

Milligan Water Supply Corporation Drought Contingency and Water Emergency Response Plan

December 2013

1. INTRODUCTION AND OBJECTIVES

The measures included in this Drought Contingency and Water Emergency Response Plan are intended to provide short-term water savings during drought or emergency conditions. Water savings associated with ongoing, long-term strategies are discussed in the Water Conservation Plan.

The purpose of this drought contingency and water emergency response plan is as follows:

- To conserve the available water supply in times of drought and emergency.
- To maintain supplies for domestic water use, sanitation, and fire protection
- To protect and preserve public health, welfare, and safety
- To minimize the adverse impacts of water supply shortages
- To minimize the adverse impacts of emergency water supply conditions

A drought is defined as an extended period of time when an area receives insufficient amounts of rainfall to replenish the water supply, causing water supply sources, in this case reservoirs to be depleted. In the absence of drought response measures, water demands tend to increase during a drought due to the need of additional outdoor irrigation. The severity of the drought depends on the degree of depletion of supplies and on the relationship of demand to available supplies. The NTMWD considers a drought to end when all of its supply reservoirs refill to the conservation storage pool.

2. DROUGHT CONTINGENCY AND WATER EMERGENCY RESPONSE STAGES AND MEASURES

STAGE 1

Initiation and Termination Conditions for Stage 1

The NTMWD has initiated Stage 1, which may be initiated due to one or more of the following;

The NTMWD Executive Director, with the concurrence of the NTMWD Board of Directors, finds that conditions warrant the declaration of Stage 1.

Water demand is projected to approach the limit of the permitted supply.

The storage in Lavon Lake is less than 65% of the total conservation pool capacity.

NTMWD's storage in Jim Chapman Lake is less than 65% of the NTMWD's total conservation pool capacity.

The Sabine River Authority has indicated that its Upper Basin water supplies used by NTMWD (Lake Tawakoni and/or Lake Fork) are in a Mild Drought.

NTMWD has concern that Lake Texoma, the Ease Fork Raw Water Supply Project, or some other NTMWD source may be limited in availability in the next 6 months.

NTMWD water demands exceeds 90% of the amount that can be delivered to customers for three consecutive days.

Water demands for all or part of NTMWD's delivery system approaches delivery capacity because delivery

capacity is inadequate.
NTMWD's supply source becomes contaminated.
NTMWD's water supply system is unable to deliver water due to the failure or damage of major water system components.

Suppliers water demand exceeds 90% of the amount that can be delivered to customers for three consecutive days.
Supplier's water demand for all or part of the delivery system approaches delivery capacity is inadequate.
Supply source becomes contaminated.
Supplier's water supply system is unable to deliver water due to the failure or damage of major waer system components.
Supplier's individual plan me be implemented if other criteria dictate.

Stage 1 may terminate when NTMWD terminates its Stage 1 condition or when the circumstances that caused the initiation of Stage 1 no longer prevail.

Goal for Use Reduction and Actions Available under Stage 1

Stage 1 is intended to raise public awareness of potential drought or water emergency problems. The goal for water use reduction under Stage 1 is a two percent reduction in the amount of water produced by NTMWD. The General Manager or Board of Directors may order the implementation of any of the actions listed below, as deemed necessary:

Request voluntary reductions in water use by the public and by wholesale customers.
Notify wholesale customers of actions being taken and request implementation of similar procedures.
Increase public education efforts on ways to reduce water use.
Review the problems that caused the initiation of Stage 1.
Intensify efforts on leak detection and repair.
Reduce non-essential city government water use(Examples include street cleaning, vehicle washing, operation of ornamental fountains, etc.)
Notify major water users and work with them to achieve voluntary water use reductions.
Reduce city government water use for landscape irrigation.
Ask the public to follow voluntary landscape watering schedules.

