

Situation Manual (SitMan)

DAM FAILURE AND FLOODING TABLETOP EXERCISE

CITY OF DENTON EMERGENCY MANAGEMENT



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[FINAL]

PREFACE

The North Lakes Dam Failure and Flooding Tabletop Exercise (TTX) is sponsored by the City of Denton. This Situation Manual (SITMAN) was produced with input, advice, and assistance from the TTX exercise planning team, which followed the guidance set forth in the Federal Emergency Management Agency (FEMA), Homeland Security Exercise and Evaluation Program (HSEEP).

The Situation Manual (SITMAN) provides exercise participants with all the necessary tools for their roles in the exercise. It is tangible evidence of the City of Denton's commitment to ensure public safety through collaborative partnerships that will prepare it to respond to any emergency.

The North Lakes Dam Failure and Flooding Tabletop Exercise is an unclassified exercise. The control of information is based more on public sensitivity regarding the nature of the exercise than on the actual exercise content. Some exercise material is intended for the exclusive use of exercise planners, facilitators, and evaluators, but players may view other materials deemed necessary to their performance. The SITMAN may be viewed by all exercise participants.

All exercise participants should use appropriate guidelines to ensure the proper control of information within their areas of expertise and to protect this material in accordance with current jurisdictional directives. Public release of exercise materials to third parties is at the discretion of the planning team.

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HANDLING INSTRUCTIONS

1. The title of this document is *North Lakes Dam EAP Tabletop Exercise Situation Manual (SITMAN)*.
2. The information gathered in this SITMAN should be handled as sensitive information not to be disclosed. This document should be safeguarded, handled, transmitted, and stored in accordance with appropriate security directives. Reproduction of this document, in whole or in part, without prior approval from the City of Denton is prohibited.
3. At a minimum, the attached materials will be disseminated only on a need-to-know basis.
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REFERENCE MATERIALS

The following documents were utilized for the development of the North Lakes Dam EAP Tabletop and will be made available for reference during the exercise:

- Dam No. 16 and 17A Emergency Action Plan
- City of Denton Emergency Management Plan
- High Water and Severe Storm Emergency Policy and Procedures
- Emergency Operations Center Standard Operating Guidelines
- Technology Services' Business Continuity Plan

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INTRODUCTION

Background

The Denton Fire Department - Emergency Management provides leadership to mitigate, prepare for, respond to, and recover from disasters, infectious disease, terrorism, and mass casualty emergencies in Denton, Texas.

The City of Denton promotes all-hazards planning defined as planning in absence of a specific threat for capabilities that would be required to respond to any emergency regardless of the causative factor. Partners prepare a variety of exercise scenarios to contribute toward planning purposes for preparedness.

Purpose

The purpose of this exercise is to provide participants an opportunity to evaluate current response concepts, plans, and capabilities for a response to an incident at North Lakes Dams officially known as Soil Conservation Service (SCS) Dam No. 16. and SCS Dam No. 17A. The exercise will focus on incident command and control coordination, critical decisions, notifications, and the integration of assets necessary to save lives and protect public health and safety. The role of public information strategies will be critical to the overall response effort.

Scope

This exercise emphasizes the role of the Incident Command System in response to an imminent dam failure scenario. The exercise also emphasizes the role and responsibilities of the Emergency Operations Center (EOC) staff and disaster support organizations.

Target Capabilities

The National Planning Scenarios and the establishment of the National Preparedness Priorities have steered the focus of homeland security toward a capabilities-based planning approach. Capabilities-based planning focuses on planning under uncertainty, since the next danger or disaster can never be forecast with complete accuracy. Therefore, capabilities-based planning takes an all-hazards approach to planning and preparation which builds capabilities that can be applied to a wide variety of incidents. States and Urban Areas use capabilities-based planning to identify a baseline assessment of their homeland security efforts by comparing their current capabilities against the Target Capabilities List (TCL) and the critical tasks of the Universal Task List (UTL). This approach identifies gaps in current capabilities and focuses efforts on identifying and developing priority capabilities and tasks for the jurisdiction. These priority capabilities are articulated in the jurisdiction's homeland security strategy and Multi-Year Training and Exercise Plan, of which this exercise is a component of.

The capabilities listed below have been selected by the planning team from the priority capabilities identified in the City of Denton's Multi-Year Training and Exercise Plan. These capabilities provide the foundation for development of the exercise objectives and scenario, as the purpose of this exercise is to measure and validate performance of these capabilities and their associated critical tasks.

