
Citizen boards or commissions that address issues related to hazard mitigation	No	-
Warning systems for hazard events	No	-
Natural disaster/safety programs in place for schools	No	-
Does the jurisdiction have any public outreach mechanisms / programs in place to inform citizens on natural hazards, risk, and ways to protect themselves during such events? <ul style="list-style-type: none"> If yes, please describe. 	No	-

Community Classifications

The table below summarizes classifications for community programs available to the Village of Fairchilds.

Table 9.5-7. Community Classifications

Program	Participating? (Yes/No)	Classification (if applicable)	Date Classified (if applicable)
Community Rating System (CRS)	No	-	-
Building Code Effectiveness Grading Schedule (BCEGS)	No	-	-
Public Protection (ISO Fire Protection Classes 1 to 10)	No	-	-
Storm Ready Certification	No	-	-
Firewise Communities classification	No	-	-





Program	Participating? (Yes/No)	Classification (if applicable)	Date Classified (if applicable)
Other	No	-	-

Adaptive Capacity

Adaptive capacity is defined as “the ability of systems, institutions, humans and other organisms to adjust to potential damage, to take advantage of opportunities, or respond to consequences” (IPCC 2014). Each jurisdiction has a unique combination of capabilities to adjust to, protect from, and withstand a future hazard event, future conditions, and changing risk. The table below summarizes the adaptive capacity for each identified hazard of concern and the jurisdiction’s capability to address related actions using the following classifications:

- Strong: Capacity exists and is in use.
- Moderate: Capacity might exist but is not used or could use some improvement.
- Weak: Capacity does not exist or could use substantial improvement.

Table 9.5-8. Adaptive Capacity

Hazard	Adaptive Capacity – Strong/Moderate/Weak
Dam/Levee Failure	Moderate
Disease Outbreak	Moderate
Drought	Moderate
Extreme Temperature	Moderate
Flood	Moderate
Geologic Hazards	Moderate
Hurricane/Tropical Storm	Moderate
Severe Weather	Moderate
Tornado	Moderate
Wildfire	Moderate
Winter Weather	Moderate

9.4.4 National Flood Insurance Program (NFIP) Compliance

This section provides specific information on the management and regulation of the regulatory floodplain, including current and future compliance with the NFIP. The Floodplain Administrator is responsible for maintaining this information and is listed in the Hazard Mitigation Planning Team table at the beginning of this annex.

NFIP Summary

The following table summarizes the NFIP statistics for the Village of Fairchilds.

Table 9.5-9. NFIP Summary

Municipality	Policies in Force	Number of Paid Claims*	Amount of Paid Claims*	Number of NFIP RL Properties	Number of NFIP SRL Properties
Fairchilds (V)	N/A	0	0	0	0

Source: NFIP 2017

Notes:

*Due to a contractual agreement with FEMA, information at the municipal level was not available to incorporate into the 2023 HMP Update. The information presented here for the municipalities is best available data from the last HMP.

RL Repetitive Loss

SRL Severe Repetitive Loss

RL FMA Definition Any insurable building that has incurred flood-related damage on two occasions, in which the cost of the repair, on the average, equaled or exceeded 25 percent of the market value of the structure at the time of each such flood event.





RL NFIP Definition Any insurable building for which two or more claims of more than \$1,000 were paid by the NFIP within any rolling ten-year period, since 1978.

Flood Vulnerability Summary

The following table provides a summary of the NFIP program in the Village of Fairchilds.

Table 9.5-10. NFIP Summary

NFIP Topic	Comments
Flood Vulnerability Summary	
Describe areas prone to flooding in your jurisdiction. <ul style="list-style-type: none"> Do you maintain a list of properties that have been damaged by flooding? 	Village does not maintain a list of properties.
<ul style="list-style-type: none"> Do you maintain a list of property owners interested in flood mitigation? How many homeowners and/or business owners are interested in mitigation (elevation or acquisition)? 	No
Are any RiskMAP projects currently underway in your jurisdiction? <ul style="list-style-type: none"> If so, state what projects are underway. 	No
<ul style="list-style-type: none"> How do you make Substantial Damage determinations? How many were declared for recent flood events in your jurisdiction? 	County
How many properties have been mitigated (elevation or acquisition) in your jurisdiction? <ul style="list-style-type: none"> If there are mitigated properties, how were the projects funded? 	Unknown
Do your flood hazard maps adequately address the flood risk within your jurisdiction? <ul style="list-style-type: none"> If not, state why. 	Yes
NFIP Compliance	
What local department is responsible for floodplain management?	Fort Bend County Engineering
Are any certified floodplain managers on staff in your jurisdiction?	No
Do you have access to resources to determine possible future flooding conditions from climate change?	No
Does your floodplain management staff need any assistance or training to support its floodplain management program? <ul style="list-style-type: none"> If so, what type of assistance/training is needed? 	No staff, handled by County
Provide an explanation of NFIP administration services you provide (e.g. permit review, GIS, education/outreach, inspections, engineering capability)	None
How do you determine if proposed development on an existing structure would qualify as a substantial improvement?	Fort Bend County Engineering
What are the barriers to running an effective NFIP program in the community, if any?	No broadband internet service in parts of our limits/ETJ
Does your jurisdiction have any outstanding NFIP compliance violations that need to be addressed? <ul style="list-style-type: none"> If so, state the violations. 	No
When was the most recent Community Assistance Visit (CAV) or Community Assistance Contact (CAC)?	Unknown
<ul style="list-style-type: none"> What is the local law number or municipal code of your flood damage prevention ordinance? What is the date that your flood damage prevention ordinance was last amended? 	Flood Damage Prevention Ordinance



NFIP Topic	Comments
Does your floodplain management program meet or exceed minimum requirements? <ul style="list-style-type: none"> If exceeds, in what ways? 	Meets
Are there other local ordinances, plans or programs (e.g. site plan review) that support floodplain management and meeting the NFIP requirements? For instance, does the planning board or zoning board consider efforts to reduce flood risk when reviewing variances such as height restrictions?	Provided by Fort Bend County Engineering
Does your community plan to join the CRS program or is your community interested in improving your CRS classification?	Unknown

9.4.5 Growth/Development Trends

Understanding how past, current, and projected development patterns have or are likely to increase or decrease risk in hazard areas is a key component to appreciating a jurisdiction’s overall risk to its hazards of concern. The table below summarizes recent and expected future development trends, including major residential/commercial development and major infrastructure development.

Table 9.5-11. Number of Building Permits for New Construction

Type of Development	2018		2019		2020		2021		2022	
Number of Building Permits for New Construction Issued Since the previous HMP* (total/within regulatory floodplain)										
	Total	Within SFHA	Total	Within SFHA	Total	Within SFHA	Total	Within SFHA	Total	Within SFHA
Single-Family	0	0	0	0	0	0	0	0	0	0
Multi-Family	0	0	0	0	0	0	0	0	0	0
Other (commercial, mixed-use, etc.)	0	0	0	0	0	0	0	0	0	0
Total Permits Issued	0	0	0	0	0	0	0	0	0	0

SFHA Special Flood Hazard Area (1% annual chance flood event)

* Only location-specific hazard zones or vulnerabilities identified.