STAGE 2

Initiation and Termination Conditions for Stage 2

The NTMWD has initiated Stage 2, which may be initiated due to one or more of the following:

The NTMWD Executive Director, with the concurrence of the NTMWD Board of Directors, finds that conditions warrant the declaration of Stage 2.
Water demand is projected to approach the limit of the permitted supply.
The storage in Lavon Lake is less than 55% of the total conservation pool capacity.
NTMWD's storage in Jim Chapman Lake is less than 55% of NTMWD's total conservation pool capacity.
The Sabine River Authority has indicated that its Upper Basin water supplies used by NTMWD(Lake Tawakoni and/or Lake Fork) are in a Mild drought.
NTMWD has concern that Lake Texoma, the East Fork Raw Water Supply Project, or some other NTMWD source may be limited in availability in the next 3 months.
NTMWD water demand exceeds 95% of the amount that can be delivered to customers for three consecutive days.
NTMWD water demand for all or part of the delivery system equals delivery capacity because delivery capacity is inadequate.
NTMWD's supply source has been contaminated.
NTMWD's water supply system is unable to deliver water due to failure or damage of major water system components.
Supplier's water demand exceeds 95% of the amount that can be delivered to customers for three

consecutive days.

Supplier's water demand for all or part of the delivery system equals delivery capacity because delivery capacity is inadequate.

Supply source becomes contaminated.

Supplier's water supply system is unable to deliver water due to the failure or damage of major water system components.

Supplier's individual plan may be implemented if other criteria dictate.

Stage 2 may terminate when NTMWD terminates its Stage 2 condition or when the circumstances that caused the initiation of Stage 2 no longer prevail.

Goal for Use Reduction and Actions Available under Stage 2

The goal for water use reduction under Stage 2 is five percent reduction in the amount of water produced by NTMWD. If circumstances warrant or if required by NTMWD, the General Manager or Board of Directors can set a goal for greater water use reduction. The General Manager or Board of Directors may order the implementation of any of the actions listed below, as deemed necessary. Measures described as "requires notification to TCEQ" impose mandatory requirements on customers. The supplier must notify TCEQ and NTMWD within 5 business days if these measures are implemented:

Continue or initiate any actions available under Stage 1.

Notify wholesale customers of actions being taken and request them to implement similar procedures.

Initiate engineering studies to evaluate efforts on ways to reduce water use.

Halt non-essential city government water use. (Examples include street cleaning, vehicle washing, operation of ornamental fountains, etc.)

Encourage the public to wait until the current drought or emergency situation has passed before establishing new landscaping.

Requires Notification to TCEQ- Limit landscape watering with sprinklers or irrigation systems to no more than two days per week. An exception is allowed for landscape associated with new construction that may be watered as necessary for 30 days from the date of the certificate of occupancy. An exemption is also allowed for registered and properly functioning ET/Smart irrigation systems and drip irrigation systems, which do not have restrictions to the number of days per week of operation.

Requires Notification to TCEQ- Restrict landscape and lawn irrigation from 10AM to 6PM beginning April 1 through October 31 of every year.

Requires Notification to TCEQ- Prohibit planting of cool season grasses (such as rye grass or other similar grasses) that intensify cool season water requirements.

Stage 3

Initiation and Termination Conditions for Stage 3

The NTMWD has initiated Stage 3, which may be initiated due to one or more of the following:

The NTMWD Executive Director, with the concurrence of the NTMWD Board of Directors, finds that conditions warrant the declaration of Stage 3.

Water demand is projected to approach or exceed the limit of the permitted supply.

The storage in Lavon Lake is less than 45% of the total conservation pool capacity.

NTMWD's storage in Jim Chapman Lake is less than 45% of NTMWD's total conservation pool capacity.

The Sabine River Authority has indicated that its Upper Basin water supplies used by NTMWD (Lake Tawakoni and/or Lake Fork) are in a Moderate drought. (Measures required by SRA under a Moderate drought designation are similar to those under NTMWD's Stage 3.)

The supply from Lake Texoma, the East Fork Raw Water Supply Project, or some other NTMWD source has become limited in availability.

NTMWD water demand exceeds 98% of the amount that can be delivered to customers for three consecutive days.

NTMWD water demand for all or part of the delivery system exceeds delivery capacity because delivery

capacity is inadequate.
NTMWD's supply source becomes contaminated.
NTMWD's water supply system is unable to deliver water due to the failure or damage of major water system components.

