

CR 207 Bridge replacement over Choccolocco Creek



Pictures of the previous bridge on CR 207 over Choccolocco Creek in 2017

Report date February 15, 2019

The bridge replacement in Talladega County on County Road 207 is a project that was let to contract by the Alabama Department of Transportation as part of the Alabama Transportation Rehabilitation and Improvement Program (ATRIP). It is a \$5,720,027.00 project to replace the substandard bridge that was on CR 207. The previous bridge on the site was built before the lake was backed up in 1964. It was restricted to 3 Tons, which is not suitable to safely and legally carry a school bus or fire truck. The ATRIP program allowed counties to choose qualified projects, then follow Federal & State Guidelines, to design, let, and build the projects. A portion of the project is funded with Federal funds under the ATRIP program.

As a part of the ATRIP process, Federal wage rate and minority requirements must be met, bid & advertising laws must be followed, construction must adhere to Department of Transportation specifications, and materials must be approved and tested during the process. There are strict guidelines that govern every step of the development and construction of the project. During the construction process, the funding is set aside by the Alabama Department of Transportation for the work, and estimates are processed each month to pay the contractor. The funds remain in accounts controlled by the DOT, and the contractor is paid directly from the set aside funds. The County has no access to these funds and issues no checks of construction of the project.

Talladega County had to provide a local match of 20% to fund the project to the Department of Transportation when the project was let to contract. The County issued a check to the

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Department of Transportation for that amount. As with any State and Federal project, the work is verified by placement & test reports, and all work is subject to review and audit at any time. Talladega County is responsible for the construction inspection of the project to ensure that all guidelines are followed as required by ATRIP. So, as stated, the Talladega County Commission has obligated the funding and made the commitment to build the project as required by the ATRIP Program. Due to questions surrounding various aspects of the project funding and payment in the past, any future concerns should be directed to the Talladega County Engineer's Office at 256-761-2130. The Talladega County Engineer's Office is responsible for overseeing the project on a daily basis for the Commission, and is best suited to answer any questions.

The project was initiated approximately 15 years ago in a previous bridge building program, but funding was not sufficient to allow the project to be constructed. Therefore, the work done in that program on the bridge plans was used in the current ATRIP Program. As with most roads, utilities were present along the right of way. So, during the plan and development process, in order for the project to be built, the utilities had to be relocated. A gas line relocation project for approximately \$1,300,000 was performed from the Fall of 2015 to Spring of 2016 to relocate a 10" gas line. Additionally, work was done to move power lines that interfered with the construction of the bridge from August to September of 2017.

Work on the replacement of the bridge for the ATRIP Project started November 1, 2017. All of the bridge deck had to be demolished, as the first step. Then all steel rebar from the bridge deck and existing piles had to be removed or pulled up, to ensure boater safety. The removal of the bridge, construction of the ramp for barge launching, and barge/crane setup took approximately 6 months. Any bridge construction over water, such as a lake or large river, takes more setup time than construction over another road or railroad due to the logistics involved with the cranes and barges.



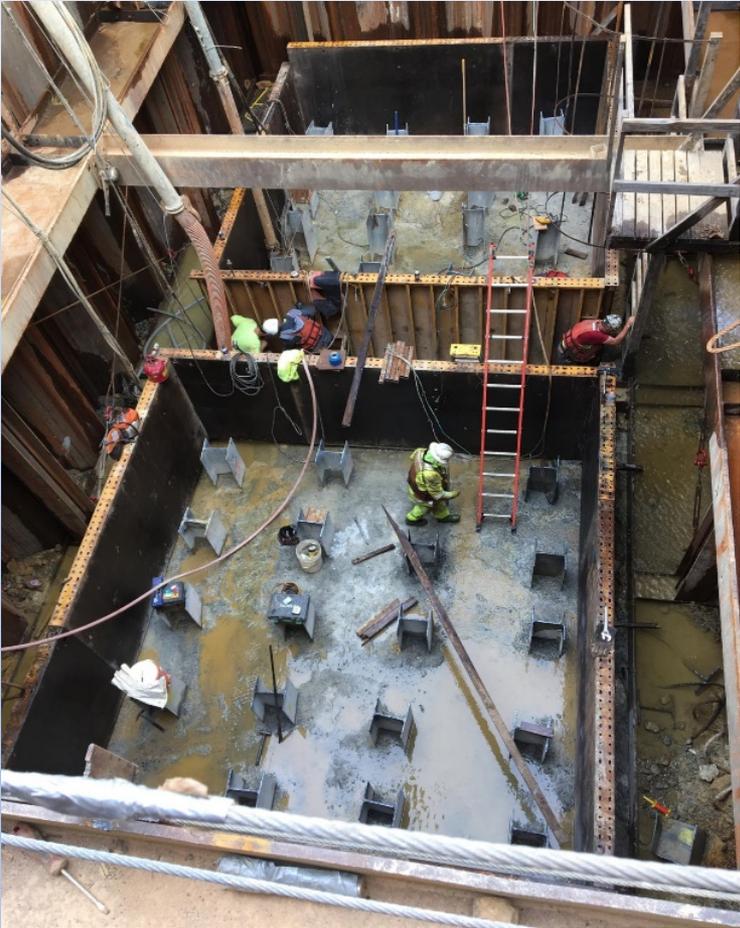
The new bridge consists of three spans, with an approximate length of 157 ft each. The two middle supports for the bridge consist of a concrete footing that is sunk approximately 28 feet below the bed of the lake, so the contractor has to set up interlocking sheet piles, and drive each one to a depth of at least 60 feet below the water surface, to construct a “box” to work within. The coffer dam (box) is approximately 51 ft wide and 28 ft long. After the coffer dam is constructed, all material is removed to the depth of 28 feet below the bottom of the lake. Then a grid is set up to ensure the proper location, and 40 piles are driven to help support the large footing and ensure that it rest on a solid foundation for each footing.