Table 9.5-12. Recent and Expected Future Development

Property or Development Name	Type (e.g. Res., Comm.)	# of Units / Structures	Address and Parcel ID	Known Hazard Zone(s)	Description/Status of Development
Recent Major Development from 2018 to Present					
None Identified					
Known or Anticipated Major Development in the Next Five (5) Years					
None Identified					

9.4.6 Jurisdictional Risk Assessment

The hazard profiles in Volume 1, Section 4 (Risk Assessment) provide detailed information regarding each plan participant’s vulnerability to the identified hazards. Section 4.1 (Methodology and Tools) and Section 4.4 (Hazard Ranking) provide detailed summaries for the Village of Fairchilds’s risk assessment results and data used to determine the hazard ranking discussed later in this section.

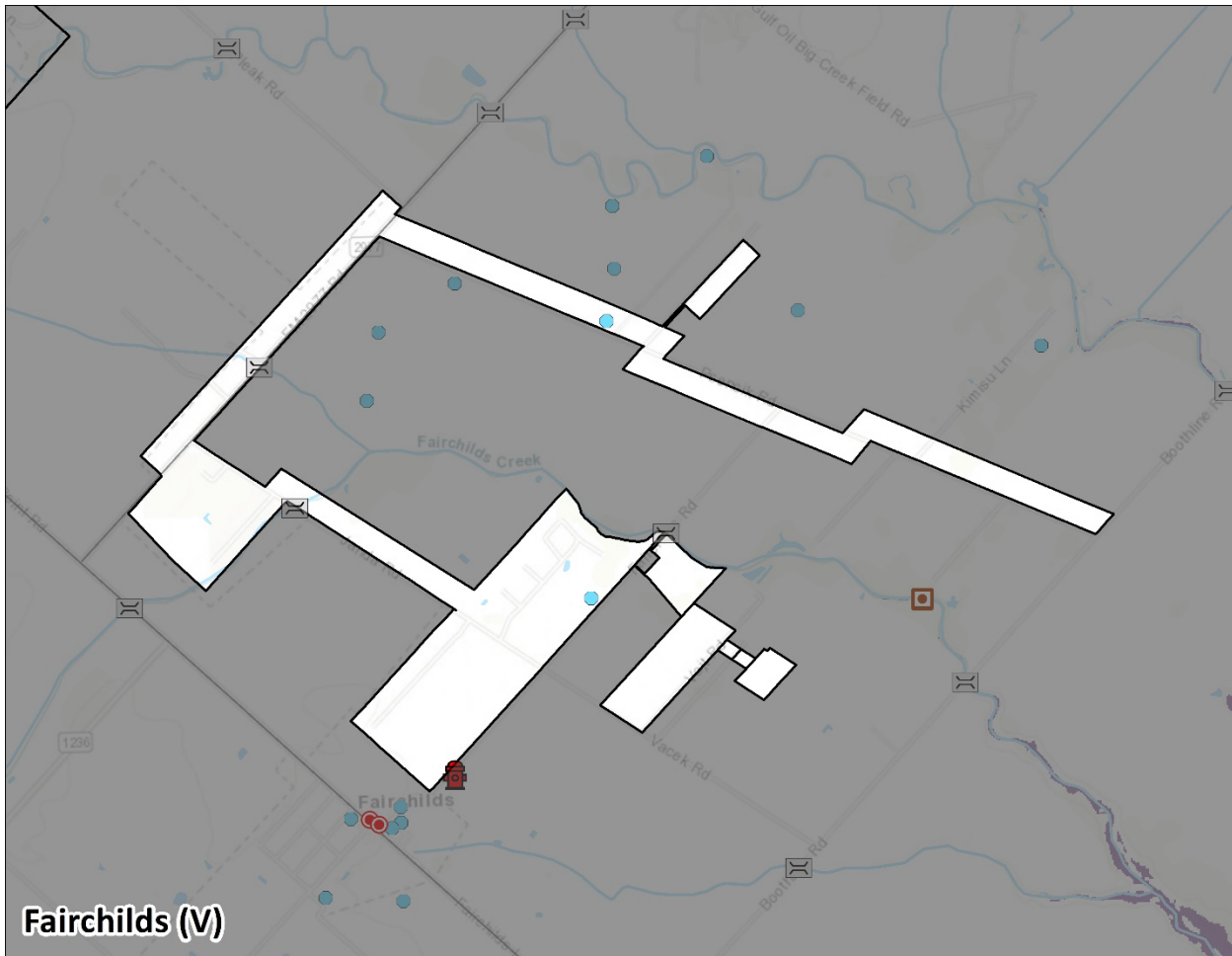




Hazard area extent and location maps provided below illustrate the probable areas impacted within the jurisdiction based on the best available data at the time of the preparation of this plan and are adequate for planning purposes. Maps were generated only for those hazards that can be identified clearly using mapping techniques and technologies and for which the Village of Fairchilds has significant exposure. The maps also show the location of potential new development, where available.



Figure 9.5-1. Village of Fairchilds Hazard Area Extent and Location Map-Dam Inundation

