

EXHIBIT C
CONSTRUCTION HISTORY AND SCHEDULE

FINAL

**ALABAMA POWER COMPANY
COOSA RIVER PROJECT
FERC NO. 2146**

**APPLICATION FOR NEW LICENSE
FOR MAJOR WATER POWER PROJECT - EXISTING DAM**

**EXHIBIT C
CONSTRUCTION HISTORY AND SCHEDULE**

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1.0 INTRODUCTION

Construction of the Coosa River Hydroelectric Project began almost a hundred years ago with the construction of the Lay development in 1910. The 1920's as well as the 1960's were significant periods of growth and construction for the Coosa River Hydroelectric Project. Two of the Project's seven developments were built in the 1920's and four additional developments were constructed in the 1960's. Today the Coosa River Hydroelectric Project includes seven dams and powerhouses, six reservoirs, numerous generators, and associated facilities.

2.0 WEISS DEVELOPMENT

Construction of the Weiss development began in 1958 and was completed when the last powerhouse unit was brought online in 1962.

2.1 Construction History

2.1.1 Original Construction

This section is not applicable because this is not an application for an original license.

2.1.2 Modifications/Additions to Project

No major modifications or additions have been made to the development since its completion in 1962. However, since initial construction of the development was completed, there have been several minor modifications and additions to development facilities. Some of the more recent and significant modifications and additions to development facilities are briefly described below.

In 1990, floodwaters released from the powerhouse's trash gate resulted in measurable erosion to the tailrace's west bank. As a result, heavy riprap was added later that year and in 1991 to repair the flood induced damage. In 1993, drainage improvements were completed downstream of the spillway and in 1998, the trash racks were cleaned and inspected, the emergency generator was replaced, and the spillway gates and structure were repainted.

2.2 Proposed Development

There is no new proposed construction at this development.

3.0 NEELY HENRY DEVELOPMENT

Construction of the Henry development began in 1962 and was completed when the powerhouse units were brought online in 1966.

3.1 Construction History

3.1.1 Original Construction

This section is not applicable because this is not an application for an original license.

3.1.2 Modifications/Additions to Project

No major modifications or additions have been made to the development since its completion in 1966.

One minor modification / addition was made with the placement of riprap downstream of the spillway in 1988 and 1990 to remedy erosion damage.

3.2 Proposed Development

There is no new proposed construction at this development.

4.0 LOGAN MARTIN DEVELOPMENT

Construction of the Logan Martin development began in 1960 and was completed when the powerhouse units were brought online in 1964.

4.1 Construction History

4.1.1 Original Construction

This section is not applicable because this is not an application for an original license.

4.1.2 Modifications/Additions to Project

Several significant modifications have been made to the development since its completion in 1964. In order to address numerous boils and sinkholes that were discovered within the development boundaries shortly after the initial construction was completed, APC has constructed containment weirs and implemented a continuing extensive fill and grouting program. Additionally, a rock fill bolster built against the downstream slope of the river section of the embankment was completed in 1977, and construction of a trench drain and rock fill bolster was completed in 1980 to similarly protect the east floodplain area.

Other recent improvements have included the replacement of trash racks on all three units (1990 and 1991); the construction of a security building and road repairs (1991); the placement of an additional sump pump in the headworks gallery with the upgrading of cranes (1992); the removal of retarding cylinders on the headgates (1993); the pumping of grout under the apron wall below the two main spillway bays nearest the powerhouse to repair an opening that had eroded between the riverbed rock and the base of the wall (1994); and the drilling and grouting of the foundation under the concrete structures (1994).

4.2 Proposed Development

There is no new proposed construction at this development.

5.0 LAY DEVELOPMENT

Construction of the Lay development began in 1910 and was completed when the powerhouse units were brought online in 1914.

5.1 Construction History

5.1.1 Original Construction

This section is not applicable because this is not an application for an original license.

5.1.2 Modifications/Additions to Project

Several major modifications and additions have been made to the development since its completion in 1914. Starting in 1964, APC modified the development to increase power head by 14-ft. This modification included adding mass concrete to the dam crest and downstream faces of the non-overflow and spillway sections. Drains were installed along the interface between the old and new material and at the toe of the old structure. Foundation treatment consisted of cleanup, backfilling of scour holes downstream from the old spillway, consolidation grouting at selected locations, and drilling of drain holes from a gallery located in the new concrete and adjacent to the downstream face of the original structure. The powerhouse was also upgraded by replacing the original generating units with new larger units, sealing existing cracks, and grouting a leaking contraction joint.

5.2 Proposed Development

There is no new proposed construction at this development.

6.0 MITCHELL DEVELOPMENT

Construction of the Mitchell development began in 1921 and was completed when the powerhouse units were brought online in 1923.

6.1 Construction History

6.1.1 Original Construction

This section is not applicable because this is not an application for an original license.

6.1.2 Modifications/Additions to Project

Several major modifications and additions have been made at this development since its completion. A fourth unit in the original powerhouse was placed into service in 1949. In 1985, a second powerhouse containing three additional units was added which replaced the three original units. Also at this time, a new spillway structure was constructed and the remaining gates were rehabilitated.

6.2 Proposed Development

There is no new proposed construction at this development.

7.0 JORDAN-BOULDIN DEVELOPMENTS

Construction of the Jordan development began in 1926 and was completed when the powerhouse units were brought online in 1928.

Construction of the Bouldin development began in 1963 and was completed in 1967.

7.1 Construction History

7.1.1 Original Construction

This section is not applicable because this is not an application for an original license.

7.1.2 Modifications/Additions to Project

In conjunction with construction of the Bouldin development in the 1960's, the normal operating level of Jordan Lake was raised 7 ft to 252 ft msl and eighteen new radial gates were installed across the previously ungated spillway section. Recent work at the Jordan development includes the replacement of the trash racks in 1992 and the installation of window stoplogs on the tailwater side of the powerhouse in 1994.

The Bouldin development experienced extensive seepage and several springs and boils appeared around the development. In order to address these issues a series of relief wells were installed in 1967 to 1968 and a grouting program was conducted from May 1968 to January 1969 to protect tailrace slopes from erosion.

In 1975, the Bouldin Dam earth embankment was breached. Reconstruction of the embankment was completed in 1980 and the construction of an earth fill bolster at the north embankment was completed in late 1984. In 1993, the construction joints of the intake structure were grouted. To facilitate this construction, a cofferdam was constructed in the Bouldin forebay to reduce the drawdown of Jordan Lake during this construction period.

7.2 Proposed Development

There is no new proposed construction at this development.