

To the Secretary!

7/11/23 BOD Report

Lakas & Rivas Contracting, Inc. completed the first dive inspection on May 9, 2023 as reported at the June meeting. They returned on June 27, 2023 and completed an inspection of the internal space of the dewatering tower.

The report of inspection findings is as follows:

#3 Inspection Findings: ~~★~~ Attached

2 pages attached from
the Report

Bottom line: Dam dewatering tower is in good shape for its age. It should be considered to complete the preventive maintenance on the highest (7'±) inlet gate (including complete removal & replacement) as well as adjusting or replacing the 36" ϕ inlet gate gate guides on the inside of the tower.

Neither are critical but should be considered for later in 2023 or early in 2024 at a cost of \$100,000 to \$100,000. Funds are available in the dam & lake fund.

~~Outland dive camera with LED light was used to make a recording of the inspection.~~

~~Safety: Access to site was coordinated with and was in the presence of a Sunset Lake Association member.~~

3. Inspection Findings

☆ 1 of 2

The general condition of the interior concrete surfaces of the structure are good with no significant signs of spalling, cracking or decay. No water could be seen infiltrating the structure through the concrete surfaces.

The middle exterior mounted intake valve (10") appeared to be leaking slightly, but due to lack of access to the valve it is undetermined if the valve itself is not completely closed or if there is leakage around the thimble. The leakage is estimated at less than one gallon per minute.

The ladder to the bottom of the structure was in good condition with some rust and section loss but nothing significant and is still safe for limited access to the bottom of the structure.

There still was approximately 2-3" to 2-4" of water in the bottom of the structure although both the 10" and 36" emptying valves were open

★ 20f2

The interior mounted 36" gate intake valve was leaking from the upper left corner as you are looking at the valve from the structure interior. The leak appeared to be from the upper left gate wedge being out of adjustment. The leakage from this is estimated to be in the 3 – 5 gallon per minute range. No section loss or damage to the valve stem, couplings or guides was noted. Although the volume of water being lost is insignificant, the amount of spray in the confines of the structure bottom limited visibility of some portions of the interior.

The 36" discharge valve was open approximately 10" during the inspection. Although covered with the expected marine growth and debris, the valve appears in good and serviceable condition. The stem, couplings and guides seem to be in good condition. Valve appears to be bolted into a thimble flange that is flush with the interior wall face. The valve was closed during the inspection, and it operated smoothly for the full transition from open to closed.

The 10" discharge valve was in what appeared to be fully open during the inspection. It also was covered with the expected marine growth and debris but was intact and was in good condition. There does appear to be noticeable section loss in the operating shaft above some of the shaft guides. Shaft guides seem intact and fully anchored. The valve was closed during the inspection, and it operated smoothly for the full transition from open to closed. This valve also appears to be bolted to a thimble flange that is flush with the interior wall face.

This survey represents the overt and unbiased opinion of this diver and dive supervisor, but in no way is to be construed as a guarantee or warranty. This report is for the purpose of information and record only and is made without prejudice to any persons or principals concerned.

The dive crew is independent with no affiliation with any known interested party. All opinions are those of Lakes & Rivers Contracting and no implied opinion is made for items not covered within this report. This survey is not a structural analysis.