- Emergency Operations Center Management
- Emergency Public Information and Warning
- Citizen Evacuation
- Mass Care (Sheltering, Feeding, and Related Services)
- Restoration of Lifelines
- Economic and Community Recovery

Exercise Objectives

Exercise design objectives are focused on improving understanding of a response concept, identifying opportunities or problems, and/or achieving a change in attitude. The exercise will focus on the following objectives selected by the exercise planning team:

1. Familiarize EOC staff with North Lakes Dam Emergency Action Plan.
2. Familiarize EOC staff with High Water and Severe Storm Emergency Policy and Procedures.
3. Review and utilize EOC Standard Operating Procedures.
4. Discuss Continuity of Operations (COOP) – Tech Services’ Business Continuity Plan.

Participants

- **Players** respond to the situation presented based on expert knowledge of response procedures, current plans and procedures, and insights derived from training.
- **Observers** support the group in developing responses to the situation during the discussion; however, they are not participants in the moderated discussion period.
- **Facilitators** provide situation updates and moderate discussions. They also provide additional information or resolve questions as required. Key planning committee members may also assist with facilitation as subject matter experts (SMEs) during the tabletop exercise.
- **Evaluators** are assigned to observe and evaluate certain objectives during the exercise. Their primary role is to document players’ discussions, including how and if those discussions conform to written and established procedures.

Exercise Structure

This will be a multimedia, facilitated tabletop exercise. Players will participate in the following four distinct modules:

- Module 1: Abnormal Condition
- Module 2: Watch Condition
- Module 3: Possible Dam Failure
- Module 4: Imminent Dam Failure

Each module begins with an update that summarizes the key events occurring within that time period. Following the updates, participants review the situation and engage in functional group discussions of appropriate response issues.

Following these functional group discussions, participants then enter into a facilitated caucus discussion in which a spokesperson from each group presents a synopsis of the group's actions based on the scenario.

Exercise Guidelines

- This is an open, low-stress, no-fault environment. Varying viewpoints, even disagreements, are expected.
- Respond based on your knowledge of current plans and capabilities (i.e., you may use only existing assets) and insights derived from training.
- Decisions are not precedent setting and may not reflect your organization's final position on a given issue. This is an opportunity to discuss and present multiple options and possible solutions.
- Issue identification is not as valuable as suggestions and recommended actions that could improve response and preparedness efforts. Problem-solving efforts should be the focus.

Assumptions and Artificialities

In any exercise a number of assumptions and artificialities may be necessary to complete play in the time allotted. During this exercise, the following apply:

- The scenario is plausible, and events occur as they are presented.
- There is no "hidden agenda", nor any trick questions.
- All players receive information at the same time.

Drill Planning Team

The following individuals contributed their time and particular areas of expertise to the development of the North Lake's Dam EAP TTX:

- Bob Martinez, Emergency Management Coordinator, Denton Fire Department
- Charles Talkington, Emergency Management Intern, Denton Fire Department

MODULE 1: ABNORMAL CONDITION

Thursday, September 8, 2022 7AM CDT

Background Information:

North Lakes Park Dam No. 16 (south lake) and Dam No. 17A (north lake) are owned and operated by the City of Denton Parks and Recreation Department and the Denton County Soil and Water Conservation District (SWCD). Dam No. 16 is located on Pecan Creek and Dam No. 17A is located on North Pecan Creek. North Pecan Creek is a tributary of Pecan Creek, located in the Trinity River Basin. The dams were completed in 1975. The lakes were constructed to serve as flood control structures. According to the Dam Breach Analysis (located in Tab 8 of the Emergency Action Plan), if a breach of either dam were to occur, a flood wave would flow downstream through developed areas along Pecan Creek and North Pecan Creek. A breach of either dam has the potential to result in the loss of human life and loss of property.

Weather Update:

A wet weather pattern in late October has left much of north Texas with saturated soils. Rainfall totals for October mostly ranged from 5 to 8 inches across the DFW Metroplex. Normal rainfall for October is in the 4 to 5 inch range. October rainfall totals across Denton County, generally ranged from 6 to 7 inches, with the bulk of the monthly total occurring the last weekend of October.

A weak cold front is forecast to move into North Texas on Tuesday, October 30, and trigger showers and thunderstorms as it collides with a warm and humid air mass in place over the region. The best chance for thunderstorms will be from Tuesday afternoon into the overnight hours as the front moves slowly to the south. While the severe weather threat looks low, the storms could produce some torrential downpours resulting in rainfall totals through early Wednesday morning, October 31, in the 1 to 2 inch range.

Dam Status:

A routine inspection of the North Lakes dams by Parks & Recreation personnel determines that the lakes are rapidly filling due to the heavy rainfall/flash flooding situation in the upstream Trinity River Basin tributary system. There is concern regarding the accelerated inflow rate and possible impact on maximum water retention capability. An Abnormal Condition is determined to exist by the Parks and Recreation Superintendent, who notifies the Parks and Recreation Director, Emergency Management Coordinator, and City Engineer.

