June 24, 2021

Mrs. Lynda Ozan
Deputy State Historic Preservation Officer
Oklahoma State Historic Preservation Office
Oklahoma Historical Society
800 Nazih Zuhdi Drive
Oklahoma City, Oklahoma 73105

Dr. Kary L. Stackelbeck
University of Oklahoma
Oklahoma Archeological Survey
Room 102, 111 Chesapeake Street
Norman, Oklahoma 73019-5111

RE: Section 106 Review Consultation, FEMA-4438-DR-OK
Public Assistance Project: PA-06-OK-4438-PW-01120(0)_GM-129216
City of Muskogee Water Plant Buildings
State Highway 251A, Fort Gibson, OK 74434 (35.86834, -95.23447)
Section 13 & 18, T16N, R19E and R20E, Fort Gibson Dam, Indian Meridian

Dear All:

The Federal Emergency Management Agency (FEMA) will be providing funds authorized under the Robert T. Stafford Disaster Relief and Emergency Assistance Act, P.L. 93-288, as amended, in response to the major Disaster Declaration for FEMA-DR-4438-OK, Severe Storms, Straight-line Winds, Tornadoes, and Flooding dated June 1, 2019. FEMA is initiating Section 106 review for the above referenced properties in accordance with the Programmatic Agreement between FEMA, the Oklahoma State Historic Preservation Officer (SHPO), the Oklahoma Archeological Survey (OAS), and the Oklahoma Department of Emergency Management (OEM) dated March 10, 2015.

It is proposed that federal funding through FEMA’s Public Assistance Program (PA) be provided to the City of Muskogee (Applicant) for the removal, relocation, and instillation of the Motor Control Center and Control Panel from the Raw Water Pump Station to the Chemical Feed Building of the City of Muskogee’s Fort Gibson water plant. The Applicant intends to demolish the interior electrical room and its components, rehab and replace various already existing pumps, remove the existing East elevation double door and replace it with a roll-up door, install Whipps Stop Log plates, remove the East elevation single span door and install Whipps Stop Log plates, construct a concrete column and base for the stop
logs, widen the sidewalk, repair point and tuck masonry throughout the entire brick veneer exterior, as well as, prep and paint the lower exterior concrete surface (figures 9-12). The Applicant intends to remove the existing generator and its associated electrical components from the northeast section of the crossarm of the T-shaped Chemical Feed building and install a new generator and new motor controllers for raw water pumps and its associated internal and external electrical components that were once housed in the lower elevated Raw Water Pump Building. The Applicant also intends remove the window air conditioning system and close the opening with masonry to match the existing brick veneer (figures 12 & 13) (Undertaking).

FEMA has determined that the Area of Potential Effects (APE) for the proposed Undertaking is limited to the boundaries of the City of Muskogee Water Plant facility, a slightly irregular rectangle in a North to South orientation that is bound by vegetation on the West side and delineated by a fence circumventing the two buildings and their associated external utilities, and was based on the scale and nature of the Undertaking. Equipment would be staged in the parking lot located to the West of the facilities at the South end of the complex.

During the incident period, between May 7, and June 9, 2019, surface flooding inundated the Raw Water Pump Station located on the southeast side of the Fort Gibson Dam at State Highway 251A, Fort Gibson, Oklahoma. Rising floodwaters overwhelmed the banks of the Neosho River flooding the Raw Water Pump Station with up to approximately 5-6 feet (FT) of water, causing irreparable damage to two pump motor controls, the air conditioner and breaker systems, control and monitoring surfaces, various electronics, and space heaters, as well as, staining to floors, walls, and other interior elements including doors and cabinetry.

Constructed sometime after 1980, the Raw Water Pump Station is located between the Fort Gibson Dam and the Chemical Feed Building. The small concrete and brick building is situated at the north end in a west to east orientation, is rectangular in plan, with no defining architectural features (Photograph 1).