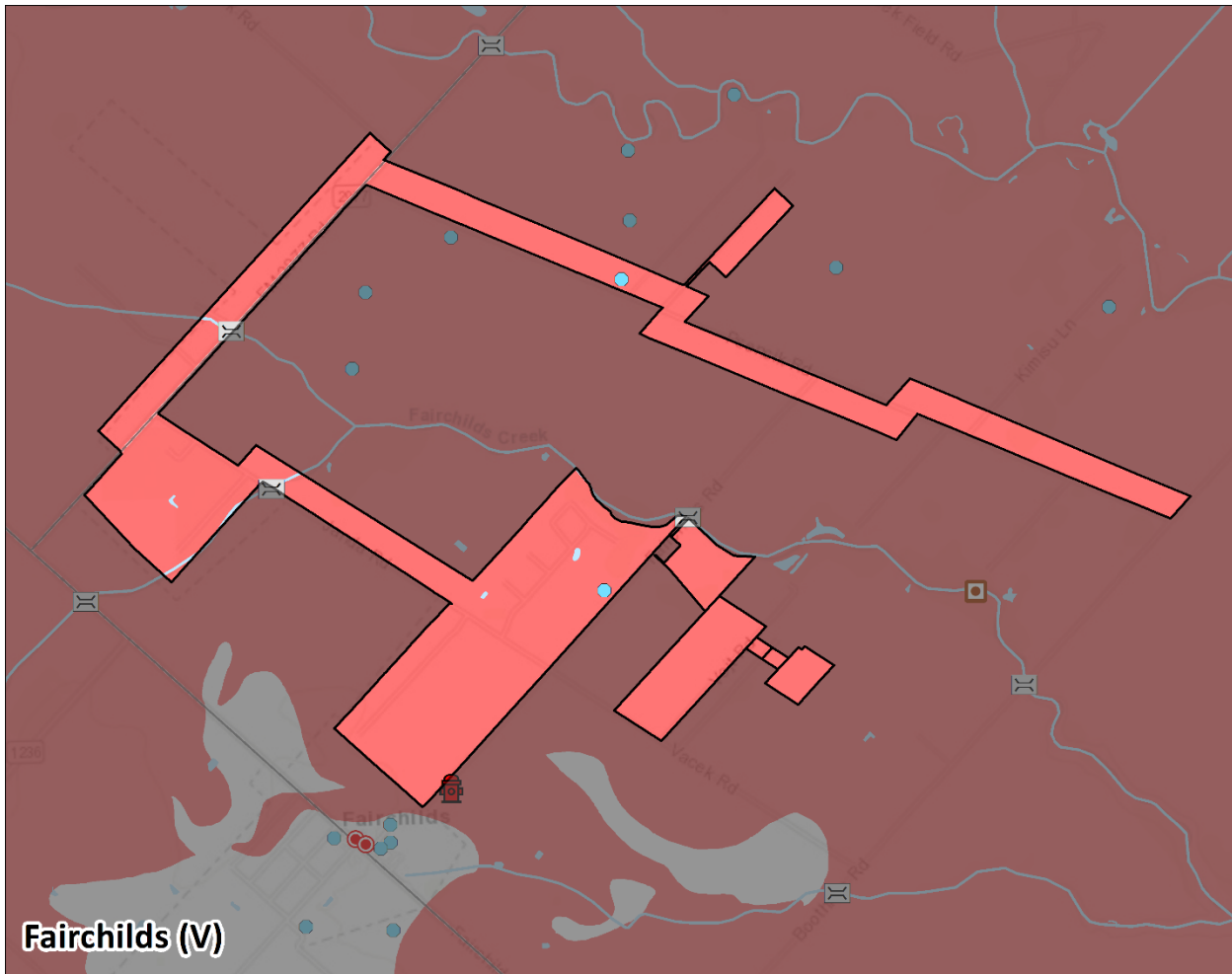


Fairchilids (V)

- | | | | |
|-----------------------------------|----------------------------|-------------------------------|---|
| Airport | Hazardous Materials | Potable Water Tower | County Boundary |
| Alternative/Specialized Education | Hospital | Potable Water Well | Interstate |
| Bridge | Library | Primary Education | U.S. Highway |
| Bus Station | Major Employer | Private Water Well | State Highway |
| Cellular Transmission | Medical Clinic | Public Water Well | Toll Road |
| Church | Municipal Hall | Public Works | County Road |
| Community Center | Museum | Radio Broadcast | Railroad |
| Correctional Facility | Outfall | Secondary Education | Waterbody |
| Dam | Petroleum Storage Tank | Senior Care | Barker Reservoir |
| EMS Station | Pharmacy | Stormwater Pump Station | Kitty Hollow Dam |
| EOC | Police Station | TV Broadcast | Lake Somerville |
| Electric Power | Post-Secondary Education | Urgent Care | North Arrow |
| Fire Station | Potable Water Facility | Wastewater Lift Station | 0 0.3 0.6 Miles |
| Gas Station | Potable Water Pump Station | WWTWastewater Treatment Plant | Data Sources: U.S. Geological Survey, National Geospatial Program 2022; Texas Department of Transportation 2022; U.S. Army Corp of Engineers 2023 |
| Government Office | Potable Water Tank | Water Treatment Facility | Notes: City (C), Township (T), Village (V) |



Figure 9.5-2. Village of Fairchilds Hazard Area Extent and Location Map-Expansive Soils



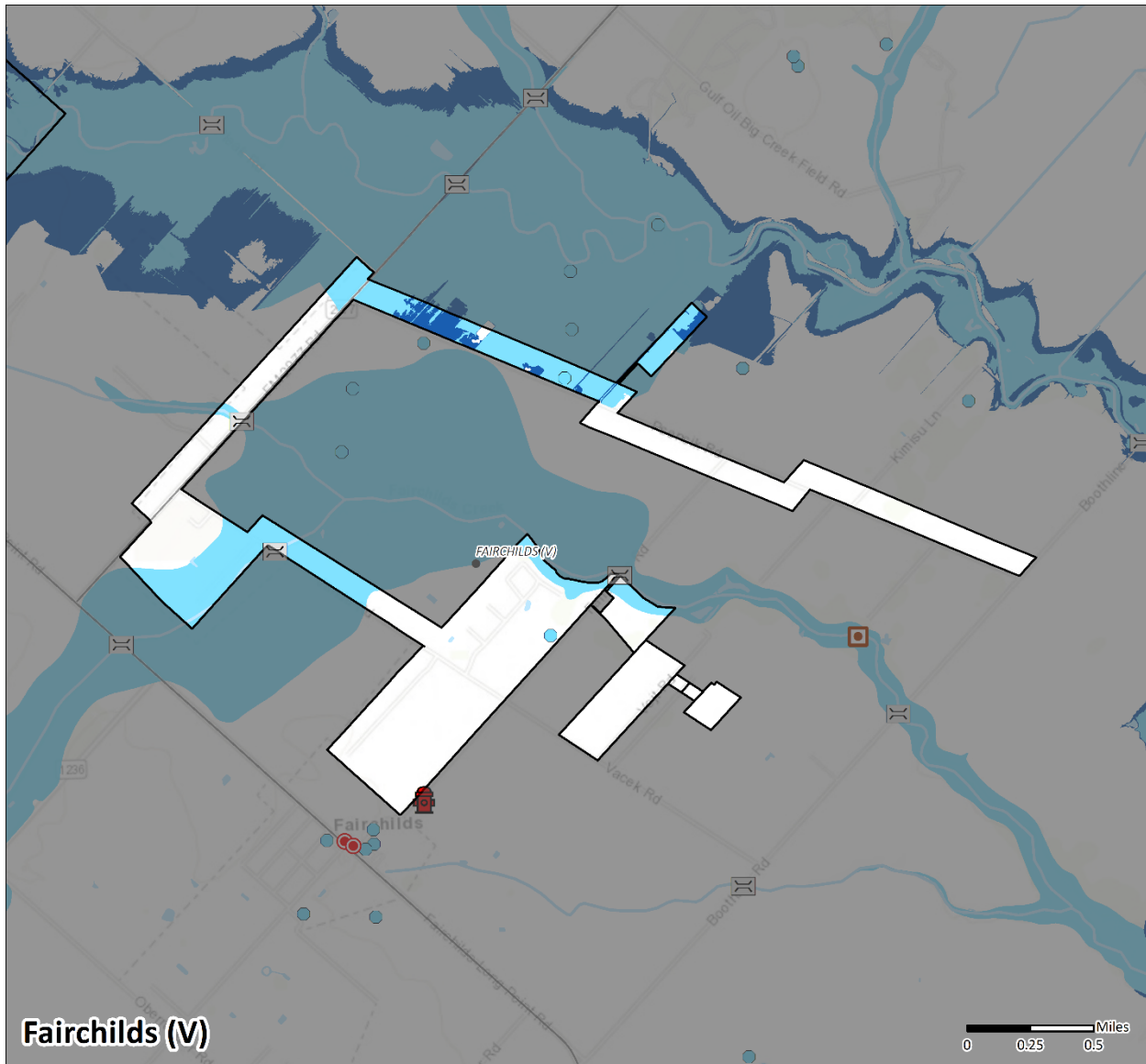
Fairchilds (V)