Questions

Based on the information provided, participate in the discussion concerning the issues raised in Module 1. Identify any additional requirements, critical issues, decisions, and/or questions that should be addressed at this time.

The following questions are provided as suggested general subjects that you may wish to address as the discussion progresses. These questions are not meant to constitute a definitive list of concerns to be addressed, nor is there a requirement to address every question.

Management Section

The appropriate city staff have been notified at this point according to the EAP. Should any other support staff be contacted just for their information or “heads up?” If so, who?

Who is the Incident Commander at this point? Who “owns” this incident?

What does the ICS organization chart look like?

What are the top 3 priorities at this point? Refer to EOC Action Plan on page 74 of the EOC Standard Operating Guidelines.

What liaison agencies at the local, state, and/or federal level could help provide critical information to assist with the decision-making process?

Operations Section

Upon hearing the news that an Abnormal Condition exists at the dams at North Lakes Park, it gets you to thinking “what if” the worst case happens? What critical facilities are located in the flood inundation area that may be impacted? What city services might be disrupted? **Make a list of what special needs facilities (schools, day care centers, nursing homes, etc.) that are in the flood inundation area.** If you don’t have the information readily available, where might you turn for help? What City buildings are located in the Pecan Creek floodplain?

Logistics Section

Upon hearing the news that an Abnormal Condition exists at the dams at North Lakes Park, it gets you to thinking “what if” the worst case happens? Remember the purpose of the Logistics Section is to support the emergency operations of the city of Denton, including ordering resources and mutual-aid support. If the situation at the North Lakes Dams progresses, what resources might be needed if the dam begins showing signs of excessive seepage, embankment or foundation sliding, or other signs of structural failure? Does the city have the heavy equipment, type of fill, cement mixing, etc., resources readily available? If not, where would you turn for help? Are contracts, mutual-aid agreements, or other understandings in place for use of resources from the private sector? **Make a list of what resources might be needed to help stabilize the dams at North Lakes Park, if needed.**

Planning Section

Upon hearing the news that an Abnormal Condition exists at the dams at North Lakes Park, it gets you to thinking “what if” the worst case happens? Remember the purpose of the Planning Section, among other things, is to be looking forward and to help develop the EOC Action Plan for managing the incident, which we will get to in upcoming scenario updates. However, if the EOC were activated for a briefing at this point, what information would be helpful to be displayed in the EOC to assist with the decision-making process? **Approximately how many structures could be impacted by a worst-case dam failure scenario (along Pecan Creek from North Lakes Park to Lake Lewisville)?** Are you able to obtain and display this information electronically in the EOC? If flooding were to occur, who would conduct the damage assessment? Are the damage assessment teams trained and ready to go when needed? What assistance would the Engineering Department be providing at this point.

Finance Section

Upon hearing the news that an Abnormal Condition exists at the dams at North Lakes Park, it gets you to thinking “what if” the worst case happens? If the situation continues to worsen and equipment and personnel are needed to support the incident, how will you keep track of these expenses? **How would you determine the FEMA allowable equipment rate charge for various heavy equipment trucks and items that may be utilized for this emergency event?** How will information to keep track of disaster related expenses be communicated to departments and time-keepers? Who in finance will be responsible for maintaining this information?

Example: If a dump truck with 8 cubic yards of fill has been requested to help shore up embankment sliding at one of the dams, what would be the equipment rate charge? What about the cost of the actual fill material (rock fill dirt, sand, gravel and small rocks, etc.)? The dump truck stages at the site for one hour before actually being used. Is “standby” time an allowable expense? How is employee regular time and any overtime going to be tracked?

Public Information Officers

Would you be involved in the incident at this point? If so, what information would you need to have? **If EOC operations need to be partially or fully implemented, where would the Joint Information Center (JIC) be located?** Do you have the necessary staffing and resources to manage the public information function for an extended time at the EOC or other location? Who would be lead PIO/City Spokesperson at this point? What do you see as the main PIO duties at this point in the scenario?

MODULE 2: WATCH CONDITION

Friday, September 9, 2022 7AM CDT

Wx Update

As expected, showers and thunderstorms developed during the afternoon hours of Tuesday October 30th. The storms produced 24 hour rainfall totals as high 1.30 inches at the Denton Airport (DTO) with most other rain gauges measuring around 1 inch. The weak cold front has become stationary just south of Denton across the DFW Metroplex. Scattered showers and thunderstorms are expected to develop again Wednesday afternoon. While the heavy rainfall is not expected to be widespread, where storms do develop, another 1 to 1.5 inches of rain could fall quickly on ground that is already very moist from the previous rain events of the past several days.