Originally constructed in 1953, the Chemical Feed building is located south of the Raw Water Pump Station at a slightly higher elevation on the southwest side of the Fort Gibson Dam. The Chemical Feed building is a single-story, T-shaped plan building with a pour in place concrete painted white base topped by unpainted brick veneer CMU walls, and a flat concrete roof. The windows of the building are all six-pane fixed in place windows with concrete sills and the doors are all wooden doors that have been painted blue. The main (East) elevation faces the Neosho River and is characterized by four of the 6-pane windows located directly south of one of the two single wooden doors and separated by one central downspout. Two other downspouts flank the second door, located on the East end of the T cross arm, and a small awning covers the main entrance North of the windows. The North elevation features two of the 6-pane windows, one of which holds an air conditioning unit, and two downspouts. The West elevation is characterized by one of the 6-pane windows on the West end of the T cross arm and five of those same windows on the stem of the T. This elevation is differentiated by the signage directly above the windows. The Southern elevation is dominated by a two-door entry way located at the bottom of the T-shaped building. The southern facing side of the East portion of the T-shaped building has a single 6-pane window just right of a wooden door that mirrors the door on the connected East elevation. The West portion of the T-shaped building is characterized by a large roll-up garage door of a loading dock. (photographs 2-6).
The City of Muskogee Water Plant complex is located on the west back of the Neosho River south of the Fort Gibson Dam. The significance of the area is centered around the Fort Gibson Dam on the Neosho River. Construction began on the Fort Gibson gravity Dam in 1942 following the authorization of the Flood Control Act of 1941. Construction was put on hold during World War II and recommenced in 1946. The Dam itself was completed in 1949 with the last of the four power plants being completed in 1953. In 1954 the City of Muskogee added at least one facility for their city’s water plant on the opposite bank of the dam’s generators and substation. The City of Muskogee Water Plant was not and is not associated with the Fort Gibson Dam nor does it mimic the style or architecture of the dam itself or its associated buildings. The Fort Gibson Dam and associated buildings are completely cast-in-place cement structures that still exemplify the characteristics of that technique and are grey in color. The water plant buildings owned by the City of Muskogee are also cast-in-place, but only the foundation, which is painted white. The rest of the building is constructed of concrete masonry unit (CMU) walls with a sand colored brick veneer.

On June 17, 2021, FEMA Historic Preservation Specialist Kathleen Kuckens performed a cultural records search through a request to the Oklahoma Archaeological Survey (OAS), as well as a search of the National Register of Historic Places (NRHP), the Oklahoma Historic Landmarks Inventory (OLI), historic maps, and aerial photography to identify historic properties within the current APE. The OAS records search revealed no archaeological sites within the APE, however there were five archaeological sites located and five surveys conducted within 1-mile of the APE.

Table 1. Recorded archaeological sites within one mile of the APE.

<table>
<thead>
<tr>
<th>Site #</th>
<th>Site Name</th>
<th>Description</th>
<th>NRHP Status</th>
<th>Location</th>
</tr>
</thead>
<tbody>
<tr>
<td>CK120</td>
<td>Radio Tower Site</td>
<td>Pre-historic debitage</td>
<td>Ineligible</td>
<td>0.66 miles outside APE</td>
</tr>
<tr>
<td>CK212</td>
<td>Ashmore Shelters</td>
<td>Late Pre-historic bluff shelters</td>
<td>Undetermined</td>
<td>0.76 miles outside APE</td>
</tr>
<tr>
<td>CK312</td>
<td>William’s Shelter</td>
<td>Pre-historic rockshelter</td>
<td>Undetermined</td>
<td>0.88 miles outside APE</td>
</tr>
<tr>
<td>WG140</td>
<td>Overlook</td>
<td>Historic trash dump</td>
<td>Undetermined</td>
<td>0.10 miles outside APE</td>
</tr>
<tr>
<td>WG195</td>
<td>Project Site</td>
<td>Pre-historic open habitation</td>
<td>Undetermined</td>
<td>0.50 miles outside APE</td>
</tr>
</tbody>
</table>

Table 2. Recorded Cultural Resource Surveys within one mile of the APE.

