PLANNING UPDATE

Planning and Economic Development Committee Meeting
November 10, 2011

DEVELOPMENT ACTIVITY

- Continue to See Signs of Increase in Near Future
- Most Activity Related to Commercial Projects
- Several Inquiries Related to Residential Development Focused on Potential Multi-Family Projects

DEVELOPMENT ACTIVITY

Building Permits Issued (through 11/8)

Permit Type	Number	Total Reported Value
New Home Construction	122	40,941,576
Mobile Home Setups	133	1,464,512
Commercial Projects	100	13,156,553

DEVELOPMENT ACTIVITY

Note on Affordability Trends of New Housing-

Average Reported Value of Stick-built:
$40,941,576 ÷122 = $335,586
(Median Value = $228,000; Two homes >$1,000,000 this year)

Average Reported Value of Mobile Homes:
$1,464,512 ÷ 133 = $11,011

AIR QUALITY

- After a series of delays President Obama instructed EPA to cancel move to adopt new ozone standard (.060 - .070 ppm) in early September
- September 22nd EPA announced implementation of 2008 standard (.075ppm)
- October 11th American Lung Assoc. and other groups filed lawsuit over failure to adopt science-based standard

AIR QUALITY

To meet this standard, the 3-year average of the fourth-highest daily maximum 8-hour average ozone levels measured at each monitor within an area each year cannot exceed 0.075 ppm.

Peak 2011 Long Creek monitor readings

June 3rd .072
June 4th .070
August 17 .063
April 19th .061
August 30 .061 } Tied for forth-highest

4th 8hr Averages for Long Creek Monitor: 2000-2011

2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011
.062	.079	.094	.079	.075	.075	.065	.076	.072	.066	.069	.061

AIR QUALITY

UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
WASHINGTON, D.C. 20460

Because we have states' 2009 recommendations and quality assured ozone data for 2008-2010, there is nothing that state or local agencies need to do until we issue the 120-day letters later this year, though of course, states are welcome to contact us to discuss specific issues at any time. We expect to finalize initial area designations for the 2008 ozone NAAQS by mid-2012. However, we note that EPA currently faces litigation with respect to the timing of the designations and expects that the resolution of the litigation may well affect the precise timing of the schedule for designations.

Assistant Administrator

SUBJECT: Implementation of the Ozone National Ambient Air Quality Standard

AIR QUALITY

In spite of EPA implementing 2008 Standard, and regardless of short-term impacts of lawsuit, revisions to standard are scheduled to be taken up again in the fall of 2013, with final changes to be completed in 2014.

STORMWATER

- New EPA Rules Under Consideration, with Final Action by November 2012
- May Require Controls for Existing Buildings as Point Sources, and Change Process of Designation of MS4's (Municipal Separate Storm Sewer Systems)
- Latest Unofficial Information Indicates that No New Designations are Expected Until New Rules in Place

STORMWATER

Overview of Changes Being Considered

- Develop performance standards from newly developed and redeveloped sites to better address stormwater management as projects are built;
- Explore options for expanding the protections of the municipal separate storm sewer systems (MS4) program;
- Evaluate options for establishing and implementing a municipal program to reduce discharges from existing development;
- Evaluate establishing a single set of minimum measures requirements for regulated MS4s. However, industrial requirements may only apply to regulated MS4s serving populations of 100,000 or more;
- Explore options for establishing specific requirements for transportation facilities; and
- Evaluating additional provisions specific to the Chesapeake Bay watershed.