A strengthening low pressure system over southern Colorado is forecast to move into north Texas early Thursday and trigger additional thunderstorms with heavy rainfall possible. A Flash Flood Watch (FFW) has been issued for north Texas due to the heavy rain threat.

Dam Status:

The lakes at North Lakes Park continue to fill at an alarming rate. The situation requires constant monitoring. At 9:00 a.m., SCS Reservoir #16 (south lake) engages the emergency spillway. Director Vorel determines a “Watch Condition” to exist. The EOC ramps up operations. Additional notifications are made to NRCS and TCEQ.

Questions

Based on the information provided, participate in the discussion concerning the issues raised in Module 2. Identify any additional requirements, critical issues, decisions, and/or questions that should be addressed at this time.

The following questions are provided as suggested general subjects that you may wish to address as the discussion progresses. These questions are not meant to constitute a definitive list of concerns to be addressed, nor is there a requirement to address every question in this section.

Management Section

What is the EOC Staffing at this point? Full or partial? If partial, which sections are stood-up?

The EAP states a “Watch” message will be issued by the EOC to downstream organizations, if so directed by the OEM and Parks and Recreation Officials. Is a “Watch” message advisable at this point? Refer to page 26 of the EAP for the “Watch” condition pre-scripted message.

Is there anything that can be done to mitigate or limit the amount of water flowing into the reservoirs? How is the inflow of water being monitored? What about creek levels upstream?

Close contact should be maintained with the National Weather Service Office in Fort Worth. What position at the Management table is responsible for coordinating with outside agencies?

Should the Incident Commander change at this point in the event? Who is in charge now?

What are the top 3 priorities at this point? Refer to EOC Action Plan on page 74 of the EOC Standard Operating Guidelines.

Operations Section

Are there any emergency and protective measures that need to be taken at this point to mitigate a possible dam failure? What about strengthening the dam? Should additional shoring or fill be applied?

Based upon your previous discussion of what critical facilities and special needs populations, along with residential homes and apartments located in the flood inundation area in general, how many shelters may be needed and where would they be located? Refer to the Emergency Management Plan – Annex C (Shelter and Mass Care) – Appendix 1.

What liaison agency manages the shelter operations for the City of Denton? What agency can assist with functional needs issues and activating the Medical Reserve Corps for help?

Are there sufficient police and fire personnel staffing and equipment available to manage a possible evacuation of this scale? If not, what mutual-aid departments would be contacted for assistance?

What utilities may be impacted by one or both dam failures at North Lakes Park? Can any emergency efforts be accomplished to protect or mitigate the impact of dam failure and resulting flooding on critical infrastructure along the Pecan Creek floodplain?

Where should operational efforts be focused at this point?

Logistics Section

If an evacuation becomes necessary, what agencies can assist with transportation assets? Are mutual-aid agreements in place? Should you go ahead and notify the contacts now and have them on standby just in case? Approximately how many buses may be needed? Will handicapped buses be necessary? Where will the buses stage? What about refueling?

Does Parks and Recreation have sufficient staffing to continue monitoring the issues at the dams, assist with the possibility of opening shelters at rec centers, and perform their other routine functions? If not, from what departments may they pull additional personnel for assistance?

Will there be any issues with communications? Is the radio system capable of managing radio traffic from multiple incident sites: North Lakes Dams, possible evacuation area(s), and potential multiple shelter sites, in addition to routine radio traffic? Will the radio system infrastructure be impacted by possible flooding in the inundation area? Are mutual-aid organizations from the region able to communicate on the City's 800 MHz system? Are there any issues?

If the EOC went to 24 hour operations, who would arrange for food and water for EOC staff? From where? How would this be managed?

Planning Section

What information would be useful to display in the EOC at this point in the scenario? Is there any way to have access to aerial images of the dams and potential flood inundation area? What flood layers are available as part of the city mapping system on the Intranet? What about real-time live video images of the dams? Is this possible?

If flooding were to occur in the Pecan Creek floodplain, discuss what City buildings might be impacted? Refer to the Tech Services' Business Continuity Plan. Take one potentially affected building and review where the departments located at that site would relocate in order to continue operations.

How are EOC status updates and information being kept? What computer programs are being used to manage this information? Will the Planning Section be able to obtain and archive this and other disaster-related documents for future reference?

Are there any important documents/data at City buildings that could be impacted by flooding in the Pecan Creek tributary? How can these records be secured? Where would they be relocated?

Are damage assessment teams ready for deployment? Who performs residential damage assessment and who conducts critical infrastructure damage assessment? Who will cover their regular duties while they are engaged in damage assessment duties?

What impact will flooding have on economic development along the Pecan Creek floodplain?