<table>
<thead>
<tr>
<th>Survey Title</th>
<th>Date</th>
<th>Description</th>
<th>Location</th>
<th>Result</th>
</tr>
</thead>
<tbody>
<tr>
<td>Fiber optics</td>
<td>06/23/2001</td>
<td>TX-SBC-Hulbert to Okay Line</td>
<td>16N/19E/S13</td>
<td>WG195</td>
</tr>
<tr>
<td>Microwave tower</td>
<td>04/12/1996</td>
<td>Fort Gibson Lake microwave tower</td>
<td>16N/20E/S18</td>
<td>CK120, CK212</td>
</tr>
<tr>
<td>Cell tower</td>
<td>07/23/2004</td>
<td>Simmons Hoop Iron Tower</td>
<td>16N/20E/S18</td>
<td>None</td>
</tr>
<tr>
<td>Communications</td>
<td>unknown</td>
<td>Fiber Optic Trench Fort Gibson</td>
<td>16N/20E/S18</td>
<td>CK120</td>
</tr>
<tr>
<td>Cell tower</td>
<td>08/17/2005</td>
<td>Hoop iron tower</td>
<td>16N/20E/S18</td>
<td>CK120, CK212</td>
</tr>
</tbody>
</table>
FEMA has determined that the Chemical Feed Building is **Not Eligible** for listing in the National Register of Historic Places (NRHP) under Criteria A, B, or C. Current research did not reveal any association with a significant individual or event. The original L-shaped building was a simple utilitarian building with no distinguishing features or a work of a master and did not possess any distinctive characteristics of a style. Furthermore, research revealed through a series of historical aerials that the historic aged Chemical Feed building has transformed in shape over time. The earliest historic aerial dated 1980 (figure 4) illustrates one building on the property that is L-shaped, with a taller and slightly longer section on the North end of the East elevation. By 1995 there are two buildings on site (figure 5), the second one being the Raw Water Pump Station that was flooded by the event. In 2008 the shape of the Chemical Feed Building went from an L-shape into a T-shape with the addition of the loading dock to the West elevation (figure 6), which resulted in loss of integrity in the original design and workmanship. Regardless, the Water Plant is partially located in the A zone of the floodplain and is prone to flooding due to its location on the bank of the Neosho River on the outflow side of the Fort Gibson Dam, as such the buildings have potentially been previously been damaged and repaired over the years. Therefore, the Water Plant building does not retain integrity of original design, materials, and workmanship. As such, the Chemical Feed Building is not eligible for listing in the National Register of Historic Places.

FEMA has determined that the Raw Water Pump Station, constructed sometime after 1980, is not of historic age and does not warrant a Section 106 review. Any ground disturbing activities caused by the construction of the concrete structure for the stop logs and the expansion of the sidewalk would take place in previous disturbed ground caused by the construction of the Fort Gibson Dam (photograph 7).

Based on the available information gathered through this review process and pursuant to Stipulation III.D of the 2015 OK PA, FEMA has determined that the Applicant initiated the Undertaking without willful intent to avoid the requirements of Section 106. Therefore, FEMA requests consultation in accordance with the 2015 OK PA. FEMA has determined that there are **No Historic Properties Affected** as a result of the Undertaking.

We respectfully request concurrence with this determination. Photos showing the project location and inside the building are attached. Your prompt review of this project is greatly appreciated. Should you need additional information please contact Sean Doyle at sean.doyle@fema.dhs.gov or 202-818-0917.

Sincerely,

SEAN M
DOYLE

Sean Doyle
Environmental Historic Preservation Advisor
DR-4438/4453- OK
Figure 1. Location Map – City of Muskogee Water Plant. 3500 Port Pl, Muskogee, Oklahoma 74403 (35.86834, -95.23447). (Source: Google Earth, January 2018).