ZONING

- All Complete Rezoning Requests Are In Process
- Anticipate At Least 2 More to be Complete and Ready to Submit in Near Future
- Several Others Known to be in Various Stages of Preparation

ZONING

Status of Requests Currently in Process

Name	Ord. Number	Next Action/Est. Date
1.Keowee Key/Stamp Creek	2011-14	3rd/11-15
2. Neville	2011-18	PH-3rd/12-6
3.Mathis	2011-19	2nd/11-15
4.Moonlight Bay	2011-20	PH-3rd/12-6
5.McClure/N. Return Ch. Road	2011-21	2nd/Dec-Jan
6.Southern Hartwell	2011-22	PH-3rd/12-6
7.Cane Creek	2011-23	PC Rec./Dec
8.Willow Lane	2011-24	2nd/11-15
9.Public Lands	2011-25	2nd/Dec
10.County Industrial Lands	2011-29	PH-3rd/11-15
11.Bayshore	2011-31	2nd/Dec-Jan

PLANNING COMMISSION REVIEW

Commission Continues with Zoning Review

- Review of Districts and Uses is Wrapping Up
- Proceeding with Review Article by Article
- Update of Current Land Use Map- *Staff Work is Complete for Now; Will be Presented to Planning Commission at the End of Review*

KT RELICENSING

KT Project Relicensing Timeline - Overview

FAIR PLAY

Staff Attended Fair Play Community Association Meeting to Listen to Citizens' Desires for the Future of the Village Area

Options for Addressing the Various Issues will be Presented at a Follow-up Meeting in Near Future

QUESTIONS?

Keowee-Toxaway Hydro Project Relicensing
Agreement in Principle

Draft

Work in Progress

Revision Date

August 4, 2011

Keowee-Toxaway Hydro Project Relicensing
Agreement in Principle

Table of Contents

1.0 Introduction

1.1 Purpose of the Agreement in Principle

This Agreement in Principle (AIP) is the non-binding document that includes items of agreement plus items with major stakeholder reservations or dissent that are the conclusions of the cumulative negotiations of the Keowee-Toxaway Relicensing Stakeholder Team (Stakeholder Team). The organizations that have representatives on the Stakeholder Team and that agree in consensus with this document will work together to convert the AIP into a binding Relicensing Agreement (RA). All organizations that have representatives on the Stakeholder Team will be provided the opportunity to sign the binding RA, regardless of whether or not they agree in consensus with this AIP.

1.2 General Facts and Assumptions

1.2.1 Processing Draft AIP

- The most current version of the Stakeholder Team's Charter (see Reference 1: Keowee-Toxaway Hydroelectric Project Relicensing (FERC Project No 2503) Stakeholder Team Charter) governs the discussion of this draft and successive drafts of the AIP.
- Trial balloons, including this AIP, are non-binding and may be withdrawn, in whole or in part, at any time by the party (ies) with implementation responsibility prior to signing the binding RA. Therefore, there is no final agreement on any issue until the binding RA is signed and, even then, only those parties that are signatories to the RA have an agreement and only on the issues covered in the RA.

1.2.2 See Attachment A: Abbreviations and Acronyms, Attachment B: Definitions, and Attachment C: Keowee-Toxaway Project Standard Nomenclature for important basic terms used in this AIP.

1.2.3 The AIP forms a detailed outline for the future binding RA. The AIP is not intended to provide the descriptive legal language, proposed articles for the New License that will eventually be issued by the Federal Energy Regulatory Commission (FERC), or other detailed terms and conditions that will be needed to make the AIP into a contract. The AIP will however identify in general terms the items that the Licensee and the other Stakeholder Team Members could expect to commit to if they become signatory parties to the RA. The AIP will also list by short title the additional legal paragraphs that as a minimum will need to be covered in the RA.

1.2.4 Brief descriptions of the requirements of the current FERC license (referred to as the Existing License) will be included within the Facts and Assumptions portion of each section.