Finance Section

Resources are being contacted and put on standby for such items as transportation (buses) and mutual-aid assistance (fire and police) from other agencies and jurisdictions. How will the cost for these items, if any, be tracked?

Emergency services may be gearing up for a major evacuation operation. Does the Finance Section have the necessary system in place to track personnel and equipment expense for this undertaking? If not, what system is needed to track expenses at this point in the scenario? Who should be involved in the process to track costs (timekeepers, purchasing, HR, etc.)?

How will any injuries or claims from mutual-aid organizations be handled by Risk Management?

How will emergency contracts be managed by Materials Management?

Public Information Officers

Sample notification and press releases are included in tabs 3 and 4 of the EAP. If the EOC Management Section decides to issue a “Watch” Condition message, what issues, if any, do you foresee when this information is provided to organizations?

What would staffing be like for the Public Information Section at this point in the scenario?

Would a phone bank be necessary if a “Watch” Condition message were issued? If so, where would it be located and who would staff it?

What public information systems would be utilized to disseminate the message to the public?

Where would press conferences, if any, be held? Who would lead, conduct, and speak at these?

Are there any other public information issues or concerns at this point? If so, please list.

MODULE 3: POSSIBLE DAM FAILURE

Saturday, September 10, 2022 7AM CDT

Weather Update:

Scattered thunderstorms developed Wednesday afternoon and deposited anywhere from a half inch to some isolated 2 inch totals over Denton County. The stationary front that was south of Denton County is forecast to move back north as a warm front allowing the warm and moist air mass to move back across the region. A low pressure system was approaching from the west and another round of heavy rainfall is expected into Friday morning. Additional rainfall as totals as high as 2 inches are possible before the rainfall tapers off Friday morning. Flash Flood warnings were issued for most of Denton County during the overnight hours. Any additional rainfall will turn strictly to run-off as soils have been saturated from earlier rainfall.

Dam Status:

The “Watch” condition is progressively getting worse. Although both lakes continue to fill at an alarming rate, SCS Reservoir #16 (south lake) is of utmost concern. The EOC is fully staffed and activated. Notifications have been made to TX DOT, Denton County Emergency Services, TDEM District Coordinator, NRCS, and TCEQ. After consulting with on-scene personnel, Director Vorel determines that a “Possible Dam Failure” situation exists. Following procedures outlined in the EAP, a warning message needs to be sent to downstream residents.

Questions

Based on the information provided, participate in the discussion concerning the issues raised in Module 3. Identify any additional requirements, critical issues, decisions, and/or questions that should be addressed at this time.

The following questions are provided as suggested general subjects that you may wish to address as the discussion progresses. These questions are not meant to constitute a definitive list of concerns to be addressed, nor is there a requirement to address every question in this section.

Management Section

Will you go to 24 hour staffing of the EOC at this point? What will be the operational period – 3 eight hour shifts, 2 twelve hour shifts, etc.? If so, which EOC Section will arrange for the staffing?

The EAP states, “The EOC will send a ‘possible dam failure’ warning message to downstream residents.” See Tab 3 to the EAP for Sample Notification Messages (Page 26). What issues do you think will arise when this message is disseminated? How can you assure residents that everything possible is being done to alleviate a dam failure? Who will be the lead City spokesperson?

Is the Management Section advising a voluntary or mandatory evacuation at this point?

Should a local State of Disaster be declared? Where is this form located in the City’s Emergency Management Plan?

What are the top 3 priorities at this point? Refer to EOC Action Plan on page 74 of the EOC Standard Operating Guidelines.

Operations Section

Approximately how many structures would be impacted by a dam failure of SCS Reservoir #16 (south lake). What would be the water level downtown if the dam fails and a “wave” of water resulted? How long would the water level remain high? Would water rescues be necessary? Are local emergency response resources sufficient to deal with this issue?

Are the shelters staffed and ready to begin accepting evacuees if a voluntary evacuation is recommended? Will background checks be performed at all shelter sites? What will you do with any registered sex offenders? Does the local American Red Cross office have sufficient staffing to manage multiple shelter sites? If not, where would they pull additional staffing?

If the dam’s integrity is threatened by overtopping flood waters, what erosion-resistant protection measures can be implemented to the downstream slope? Refer to Page 13 of the EAP. Where would you obtain these resources? What Section of the EOC is responsible for providing this request?

What impact would flooding along the Pecan Creek floodplain have on utilities? Discuss possible impacts to water, wastewater, drainage, streets, traffic, solid waste, and DME.

Is potential debris management an issue? How would this be handled?

Logistics Section

The EAP lists supplies and resources that may be needed on short notice to help avert a dam failure at North Lakes. Review the list on pages 14 and 15 and discuss if these items are readily available, and if not, where may they be obtained? Are any necessary contracts in place? How are emergency purchases handled? Who is tracking the cost?