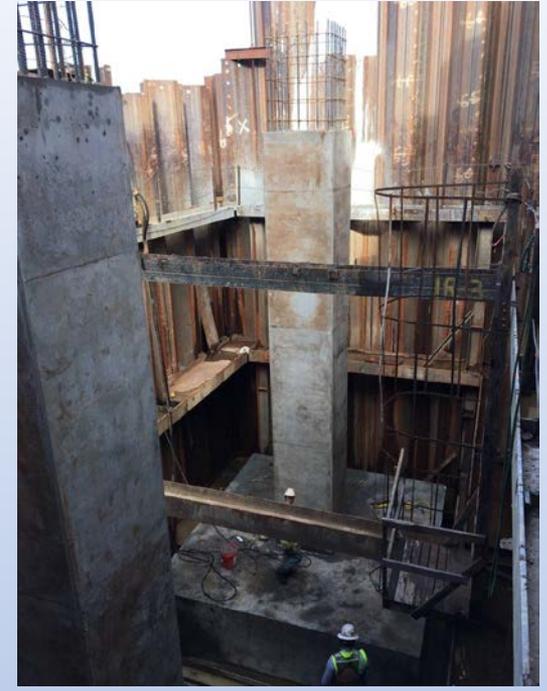
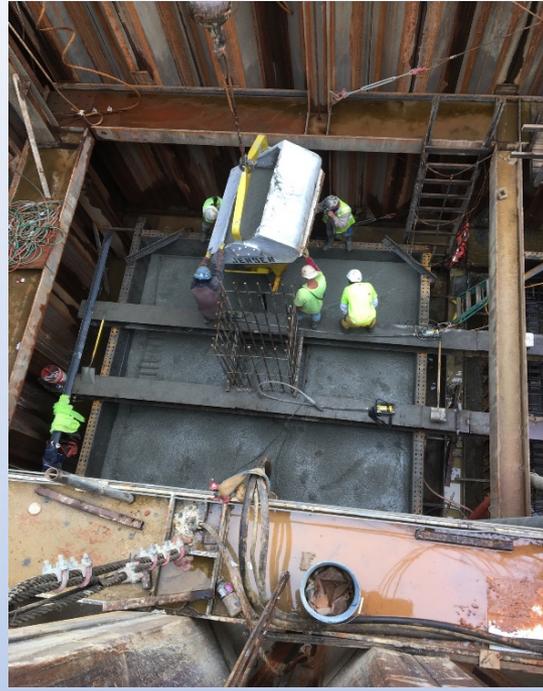




The concrete poured inside the coffer dam is approximately 900 cubic yards, which is around 100 truckloads of concrete for each footing. The driving of the coffer dam sheets & bridge piles, digging of the footing, and placing of the concrete all require a lot of time due to the method of construction. But this method of construction is necessary due to the many voids, sinkholes, and inconsistencies in the subsurface geology. This type geology exists all over Talladega County and presents challenges in many types of construction.

Often there doesn't appear to be any work taking place if someone looks from the bank of the lake for a few seconds, but there is extensive work going on inside the coffer dam as shown by the following pictures:





Jensen Construction is the prime contractor building the bridge on CR 207. They are a very efficient and professional company, who has built enormous bridge projects all over the central part of the United States. They presently have three cranes and two crews working on the project. They are working as fast as possible to complete the job, but wind and rain hamper their ability to work with the crane occasionally. There was a slight delay in driving the sheet piles for the coffer dam for the first bent they worked on, but it was due to the previously mentioned geology, and is not anyone's fault. They were allowed 250 working days to complete the project in the contract. Working days are charged every day the weather permits work. The beams for the first span should be placed in April, and work can then begin on the bridge deck. Hopefully, the bridge will be completed between Labor Day and Thanksgiving, as long as the weather and subcontractor scheduling doesn't cause any delays.

Due to limited ATRIP funds, Talladega County will perform the dirt work “in house” that is required to raise the road bed approximately 4 feet. The higher road bed is needed due to the taller concrete beams on the new bridge compared to what was there previously. The four foot rise will allow boat traffic to continue to go under the bridge as in the past. The work will be done as quickly as possible, but the cranes, supplies, and tools will all have to be removed out of the way before the new roadbed can be constructed.



This lengthy update has been done to hopefully clear up some of the misunderstandings and bad information that seems to be circulating. The previous bridge was at the end of its life cycle, and would have been closed in 2018 due to safety concerns, whether or not there was a construction project to replace it. Pictures at the beginning of this update confirm that the load capacity of the previous bridge was very low, and it was “on its last leg.”

The \$5,720,027.00 project is one of the biggest bridge projects in the state that was done in the ATRIP program. Bridge projects of this size take time, and as stated earlier, due to being over a body of water there are more safety and logistical steps in the process. There is simply more time required to perform work and move cranes, barges, and other equipment, compared to bridge projects over small creeks, roads, or railroads. As stated earlier, there are also many rules, regulations, and requirements that must be followed to ensure a quality job for the traveling public. Your patience and understanding for the duration of the project would be appreciated.

The Talladega County Commission and the Engineer's Office have gone to great lengths over many years to get the project funded, designed, and let to contract. Once again, you are reminded to direct any questions concerning the project to the Talladega County Engineer's Office at 256-761-2130. Once construction is completed, the bridge will be a tremendous asset to the area for many years to come.