Airport	Hazardous Materials	Potable Water Tank	County Boundary
Alternative/Specialized Education	Hospital	Potable Water Tower	Interstate
Bridge	Library	Potable Water Well	U.S. Highway
Bus Station	Major Employer	Primary Education	State Highway
Cellular Transmission	Medical Clinic	Private Water Well	Toll Road
Church	Municipal Hall	Public Water Well	County Road
Community Center	Museum	Public Works	Railroad
Correctional Facility	Outfall	Radio Broadcast	Waterbody
Dam	Petroleum Storage Tank	Secondary Education	Expansive Soils Hazard Area
EMS Station	Pharmacy	Senior Care	Linear Extensibility >6%
EOC	Police Station	Stormwater Pump Station	North Arrow
Electric Power	Post-Secondary Education	TV Broadcast	Fort Bend County Logo
Fire Station	Potable Water Facility	Urgent Care	0 0.3 0.6 Miles
Gas Station	Potable Water Pump Station	Wastewater Lift Station	<p>Data Sources: U.S. Geological Survey, National Geospatial Program 2022; Texas Department of Transportation 2022; U.S. Department of Agriculture, Natural Resources Conservation Service 2022</p>
Government Office		Water Treatment Facility	<p>Notes: City (C), Township (T), Village (V)</p>





Figure 9.5-3. Village of Fairchilds Hazard Area Extent and Location Map-Flood



Fairchilds (V)

- | | | | |
|-----------------------------------|----------------------------|----------------------------|---|
| Airport | Hazardous Materials | Potable Water Tank | County Boundary |
| Alternative/Specialized Education | Hospital | Potable Water Tower | Interstate |
| Bridge | Library | Potable Water Well | U.S. Highway |
| Bus Station | Major Employer | Primary Education | State Highway |
| Cellular Transmission | Medical Clinic | Private Water Well | Toll Road |
| Church | Municipal Hall | Public Water Well | County Road |
| Community Center | Museum | Public Works | Railroad |
| Correctional Facility | Outfall | Radio Broadcast | Waterbody |
| Dam | Petroleum Storage Tank | Secondary Education | FEMA Flood Hazard Area |
| EMS Station | Pharmacy | Senior Care | 1% Annual Chance |
| EOC | Police Station | Stormwater Pump Station | 0.2% Annual Chance |
| Electric Power | Post-Secondary Education | TV Broadcast | <i>The flood hazard area depicted is the January 29, 2021 FEMA effective DFIRM with the latest LOMR date of August 10, 2022</i> |
| Fire Station | Potable Water Facility | Wastewater Lift Station | Data Sources: U.S. Geological Survey, National Geospatial Program 2022; Texas Department of Transportation 2022 |
| Gas Station | Potable Water Pump Station | Wastewater Treatment Plant | <i>Notes: City (C), Township (T), Village (V)</i> |
| Government Office | | Water Treatment Facility | |





Figure 9.5-4. Village of Fairchilds Hazard Area Extent and Location Map-Inland Erosion