Are transportation assets in place? How will you manage refueling, emergency maintenance, and cost associated with these and other transportation related items?

Food and water is needed for emergency personnel at the dam site on a 24 hour basis? Who from Logistics will coordinate this request?

Which EOC Section would need to know about the expenses being incurred by the Logistics Section for possible future federal reimbursement?

What organization located at the airport may be available to provide flyovers and conduct aerial photographs, which might assist with the emergency decision-making process?

Planning Section

The Management Section has listed the top 3 priorities at this point in the scenario. Coordinate with them on development of the **EOC Action Plan** on Page 74 of the EOC Standard Operating Guidelines.

What other organization(s) would be able to assist with the damage assessment function? Is flooding typically covered under a homeowner's insurance coverage? What damage assessment forms will need to be completed as part of the damage assessment process? Refer to the Disaster Recovery Manual on table.

How can the City of Denton EOC status updates be shared electronically with county, region, and state emergency management officials? What program is used? Who is keeping it updated?

A flooding situation can lead to increased mosquito activity. With WNV as a recent concern, what vector control activities can be initiated to help manage this issue?

What would be the City Engineer's role at this point?

Finance Section

Finance Section members should be familiar with the disaster declaration process. Take a moment and review the Disaster Recovery Manual at your table, particularly the forms in the back of the book. Which form list the primary and secondary agents that are authorized to file an Application for Public Assistance on behalf of the City?

For the FEMA Public Assistance Program, what is the typical cost share for approved disaster-related expenses?

Does the City have insurance for its public buildings or is it self-insured? What about damage to roads and bridges as a result of flooding?

What is FEMA's record retention policy? Applicants are required to keep complete records of all work (receipts, checks, job orders, contracts, equipment usage documentation, and payroll information) funded under the Public Assistance program for a period of _____ years?

Public Information Officers

A sample news release for a Possible Dam Failure is located in the EAP on Tab 3 (Page 28). Please take this sample information and develop an appropriate news release based on the current scenario. Be prepared to present this to the group.

In addition to local media, the national networks are gaining interest in this developing situation. Where would you have media locate for video footage and media briefings? Where will news conferences be held?

Who would be lead City spokesperson?

Are local PIO resources enough to manage this situation or would you need additional personnel from the region? If more PIO personnel resources are needed, how are they contacted or activated? How many PIO's do you think would be necessary for 24 hour operations, which include the site(s) and EOC?

If a Possible Dam Failure Warning message is disseminated to the public, what information would you need readily available to communicate to the public and media? What methods will be used to target potentially impacted citizens with the appropriate information?

MODULE 4: IMMINENT DAM FAILURE

Sunday, September 11, 2022 7AM CDT

Weather Update:

The rainfall is finally starting to taper off but not before the remaining storms deposited an additional 2 to 2.5 inches of rainfall during the overnight hours. Storm total rainfall amounts have exceeded 6 inches during the past 4 days at a couple of gauges on the northwest side of Denton. Several roads and low water crossings remain flooded around the county. Even though the heaviest rain has ended, runoff from the storms will continue for several more hours.

Dam Status:

SCS Reservoir #17A (north lake) water level has stabilized. However, SCS Reservoir #16 (south lake) continues to fill and is at the crest of the dam. Overtopping appears imminent, which could destabilize the earthen dam structure. The Parks and Recreation superintendent immediately notifies Director Vorel and EMC Penaluna. EOC staff should begin preparations for an Imminent Dam Failure, including finalizing a “failure” message for downstream residents.

Questions

Based on the information provided, participate in the discussion concerning the issues raised in Module 4. Identify any additional requirements, critical issues, decisions, and/or questions that should be addressed at this time.

The following questions are provided as suggested general subjects that you may wish to address as the discussion progresses. These questions are not meant to constitute a definitive list of concerns to be addressed, nor is there a requirement to address every question in this section.

Management Section

Who will make the final decision as to whether it is time for a mandatory evacuation?

Has a local State of Disaster been declared by the Mayor, filed with the City Secretary, and forwarded to the Texas Division of Emergency Management?

How long is a local State of Disaster in effect unless renewed by the City Council? ___ days.

State law provides the Mayor the authority to order a mandatory evacuation of all or part of the population from a stricken area. What will you do with any citizens who refuse to evacuate?

Once a local State of Disaster has been issued, it grants certain emergency powers to the local jurisdiction. What items besides evacuation may be regulated? See Annex U (Legal), Appendix 5, to the Emergency Management Plan for a list of Sample Emergency Powers.