Supplier's water demand exceeds 98% of the amount that can be delivered to customers for three consecutive days.
Supplier's water demand for all or part of the delivery system exceeds delivery capacity because delivery capacity is inadequate.
Supplier's water supply system is unable to deliver water due to the failure or damage of major water system components.
Supplier's individual plan may be implemented if other criteria dictate.

Goals for Use Reduction and Actions Available under Stage 3

The goal for water use reduction under Stage 3 is a reduction of ten percent in the amount of water obtained from NTMWD. If circumstances warrant or if required by NTMWD, the General Manager or the Board of Directors can set a goal for a greater water use reduction.

The General Manager or Board of Directors must implement any action(s) required by NTMWD. In addition the General Manager or Board of Directors may order the implementation of any of the actions listed below, as deemed necessary. Measurers described as "requires notification to TCEQ" impose mandatory requirements on customers. The supplier must notify TCEQ and NTMWD within five business days if these measures are implemented:

Continue or initiate any actions available under Stages 1 and 2.

Notify wholesale customers of actions being taken and request them to implement similar procedures.
Implement viable alternative water supply strategies.

Requires Notification to TCEQ- Initiate mandatory water use restrictions as follows:

Prohibit hosing of paved areas, buildings, or windows. (Pressure washing of impervious surfaces is allowed)

Prohibit operation of all ornamental fountains or other amenity impoundments to the extent they use treated water.

Prohibit washing or rinsing of vehicles by hose except with a hose end cutoff nozzle.

Prohibit using water in such a manner as to allow runoff or other waste.

Requires Notification to TCEQ- Limit landscape watering with sprinklers or irrigation systems at each service address to once every seven days. Exceptions are as follows:

Foundations, new landscaping, new plantings (first year) of shrubs, and trees may be watered for up to 2 hours on any day by a hand held hose, a soaker hose, or a dedicated zone using a drip irrigation system.

Golf courses may water greens and tee boxes without restrictions.

Public athletic fields used for competition may be watered twice per week.

Locations using other sources of water supply for irrigation may irrigate without restrictions.

Registered and properly functioning ET/Smart irrigation systems and drip irrigation systems may irrigate without restrictions.

Requires Notification to TCEQ- Limit landscape watering with sprinklers or irrigation systems between November 1 and March 31 to one every two weeks. An exception is allowed for landscape associated with new construction that may be watered as necessary for 30 days from the date of the certificate of occupancy, temporary certificate of occupancy, or certificate of completion.

Requires Notification to TCEQ- Prohibit hydro seeding, hydro mulching, and sprigging.

Requires Notification to TCEQ- Existing swimming pools may not be drained and refilled (except to replace normal water loss).

Requires Notification to TCEQ- Initiate a rate surcharge as requested by NTMWD.

Requires Notification to TCEQ- Initiate a rate surcharge for all water use over a certain level.

Requires Notification to TCEQ- If NTMWD has imposed a reduction in water available to Member Cities and Customers, impose the same percent reduction on wholesale customers.

Requires Notification to TCEQ- Prohibit watering of golf courses using treated water, except as needed to keep greens and tee boxes alive.

Stage 4

Initiation and Termination Conditions for Stage 4

The NTMWD has initiated Stage 4, which may be initiated due to one or more of the following:
The NTMWD Executive Director, with the concurrence of the NTMWD Board of Directors, find that conditions warrant the declaration of Stage 4.
Water demand is projected to approach or exceed the limit of the permitted supply.
The storage in Lavon Lake is less than 35% of the total conservation pool capacity.
NTMWD's storage in Jim Chapman Lake is less than 35% of NTMWD's total conservation pool capacity.
The Sabine River Authority has indicated that its Upper Basin water supplies used by NTMWD (Lake Tawakoni and/or Lake Fork) are in a Severe drought or Emergency.
The supply from Lake Texoma, the East Fork Raw Water Supply Project, or some other NTMWD source has become severely limited in availability.
NTMWD water demand exceeds the amount that can be delivered to customers.
NTMWD water demand for all or part of the delivery system seriously exceeds delivery capacity because the delivery capacity is inadequate.
NTMWD's supply source becomes contaminated.
NTMWD's water supply system is unable to deliver water due to the failure or damage of major water system components.
Supplier's water demand exceeds the amount that can be delivered to customers.
Supplier's water demand for all or part of the delivery system seriously exceeds delivery capacity because the delivery capacity is inadequate.
Supply source becomes contaminated.
Supplier's water supply system is unable to deliver water due to the failure or damage of major water system components.
Supplier's individual plan may be implemented if other criteria dictate.