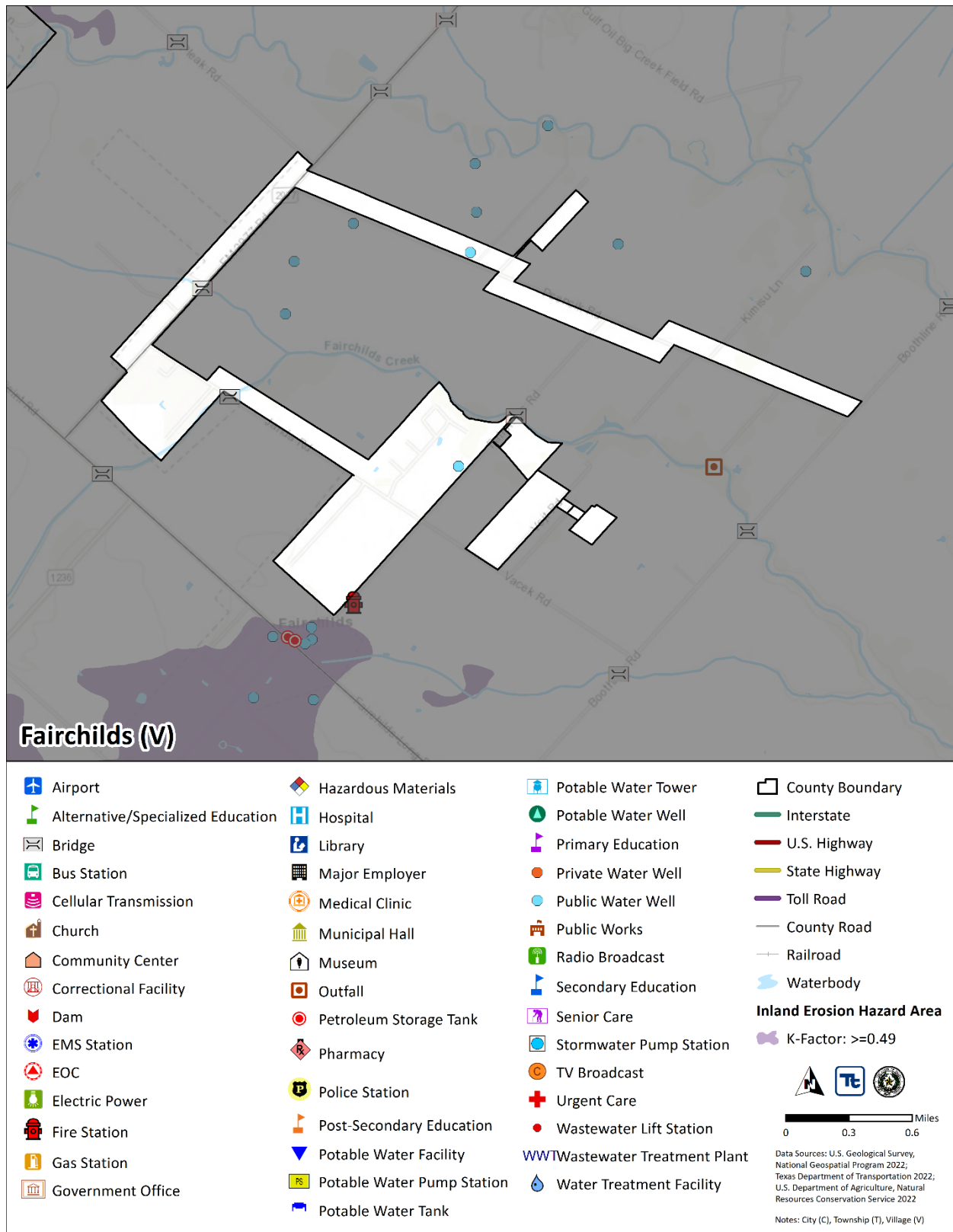
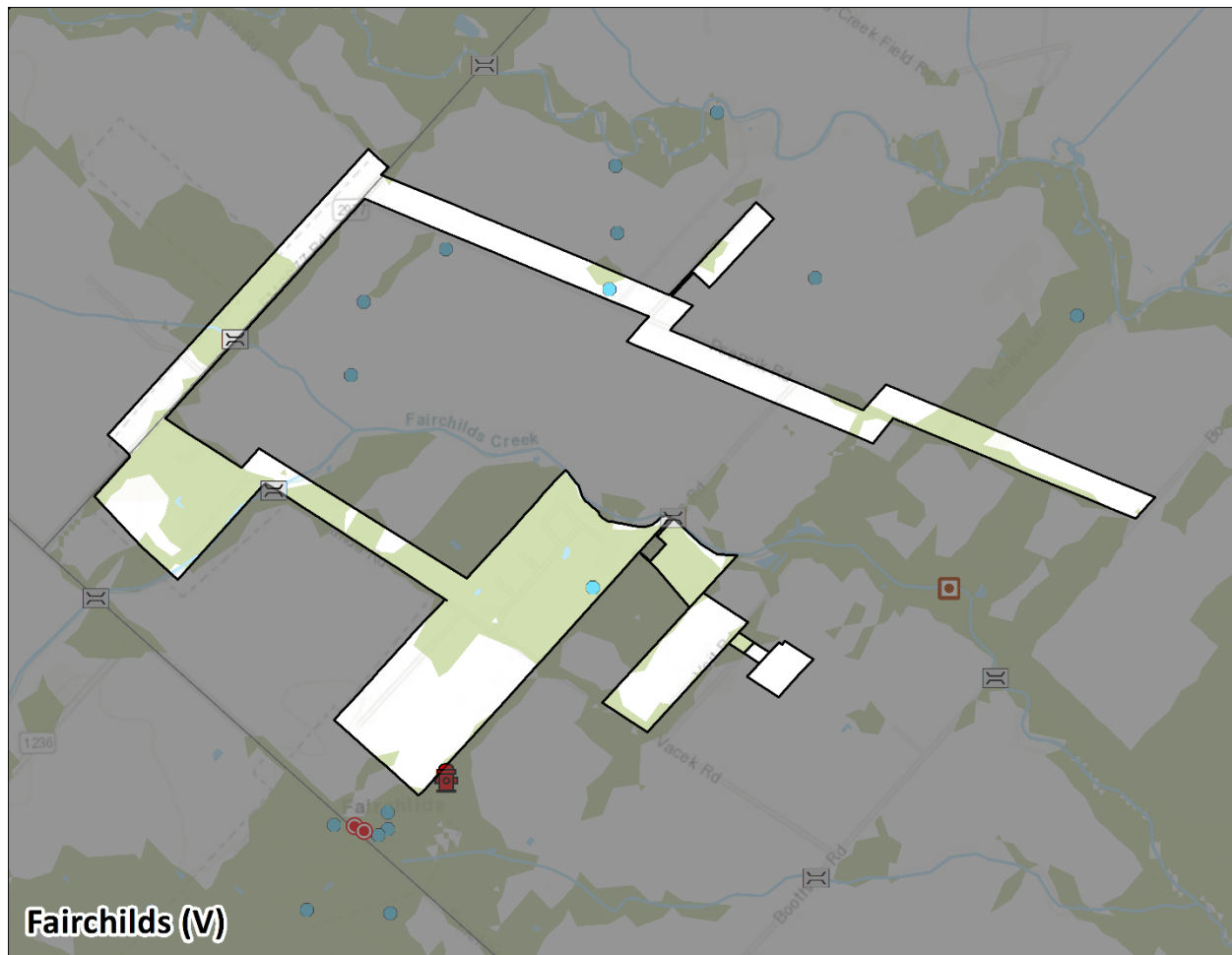




Figure 9.5-5. Village of Fairchilds Hazard Area Extent and Location Map-Wildfire



Fairchilds (V)

- | | | | |
|-----------------------------------|----------------------------|-------------------------------|-----------------------------|
| Airport | Hazardous Materials | Potable Water Tower | County Boundary |
| Alternative/Specialized Education | Hospital | Potable Water Well | Interstate |
| Bridge | Library | Primary Education | U.S. Highway |
| Bus Station | Major Employer | Private Water Well | State Highway |
| Cellular Transmission | Medical Clinic | Public Water Well | Toll Road |
| Church | Municipal Hall | Public Works | County Road |
| Community Center | Museum | Radio Broadcast | Railroad |
| Correctional Facility | Outfall | Secondary Education | Waterbody |
| Dam | Petroleum Storage Tank | Senior Care | Wildfire Hazard Area |
| EMS Station | Pharmacy | Stormwater Pump Station | Low Threat |
| EOC | Police Station | TV Broadcast | Moderate Threat |
| Electric Power | Post-Secondary Education | Urgent Care | North Arrow |
| Fire Station | Potable Water Facility | Wastewater Lift Station | 0 0.25 0.5 Miles |
| Gas Station | Potable Water Pump Station | Water Treatment Facility | |
| Government Office | Potable Water Tank | WWTWastewater Treatment Plant | |

Data Sources: U.S. Geological Survey, National Geospatial Program 2022, Texas Department of Transportation 2022, Texas A&M Forest Service 2022
 Notes: City (C), Township (T), Village (V)





Hazard Event History

Fort Bend County has a history of natural and non-natural hazard events, as detailed in Volume I, Section 4 (Risk Assessment). A summary of historical events is provided in each of the hazard profiles and includes a chronology of events that have affected the County and its municipalities.

The Village of Fairchilds’ history of federally declared (as presented by FEMA) and significant hazard events [as presented in NOAA-National Centers for Environmental Information (NCEI)] is consistent with that of the County. The table below provides details regarding municipal-specific loss and damages the Village of Fairchilds experienced during hazard events since the last hazard mitigation plan update. Information provided in the table below is based on reference material or local sources.