Individuals, both locally and from around the region, have decided to “help” the potential dam failure/flood victims by donating various household items, including used clothing. Bags of donated items have begun showing up at Central Fire Station and the PD. Who is the City’s Donations Management Coordinator? See Annex T (Donations Management) to the Emergency Management Plan. How will this issue be managed?

There are several City buildings in the Pecan Creek flood inundation area. Should the Tech Services’ Business Continuity Plan be initiated at this point? Where would the Customer Service be relocated for example?

What are the top 3 priorities at this point? Refer to EOC Action Plan on page 74 of the EOC Standard Operating Guidelines.

Operations Section

What might be the expected duration of this emergency incident? How long may residents be out of their homes and businesses? What would be the estimate of water level in the flood inundation zone?

How is the field ICS organization chart structured at this time? Where are the field Command Post(s) located?

Residents in the evacuation zone are showing up to the shelters with pets. What department is in charge of animal issues? See Annex N (Direction and Control), Appendix 4 (Animal Issues), to

the Emergency Management Plan. Which local shelter is typically used as a “pet friendly” shelter?

Residents in the evacuation zone are concerned about looting of their homes if they are forced to evacuate. How is security being handled? Does PD have enough resources, in addition to other on-going duties, to manage this function?

Should residents in the evacuation zone turn off the electricity to their homes or businesses if they have to evacuate? What about water or gas? Is this necessary?

If the flooding leads to extensive debris management, would you need a Right of Entry Agreement signed to access private property for any reason? Refer to Annex W (Debris Management), Appendix 1.

Logistics Section

The EAP lists supplies and resources that may be needed on short notice to help avert a dam failure at North Lakes. Review the list on pages 14 and 15 and discuss if these items are readily available, and if not, where may they be obtained? Are any necessary contracts in place? How are emergency purchases handled? Who is tracking the cost?

Are transportation assets in place? How will you manage refueling, emergency maintenance, and cost associated with these and other transportation related items?

Food and water is needed for personnel at the dam site? Who from Logistics will coordinate this request?

Which EOC Section would need to know about the expenses being incurred by the Logistics Section for possible future federal reimbursement?

Planning Section

Does the EOC Action Plan need updating? Have the Management Section priorities changed?

Can flood inundation maps be readily produced and available for the EOC staff for reference?

Does the EOC have sufficient technology components to manage an on-going emergency operation of this nature? If not, what changes need to be made?

Would there be any impact on local sales tax revenue from businesses that may have to temporarily close due to an evacuation order?

State damage assessment teams are on the way from Austin. If the dam were to fail, how long would it take to perform a Windshield Assessment and have some preliminary information available? In what manual is the Windshield Assessment Form located?

Finance Section

For this scenario, how likely is the city to qualify for a Presidential Disaster Declaration that includes PA (Public Assistance)? Do you think it will qualify? If not, who will have to absorb the cost (i.e., emergency protective measures and debris clearance) of this disaster?

Would IA (Individual Assistance) qualify? What about SBA loans for flood damage to homes and businesses?

With regard to debris management, are contracts for debris operations an eligible expense under PA? If an applicant performs their own debris removal, payroll and _____ hours must be kept.

Are systems to properly keep track of disaster related expenses? If not, what changes need to be made?

Public Information Officers

A sample news release for an Imminent Dam Failure is located in the EAP on Tab 4 (Page 29). Please take this sample information and develop an appropriate news release based on the current scenario. Be prepared to present this to the group.

There is a posting on Facebook that the possible dam failure is due to terrorism. How do you address this and other rumors?

Numerous surrounding jurisdiction officials in the county and region are requesting information on the possible dam failure. Is there a way to share local public information in real-time with PIO's in the region so everyone can have the same data in a "virtual" method?

APPENDIX A: PARTICIPANT LIST

Management Section:

Fire Chief
Emergency Manager
Fire Marshall
Assistant City Manager

Operations Section:

Police Operations
Fire Operations
Water Utilities
Parks & Recreation
Denton Municipal Electric

Logistics Section:

Fleet Services
Purchasing Agent
Transportation
Human Resources

Planning Section:

Planning & Development
Economic Development
Fire Marshal's Office
Building Inspections
Environmental Services
City Engineer

Finance Section:

Risk Management

PIO's

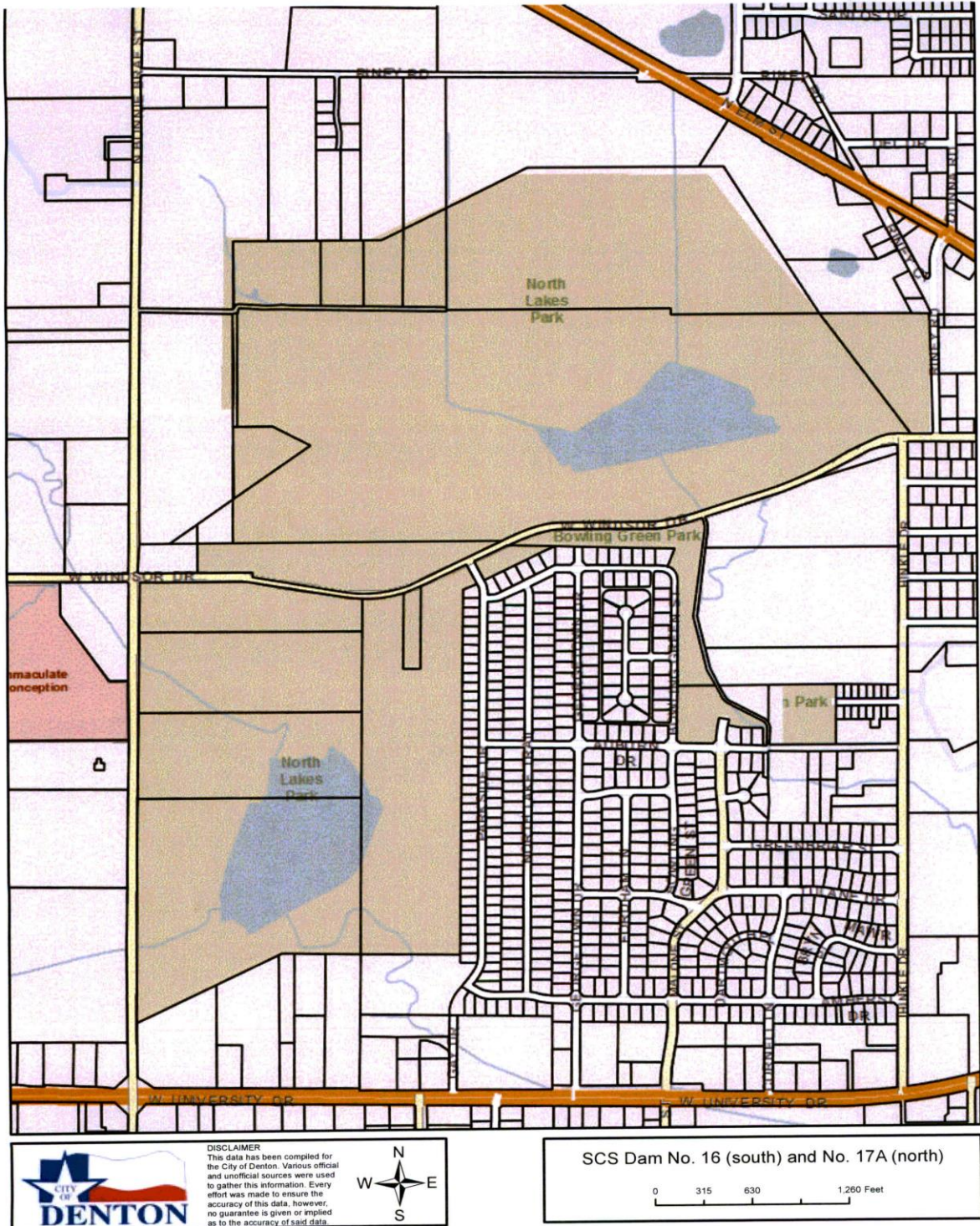
CMO PIO
Fire PIO

Liaison Agencies:

Denton County Health Department – Medical Reserve Corps
Denton County Emergency Services

UNT Emergency Management
TWU Emergency Management

APPENDIX B: DAM AREA MAP



APPENDIX C: ACRONYMS

Acronym	Meaning
AAR	After Action Report
ARC	American Red Cross
BCP	Business Continuity Plan
DHS	Department of Homeland Security
EAP	Emergency Action Plan
EEG	Exercise Evaluation Guide
EMP	Emergency Management Plan
EOC	Emergency Operations Center
FEMA	Federal Emergency Management Agency
HSEEP	Homeland Security Exercise & Evaluation Program
ICS	Incident Command System
IP	Improvement Plan
MRC	Medical Reserve Corps
NIMS	National Incident Management System
NRCS	Natural Resources Conservation Service
NWS/WFO	National Weather Service/Weather Forecast Office
OEM	Office of Emergency Management
PIO	Public Information Officer
POC	Point of Contact
SCS	Soil Conservation Service
SOG	Standard Operating Guidelines
SWCD	Soil and Water Conservation District
TCEQ	Texas Commission on Environmental Quality
TCL	Target Capabilities List
TDEM	Texas Division of Emergency Management
TTX	Tabletop Exercise
TXDOT	Texas Department of Transportation
USDA	United States Department of Agriculture
UTL	Universal Task List