1.2.5 The signed AIP represents the balancing of many stakeholder interests.

1.3 Key Remaining Unknowns

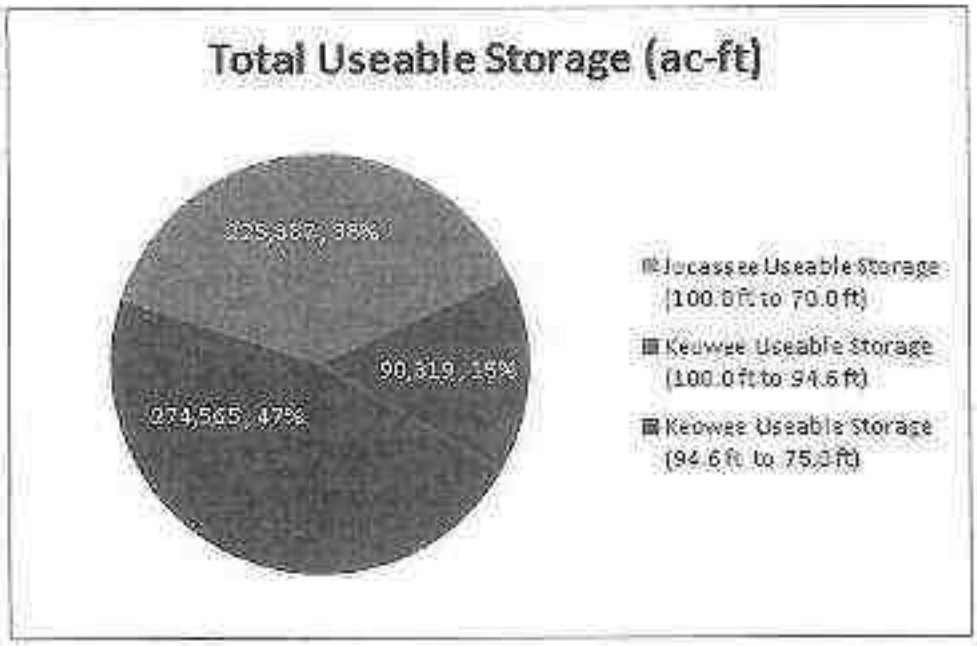
1.3.1 Results of relicensing studies.

1.3.2 Continued refinement of the collective interests and priorities of the Stakeholder Team.

2.0 Normal Operating Ranges for Reservoir Levels

Facts

1. Unless stated otherwise, all elevations listed below are relative to the top of the spillway (including floodgates) with 100.0 ft. (local datum) equal to Full Pond Elevation – 1,110.0 ft above mean sea level (AMSL) for Lake Jocassee and 800.0 ft AMSL for Lake Keowee.
2. The Existing License allows reservoir levels to vary between 100 ft and 75 ft for Lake Keowee with pumping and between 100 ft and 70 ft for Lake Jocassee. There are no target or guide curves required in the Existing License.
3. Jocassee is operated between 100.0 ft and 70.0 ft, and Keowee is typically operated between 100.0 ft and 94.6 ft, which is the operational low level for Oconee Nuclear Station (ONS) operations.
4. The pie chart below shows the Total Useable Storage for each reservoir based on current operational practices.



5. The current critical reservoir elevations for two existing public water supply intakes (Seneca and Greenville Water System), the ONS operating constraint, and boat ramps at Licensee-owned public access areas are shown in Attachment D (Critical Reservoir Elevations) [to be developed]. There are no industrial water intakes on the Keowee-Toxaway Project reservoirs, but the Bad Creek Pumped Storage Project (FERC No. 2740) utilizes Lake Jocassee as its lower reservoir for pumped storage operation. The critical reservoir elevation for the operation of the Bad Creek Pumped Storage Project is xx ft AMSL.

6. Operations at Jocassee Pumped Storage Station and the Bad Creek Project can cause reservoir level fluctuations throughout the day. These daily fluctuations can range up to four feet at Lake Jocassee and up to two feet at Lake Keowee.
7. The Licensee is party to an agreement with the US Army Corps of Engineers (USACE) and the Southeastern Power Administration (SEPA) that attempts to balance water storage between the Project and the USACE's downstream Hartwell and J. Strom Thurmond hydroelectric projects.
8. The Licensee's website (www.duke-energy.com/lakes/levels.asp) provides the following level information for the Project reservoirs: Actual Elevation, Target Elevation, Normal Minimum Elevation, