

June 15, 2022

Ellen Hilbig, Utilities Director Town of Johnstown 450 S. Parish Ave. PO Box 609 Johnstown, CO 80534

Subject: UPDATED Site Location Approval No. 4689 Town of Johnstown, Low Point WWTF Expansion Colorado Discharge Permit System (CDPS) No. CO0047058 Larimer, County ES Project No. ES.20.SA.05539, Enforcement Order No. DO-200123-2

Dear Ellen Hilbig:

This updated approval supersedes the previously issued version, dated May 26, 2022. The update revises an incorrect reference to treatment process. The ultimate intent is to convert the existing SBR process to a 5-stage Bardenpho Membrane Biological Reactor (MBR). Although this approval is to convert the SBR to a Membrane Bio-Reactor (MBR) in an Anaerobic, Anoxic, Aerobic (A2O) configuration to meet current permitted effluent limits. Any process changes to create a 5-stage Bardenpho will require site location and process design approval. The updated site location approval has been corrected to reflect the proposed design process.

The Water Quality Control Division (Division) has received and reviewed the site location application for the expansion and upgrade of the sequential batch reactor (SBR) treatment to an A2O Membrane Biological Reactor (MBR). The current hydraulic and organic capacity ratings for the facility are 0.5 million gallons per day (MGD) and 1,000 lbs. BOD_5/day respectively. Site location approval number #4689 was issued for the existing facility September 5, 2003. The facility is located as follows: The NW 1/4 of the SW 1/4 of Section 24, Township 5N, Range 68W, Larimer County. The facility will continue to discharge to the existing outfall at the Big Thompson River Segment COSPBT05.

The site location application has been found to be in conformance with the Water Quality Control Commission's *Site Location and Design Regulations for Domestic Wastewater Treatment Works*, 5 *CCR* 1002-22 (Regulation 22) and is approved. This site location approval addresses the following summary of the proposed design:

1. Based upon application information, the system design will be as follows:

Maximum Month Average Daily Flow Capacity - 1.5 MGD. Peak Hourly Flow Capacity - 4.69 MGD. Organic Loading Capacity (max. month average) - 4,880 lbs. BOD₅/day.

This approval also addresses the following facility modifications/improvements:

- New influent wetwell and pump station.
- New headworks building with drum screens and vortex grit washer.
- Influent equalization converted from existing influent wetwell.
- Anaerobic, Anoxic, Aerobic (A2O) MBR installed in existing two train SBR basin configuration.
- Install third A2O treatment train.
- New UV Disinfection.
- New aerated sludge holding with new blowers.
- New screw Press or volute dewatering installed in existing headworks building.
- Decommissioning and removal of the following processes:



- Headworks equipment.
- SBR equipment.
- Chlorination / dechlorination equipment.
- 2. All conditions of the original site location application #4689 apply except as modified in this approval.

This site location approval does not constitute design approval for construction. In accordance with Regulation 22, Section 22.13(1), in addition to approval of the site location application the applicant must obtain approval of the design of the treatment works from the Division prior to beginning construction.

This site location approval will expire on November 26, 2023. If construction has not commenced by this date, the approval will expire and a new application for site location approval may be required. Construction is defined as entering into a contract for, or for in-house work forces, initiation of any action towards the erection or physical placement of materials, equipment, piping, earthwork or buildings which are to be a part of a domestic wastewater treatment works.

In accordance with Regulation 22, Section 22.4(12), this site location approval is subject to appeal pursuant to the State Administrative Procedures Act.

This approval does not relieve the owner from compliance with all local, state, and federal regulations prior to construction nor from responsibility for proper engineering, construction and operation of the facility.

The following performance requirements must be completed before proceeding to construction and subsequent operation of the facility:

- 1. Division approval of process, and final design or self-certification of the design for the facility based upon the Preliminary Effluent Limits (PELs) that were issued to Aqua Engineering on behalf of the Town of Johnstown on December 18, 2020. Changes to the PELs during design and/or construction may require submittal of a request to amend this approval or submittal of a revised site location application package.
- 2. Prior to commencement of discharge from the facility, a CDPS discharge permit or permit amendment may be required. Please contact the Permits Section to find out if a new permit or a permit amendment is required as a result of this project. The discharge permit includes the final conditions and discharge limitations that are specific to the facility. Application for a new or amended individual discharge permit must be made at least 180 days prior to the planned date that discharge will commence. Please refer to the Division's Permit Section web page for specific information about the permitting application process. The web page is available at the following link:

http://www.cdphe.state.co.us/wq/PermitsUnit/index.html

The Engineering Section is interested in gaining feedback about your experience during the engineering review process. We would appreciate your time to complete a Quality-of-Service Survey regarding your experience during the engineering review process leading up to issuance of this decision letter. The Engineering Section will use your responses and comments to identify strengths, target areas for improvement, and evaluate process improvements to better serve your needs. Please take a moment to fill out our survey.

If you should have any questions please contact Anthony Kerr by phone at 720-383-7291 or by electronic mail at anthony.kerr@state.co.us.

Ellen Hilbig, Town of Johnstown Low Point WWTF Expansion SA # ES.20.SA.05539

Sincerely,

Bret lcenogle Digitally signed by Bret Icenogle Date: 2022.06.15 18:03:48 -06'00'

Bret Icenogle, P.E. Engineering Section Manager Water Quality Control Division Colorado Department of Public Health and Environment

cc: Craig Matsuda, Aqua Engineering Mark Thomas, Manager North Front Range Water Quality Planning Association Doug Camrud, WQCD ES Engineering Review Unit, Unit Manager Aly Ulibarri, WQCD Clean Water Enforcement Unit Discharge Permit File CO0047058