Table 9.5-13. Hazard Event History

Dates of Event	Event Type (Disaster Declaration if applicable)	County Designated?	Summary of Event	Municipal Summary of Damages and Losses
January 20, 2020 – continuing	EM-3458 – Covid-19; DR-4485 – Covid-19 Pandemic	Yes	COVID-19 pandemic	The Village had to implement building and office closures to adhere to COVID guidelines.
July 25-31, 2020	EM-3530 – Hurricane Hanna	Yes	Hurricane force winds resulted in significant number of downed trees and utility lines.	The Village experienced damages equivalent to the County level.
August 23-27, 2020	EM-3540 – Tropical Storms Marco and Laura	Yes	Fort Bend County activated their emergency operations center as fringe impacts of Tropical Storms Marco and Laura impacted the County.	The Village experienced damages equivalent to the County level.
September 12-18, 2021	EM-3572 Hurricane Nicholas	No	Hurricane Nicholas produced several hours of tropical storm force sustained winds and gusts. There were numerous power outages and minor to moderate damage to some structures and roofs. Trees down in areas.	The Village experienced damages equivalent to the County level.
February 11-21, 2021	DR-4586; EM 3554 – Severe Winter Storms	Yes	Winter Storm Uri distributed a record amount of snow throughout Texas. Snow, ice, and ultra-low temperatures caused widespread road closures.	The Village experienced damages equivalent to the County level.

Source: FEMA 2023; NOAA 2023

Hazard Ranking and Vulnerabilities

The hazard profiles in Volume 1, Section 4 (Risk Assessment) have detailed information regarding each plan participant’s vulnerability to the identified hazards. The following summarizes the Village of Fairchilds’s risk assessment results and data used to determine the hazard ranking.

Hazard Ranking

This section provides the community specific identification of the primary hazard concerns based on identified problems, impacts and the results of the risk assessment as presented in Volume 1, Section 4 (Risk Assessment). The ranking process involves an assessment of the likelihood of occurrence for each hazard; the potential impacts of the hazard on people, property, and the economy; and community capabilities to address the hazard and changing future climate conditions. Mitigation action development uses the inputs from the evaluation to target those hazards with highest level of concern.





As discussed in Volume 1, Section 4.4 (Hazard Ranking), each participating jurisdiction has differing degrees of risk exposure and vulnerability compared with the County as a whole. Therefore, each municipality ranked the degree of risk to each hazard as it pertains to their community. The table below summarizes the hazard risk/vulnerability rankings of potential natural hazards for the Village of Fairchilds. The Village of Fairchilds reviewed the County hazard risk/vulnerability risk ranking table and individual results to reflect the relative risk of the hazards of concern to the community.

During the review of the hazard/vulnerability risk ranking, the Village of Fairchilds indicated the following:

- The Village agrees with all rankings.

Table 9.5-14. Hazard Ranking Input

Hazard	Rankings
Dam/Levee Failure	Medium
Disease Outbreak	Low
Drought	Medium
Extreme Temperature	Medium
Flood	High
Geologic Hazards	High
Hurricane/Tropical Storm	Medium
Severe Weather	High
Tornado	Medium
Wildfire	Low
Winter Weather	Low

Critical Facilities

The table below identifies the number of critical facilities and community lifelines in the community located in hazard areas. The community reviewed the list of facilities and lifelines to determine appropriate mitigation measures for the facilities, where appropriate. Refer to Section 4.3 (Hazard Profiles) for details on the risk assessment and the facilities and lifelines exposed to each hazard of concern.



Table 9.5-15. Potential Flood Losses to Critical Facilities

Jurisdiction	1-Percent Annual Chance Flood Event Hazard Area		Wildfire Hazard Area – Moderate Risk		Inland Erosion (K-Factor: ≥ 0.49) Hazard Area		Expansive Soils (Linear Extensibility $>6\%$) Hazard Area		Dam Inundation Hazard Area - Barker Reservoir Dam Inundation Area		Dam Inundation Hazard Area - Lake Sommerville Dam Inundation Area		Dam Inundation Hazard Area - Kitty Hollow Dam Inundation Area	
	Critical Facilities	Lifelines	Critical Facilities	Lifelines	Critical Facilities	Lifelines	Critical Facilities	Lifelines	Critical Facilities	Lifelines	Critical Facilities	Lifelines	Critical Facilities	Lifelines
Fairchilds (V)	2	2	0	0	0	0	3	3	0	0	0	0	0	0

Source: Fort Bend County; Hazus v5.1; FEMA 2022; Fort Bend Drainage District 2023



Identified Issues

After review of the Village of Fairchilds' hazard event history, hazard rankings, jurisdiction specific vulnerabilities, hazard area extent and location, and current capabilities, the Village of Fairchilds identified the following vulnerabilities within their community:

- The Village does not currently have public signage (e.g. LED billboard) or the ability to utilize an emergency call system. Currently, social media is the primary communication tool, but many residents do not have reliable internet connection.
- The Village experiences extensive flooding due to creeks and waterbodies lined with ditches instead of a proper drainage system. The flooded streets prevent emergency vehicles from reaching residents that may need assistance.
- The Village does not have a designated shelter to operate as a heating/cooling center, American Red Cross Shelter, or a tornado/hurricane safety shelter.
- Village residents lack broadband internet access, which makes it difficult for residents to receive weather/hazard related alerts.
- The following critical facilities are in the special flood hazard area:
 - Drainage Ditch
 - Public Water Well

**This issue was identified as a specific area of concern based on resident response to the Fort Bend County Hazard Mitigation public survey.*

9.4.7 Mitigation Strategy and Prioritization

This section discusses past mitigations actions and status, describes proposed hazard mitigation initiatives, and prioritizes actions to address over the next five years.

Past Mitigation Initiative Status

The following table indicates progress on the community's mitigation strategy identified in the 2018 HMP. Actions that are in progress are carried forward and combined with new actions as part of this 2023 HMP update and are included in the tables with prioritization. Previous actions that are now ongoing programs and capabilities are indicated as such and previously presented in the Capability Assessment earlier in this annex.



Table 9.5-16. Status of Previous Mitigation Actions

Project	Responsible Party	What is the status? (e.g., In Progress, No Progress, Ongoing Capability, or Completed) If in progress or completed, please describe the funding source, cost and who is implementing.	If you did not complete the action, should the action be included in the 2023 HMP (i.e., there is still a need, this is still a priority)?		
			Yes/No	If Yes, please describe the original problem (i.e., hazard, location, historic losses)	If Yes, identify the responsible department/person to implement the project.
Install culverts and improve drainage on the side of the roadways at Caroline and Janda Streets, Cotton Drive at Janda street, and Phyllis Drive at Janda Street.	Fort Bend County (FBC) Engineering FBC Road and Bridge	FBC Engineering has no record of project.	No	-	-
Reinforcement of critical facilities to withstand high winds from severe weather – specifically the fire station.	Village of Fairchilds Engineering Consultant, Village Aldermen	No	No	-	-
Promote flood insurance.	Village of Fairchilds Secretary	No	No	-	-
Increasing public awareness of natural hazards and hazardous areas; distributing public awareness information regarding hazards and potential mitigation measures.	Village of Fairchilds Secretary	None	No	-	-
Ensure that the Village has adequate evacuation plans and notification procedures in place.	Village of Fairchilds Volunteer Fire Department	Fire Dept. follows Fort Bend County evacuation procedures..	No	-	-
Wildfire hazard areas study.	Village of Fairchilds Volunteer Fire Department	Texas Wildfire Forrest Service	No	-	-
Monitor drought conditions.	Village of Fairchilds Secretary	No	No	-	-
Public information campaigns.	Village of Fairchilds Secretary	NO	No	-	-
Evaluate the risks presented by excessive heat and humidity, especially in terms of high-risk populations such as the elderly/ low income.	Village of Fairchilds Volunteer Fire Department	Fire Dept. follows Fort Bend County evacuation procedures.	No	-	-
In cooperation with County and State officials, ensure that high-risk populations are adequately addressed in response plans that are related to excessive heat risks.	Village of Fairchilds Volunteer Fire Department	Fire Dept. follows Fort Bend County evacuation procedures.	No	-	-
Review plans and resources to address risk posed by snow and ice hazards during winter storm.	Village of Fairchilds Volunteer Fire Department	Fire Dept. follows Fort Bend County evacuation procedures.	No	-	-