Figure 2. APE Map of the City of Muskogee Water Plant. 3500 Port Pl, Muskogee, Oklahoma 74403 (35.86834, -95.23447). (Source: Google Earth, January 2018).
Figure 3. 1974 Fort Gibson Dam Quadrangle, Oklahoma 7.5-Minute Series Topographic Map showing the APE of the City of Muskogee Water Plant. 3500 Port Pl, Muskogee, Oklahoma 74403 (35.86834, -95.23447). (Source: USGS 1974)

Photograph 2. Oblique view of the north elevation of the Chemical Feed Building, 3500 Port Pl, Muskogee, Oklahoma 74403, East facing. Photo provided by Carl Statton, June 2021.

Photograph 3. East elevation of the Chemical Feed Building, 3500 Port Pl, Muskogee, Oklahoma 74403, West facing. Photo provided by Carl Statton, June 2021.
Photograph 4. Oblique view of the South and East elevation of the Chemical Feed Building, 3500 Port Pl, Muskogee, Oklahoma 74403, West facing. Photo provided by Carl Statton, June 2021.

Photograph 5. South elevation of the Chemical Feed Building, 3500 Port Pl, Muskogee, Oklahoma 74403, North facing. Photo provided by Carl Statton, June 2021.
Photograph 6. Oblique view of the West and South elevation of the Chemical Feed Building, 3500 Port Pl, Muskogee, Oklahoma 74403, North facing. Photo provided by Carl Statton, June 2021.

Figure 4. 1980 historical aerial of the City of Muskogee’s Chemical Feed Building. 3500 Port Pl, Muskogee, Oklahoma 74403 (35.86834, -95.23447). (Source: HistoricalAerials.com).
Figure 5. 1995 historical aerial of the City of Muskogee’s Chemical Feed Building. 3500 Port Pl, Muskogee, Oklahoma 74403 (35.86834, -95.23447). (Source: HistoricalAerials.com).

Figure 6. 2008 historical aerial of the City of Muskogee’s Chemical Feed Building. 3500 Port Pl, Muskogee, Oklahoma 74403 (35.86834, -95.23447). (Source: HistoricalAerials.com).

Figure 7. The project is partially located within an “A” zone, area of 100-yr flooding, per Flood Insurance Rate Map (FIRM) panel number 40145C0525H, dated 04/17/2012.
Figure 8. 2019 floodwaters at the edge of the City of Muskogee Water Plant buildings. 3500 Port Pl, Muskogee, Oklahoma 74403 (35.86834, -95.23447). (Source: Google Earth, May 2019).

Figure 9. Plans: Raw Water Pump Station Rehabilitation, Muskogee Municipal Authority, Muskogee, Oklahoma. Project #19MUSKRAWPS. Prepared by Holloway, Updike & Bellen, Inc. 2020
Figure 10. Plans: Raw Water Pump Station Rehabilitation, Muskogee Municipal Authority, Muskogee, Oklahoma. Project #19MUSKRAWPS. Prepared by Holloway, Updike & Bellen, Inc. 2020

Figure 11. Plans: Raw Water Pump Station Rehabilitation, Muskogee Municipal Authority, Muskogee, Oklahoma. Project #19MUSKRAWPS. Prepared by Holloway, Updike & Bellen, Inc. 2020
Figure 12. Plans: Raw Water Pump Station Rehabilitation, Muskogee Municipal Authority, Muskogee, Oklahoma. Project #19MUSKRAWPS. Prepared by Holloway, Updike & Bellen, Inc. 2020

Figure 13. Plans: Raw Water Pump Station Rehabilitation, Muskogee Municipal Authority, Muskogee, Oklahoma. Project #19MUSKRAWPS. Prepared by Holloway, Updike & Bellen, Inc. 2020