Stage 4 may terminate when NTMWD terminated its Stage 4 condition or when the circumstances that caused the initiation of Stage 4 no longer prevail.

Goals for Use Reduction and Actions Available under Stage 4

The goal for water use reduction under Stage 4 is a reduction of whatever amount is necessary in the amount of water obtained from NTMWD. If circumstances warrant or if required by NTMWD, the General Manager, or Board of Directors can set a goal for a greater water use reduction.

The General Manager or Board of Directors must implement any action(s) required by NTMWD. In addition, the General Manager or Board of Directors may order the implementation of any of the actions listed below, as deemed necessary. Measures described as "requires notification to TCEQ" impose mandatory requirements on member cities and customers. The supplier must notify TCEQ and NTMWD within five business days if these measures are implemented.

Continue or initiate any actions available under Stage 1,2, and 3.

Notify wholesale customers of actions being taken and request them to implement similar procedures.

Implement viable alternative water supply strategies.

Requires Notification to TCEQ- Prohibit the irrigation of new landscaping using treated water.

Requires Notification to TCEQ- Prohibit washing of vehicles except as necessary for health, sanitation, or safety reasons.

Requires Notification to TCEQ- Prohibit commercial and residential landscape watering, except that foundations and trees may be watered for 2 hours on any day with a hand-held hose, a soaker hose, or a dedicated zone using a drip irrigation system. ET/Smart controllers and drip irrigation systems are not exempt from this requirement.

Requires Notification to TCEQ- Prohibit golf course watering with treated water except for greens and tee boxes.

Requires Notification to TCEQ- Prohibit the permitting of private pools. Pools already permitted may be completed and filled with water. Existing private and public pools may add water to maintain pool levels but may not be drained and refilled.

Requires Notification to TCEQ- Require all commercial water users to reduce water usage by a percentage established by the General Manager or Board of Directors.

Requires Notification to TCEQ- If NTMWD has imposed a reduction in water available to Member Cities or Customers, impose the same percent reduction on wholesale customers.

Requires Notification to TCEQ- Initiate a rate surcharge for all water use over normal rates for all water use.

2.1 Procedures for Granting Variances to the Plan

The General Manager or Board of Directors may grant temporary variances for existing water uses otherwise prohibited under this drought contingency and water emergency response plan if one or more of the following conditions are met:

Failure to grant such a variance would cause an emergency condition adversely affecting health, sanitation, or fire safety for the public or the person or entity requesting the variance.

Compliance with this plan cannot be accomplished due to technical or other limitations.

Alternative methods that achieve the same level of reduction in water use can be implemented.

Variances shall be granted or denied at the discretion of the General Manager or Board of Directors. All petitions for variances should be in writing and should include the following information:

Name and address of the petitioners

Purpose of the water use

Specific provisions from which the relief is requested

Detailed statement of the adverse effect of the provision from which relief is requested

Description of the relief requested

Period of time for which the variance is sought

Alternative measures that will be taken to reduce water use

Other pertinent information

2.2 Procedures for enforcing Mandatory Water Use Restrictions

Mandatory water use restrictions may be imposed in Stage 2, 3, and 4 Drought contingency and water emergency response stages. The Penalties associated with the mandatory water use restrictions are as follows:

On the first violation, Members will be given a written warning that they have violated the mandatory water use restriction.

On the second violation and subsequent violations, citations may be issued to Members, with minimum and maximum fines established by the Board of Directors.

After two violations have occurred, MWSC may install a flow restrictor in the line to limit the amount of water that may pass through the meter in a 24-hr period.

After three violations have occurred, MWSC may cut off water service to the customer.

2.3 Coordination with the Regional water planning group and NTMWD

MWSC will send a copy of this plan to NTMWD.

2.4 Review and Update of Drought Contingency Plan

As required by TCEQ rules, MWSC will review this drought contingency plan every five years. The plan will be updated as appropriate based on new or updated information.