Project	Responsible Party	What is the status? (e.g., In Progress, No Progress, Ongoing Capability, or Completed) If in progress or completed, please describe the funding source, cost and who is implementing.	If you did not complete the action, should the action be included in the 2023 HMP (i.e., there is still a need, this is still a priority)?		
			Yes/No	If Yes, please describe the original problem (i.e., hazard, location, historic losses)	If Yes, identify the responsible department/person to implement the project.
Upgrades to at-risk structures and higher standards for new structures.	Village of Fairchilds Engineering Consultant	None	No	-	-
Complete a detailed structural/engineering survey of the Fairchilds Fire Department to ensure their soundness with respect to resisting the effects of high winds, extreme roof loading from snow or ice, and hail. Forms basis of decisions about any additional actions to mitigate risk.	Village of Fairchilds Engineering Consultant	Village of Fairchilds does not own the fire station. It is a stand-alone entity.	No	-	-
Require road construction to use specific techniques.	Village of Fairchilds Aldermen	No	No	-	-
Emergency generator purchase and installation for Village Hall.	Village of Fairchilds Aldermen	Do not have a City Hall.	No	-	-



Additional Mitigation Efforts

In addition to the mitigation initiatives completed in the table above, the Village of Fairchilds identified the following mitigation efforts completed since the last HMP:

- None identified.

Since the adoption of the County’s first HMP, the Village of Fairchilds has made significant mitigation progress in the following areas:

- None identified.

Proposed Hazard Mitigation Initiatives for the HMP Update

Fort Bend County participated in a mitigation action workshop in March 2023 and was provided the following FEMA publications to use as a resource as part of their comprehensive review of all possible activities and mitigation measures to address their hazards: FEMA Mitigation Ideas – A Resource for Reducing Risk to Natural Hazards (January 2013) and FEMA Mitigation Assistance Resource Guide for Texas (2020).

The table below indicates the range of proposed mitigation action categories. Both the four FEMA mitigation action categories and the six CRS mitigation action categories are listed in the table to further demonstrate the wide-range of activities and mitigation measures selected.

Table 9.5-17. Analysis of Mitigation Actions by Hazard and Category

Hazard	FEMA				CRS					
	LPR	SIP	NSP	EAP	PR	PP	PI	NR	SP	ES
Dam/Levee Failure	X	X	-	X	-	-	X	-	-	X
Disease Outbreak	X	X	-	X	-	-	X	-	-	X
Drought	X	X	-	X	-	-	X	-	-	X
Extreme Temperature	X	X	-	X	-	-	X	-	-	X
Flood	X	X	-	X	-	X	X	-	X	X
Geologic Hazards	X	X	-	X	-	-	X	-	-	X
Hurricane/Tropical Storm	X	X	-	X	-	-	X	-	-	X
Severe Weather	X	X	-	X	-	X	X	-	X	X
Tornado	X	X	-	X	-	-	X	-	-	X
Wildfire	X	X	-	X	-	-	X	-	-	X
Winter Weather	X	X	-	X	-	X	X	-	X	X

Note: Mitigation categories are described below the Mitigation Initiatives.



The table below summarizes the specific mitigation initiatives the Village of Fairchilds would like to pursue in the future to reduce the effects of hazards. The initiatives are dependent upon available funding (grants and local match availability) and may be modified or omitted at any time based on the occurrence of new hazard events and changes in municipal priorities.

Table 9.5-18. Proposed Hazard Mitigation Initiatives

Project Number	Mitigation Initiative Name	Description of Problem and Solution	Hazard(s) to be Mitigated	Goals Met	Estimated Timeline	Lead and Support Agencies	Potential Funding Sources	Estimated Benefits	Estimated Costs	Priority	Mitigation Category	CRS Category
2023-Village of Fairchilds-001	Public Alert Communication System	Problem: The Village does not currently have public signage (e.g. LED Billboard) or the ability to utilize an emergency call system. Currently, social media is the primary communication tool, but many residents do not have reliable internet connection. Solution: Install an illuminated and editable sign (e.g., LED billboard) at the Fairchild Volunteer Fire Department, which is the current location of public notices and implement a call system to notify residents of hazard emergencies.	Dam/Levee Failure, Disease Outbreak, Drought, Extreme Temperature, Flood, Geologic Hazards, Hurricane/Tropical Storm, Severe Weather, Tornado, Wildfire, Winter Weather	1,2	5 Years	Village of Fairchilds, Mayor, Emergency Management Coordinator	Village Budget, HMGP, FEMA Assistance to Firefighters Grants	The Village residents will have more avenues for alert systems and can better prepare themselves for incoming hazard events.	>\$100,000	High	EAP	ES, PI
2023-Village of Fairchilds-002	Conduct Flood Study	Problem: The Village experiences extensive flooding due to creeks and waterbodies lined with ditches instead of a proper drainage system. These floods streets making some impassible and prevents emergency vehicles from reaching residents that may need assistance. Solution: The Village will conduct a flood study with an engineer and work with neighboring jurisdictions to create regional detention to provide additional capacity to hold floodwaters. Once the study is complete, and solutions are identified, the City will begin implementing the solutions.	Flood, Severe Weather, Winter Weather	2, 5	5 Years	Fairchilds Mayor, EMC	FMA, BRIC, and HMGP; Village Budget	The Village will experience less flooding and will allow emergency vehicles access throughout the Village without needing detours.	>\$100,000	High	SIP	SP, PP
2023-Village of Fairchilds-003	Inclement Weather Shelter	Problem: The Village does not have a designated shelter to operate as a heating/cooling center, American Red Cross	Dam/Levee Failure, Disease Outbreak, Drought,	2	3 Years	Village Emergency Management	Village Budget, Emergency Solutions Grants (HUD),	The Village residents will be more protected	>\$50,000	High	LPR	ES



Project Number	Mitigation Initiative Name	Description of Problem and Solution	Hazard(s) to be Mitigated	Goals Met	Estimated Timeline	Lead and Support Agencies	Potential Funding Sources	Estimated Benefits	Estimated Costs	Priority	Mitigation Category	CRS Category
		Shelter, and a tornado/hurricane safety shelter. Solution: The Village will designate a shelter and ensure that it has backup power to operate as a heating/cooling shelter and ensure that it meets all the requirements needed to be classified as an American Red Cross Shelter.	Extreme Temperature, Flood, Geologic Hazards, Hurricane/Tropical Storm, Severe Weather, Tornado, Wildfire, Winter Weather				HMGP and BRIC	from hazard events, especially the homeless population.				
2023-Village of Fairchilds-004	Seek expansion of underground broadband into all areas of Fairchilds	Problem: Village residents lack broadband internet access which makes it difficult for residents to receive weather/hazard related alerts. Solution: The Village will work with an engineer to determine how to expand broadband access underground so that all residents may have access. Once identified, the Village will begin implementing the project.	Dam/Levee Failure, Disease Outbreak, Drought, Extreme Temperature, Flood, Geologic Hazards, Hurricane/Tropical Storm, Severe Weather, Tornado, Wildfire, Winter Weather	4,5	5 Years	Village Utility Companies, Village Mayor	TDEM,, NTIA, ARPA, Village	Village residents will have quicker and better access to hazard emergency notifications.	Engineer Study: \$1,000	High	SIP	ES
2023-Village of Fairchilds-005	Critical Facilities Flood Protection	Problem: The following critical facilities are located in the special flood hazard area: <ul style="list-style-type: none"> • Drainage Ditch • Public Water Well Solution: The Village will work with critical facility owners to determine what additional floodproofing measures are needed at these facilities. Options include: <ul style="list-style-type: none"> • Elevation of facility • Floodproofing of facility • Mobile flood barriers Once the most cost effective option is identified, the Village will help the critical facility owners carry out the option.	Flood	1,2	Less than 5 years	Village Engineer	FEMA HMGP and PDM, BRIC, USDA Community Facilities Grant Program, Emergency Management Performance Grants (EMPG) Program, Village Budget	Ensures that facilities can carry out continuity of operations.	TBD by feasibility assessment	High	SIP	SP

*Mitigation initiative is related to a critical facility and/or community lifeline
Notes: Not all acronyms and abbreviations defined below are included in the table.



Acronyms and Abbreviations:

CRS	Community Rating System
FEMA	Federal Emergency Management Agency
HMA	Hazard Mitigation Assistance
N/A	Not applicable
NFIP	National Flood Insurance Program

Potential FEMA HMA Funding Sources:

FMA	Flood Mitigation Assistance Grant Program
HMGP	Hazard Mitigation Grant Program
BRIC	Building Resilient Infrastructure and Communities Program

Timeline:

The time required for completion of the project upon implementation.

Cost:

The estimated cost for implementation.

Benefits:

A description of the estimated benefits, either quantitative and/or qualitative.

Mitigation Category:

- Local Plans and Regulations (LPR)—These actions include government authorities, policies or codes that influence the way land and buildings are being developed and built.
- Structure and Infrastructure Project (SIP)—These actions involve modifying existing structures and infrastructure to protect them from a hazard or remove them from a hazard area. This could apply to public or private structures, as well as critical facilities and infrastructure. This type of action also involves projects to construct manmade structures to reduce the impact of hazards.
- Natural Systems Protection (NSP)—These are actions that minimize damage and losses, and also preserve or restore the functions of natural systems.
- Education and Awareness Programs (EAP)—These are actions to inform and educate citizens, elected officials, and property owners about hazards and potential ways to mitigate them. These actions may also include participation in national programs, such as StormReady and Firewise Communities.

CRS Category:

- Preventative Measures (PR)—Government, administrative or regulatory actions, or processes that influence the way land and buildings are developed and built. Examples include planning and zoning, floodplain local laws, capital improvement programs, open space preservation, and storm water management regulations.
- Property Protection (PP)—These actions include public activities to reduce hazard losses or actions that involve (1) modification of existing buildings or structures to protect them from a hazard or (2) removal of the structures from the hazard area. Examples include acquisition, elevation, relocation, structural retrofits, storm shutters, and shatter-resistant glass.
- Public Information (PI)—Actions to inform and educate citizens, elected officials, and property owners about hazards and potential ways to mitigate them. Such actions include outreach projects, real estate disclosure, hazard information centers, and educational programs for school-age children and adults.
- Natural Resource Protection (NR)—Actions that minimize hazard loss and also preserve or restore the functions of natural systems. These actions include sediment and erosion control, stream corridor restoration, watershed management, forest and vegetation management, and wetland restoration and preservation.
- Structural Flood Control Projects (SP)—Actions that involve the construction of structures to reduce the impact of a hazard. Such structures include dams, setback levees, floodwalls, retaining walls, and safe rooms.
- Emergency Services (ES)—Actions that protect people and property during and immediately following a disaster or hazard event. Services include warning systems, emergency response services, and the protection of essential facilities.

The prioritization criteria provided in Volume 1, Section 6 (Mitigation Strategy) identify 14 evaluation/prioritization criteria to complete the prioritization of mitigation initiatives. For each new mitigation action, a numeric rank is assigned (-1, 0, or 1) for each of the 14 evaluation criteria to assist with prioritizing actions as High, Medium, or Low. The table below provides a summary of the prioritization of all proposed mitigation initiatives for the HMP update.

Table 9.5-19. Summary of Prioritization of Actions

Project Number	Project Name	Life Safety	Property Protection	Cost-Effectiveness	Technical	Political	Legal	Fiscal	Environmental	Social	Administrative	Multi-Hazard	Timeline	Agency Champion	Other Community Objectives	Total	High / Medium / Low
2023-Village of Fairchilds-001	Public Alert Communication System	1	1	1	1	1	1	0	1	1	1	1	1	1	0	13	High





Project Number	Project Name	Life Safety	Property Protection	Cost-Effectiveness	Technical	Political	Legal	Fiscal	Environmental	Social	Administrative	Multi-Hazard	Timeline	Agency Champion	Other Community Objectives	Total	High / Medium / Low
2023-Village of Fairchilds-002	Conduct Flood Study	1	1	1	1	1	1	0	1	1	1	1	1	1	0	13	High
2023-Village of Fairchilds-003	Increment Weather Shelter	1	0	1	1	1	1	1	0	1	1	1	1	1	1	12	High
2023-Village of Fairchilds-004	Seek Expansion of Underground Broadband into all Areas of Fairchilds	1	0	1	1	1	1	0	1	1	1	1	1	1	1	12	High
2023-Village of Fairchilds-005	Critical Facilities Flood Protection	1	1	1	1	1	1	0	1	1	1	0	0	1	1	11	High

Note: Volume 1, Section 6 (Mitigation Strategy) conveys guidance on prioritizing mitigation actions. Low (0-4), Medium (5-8), High (9-14).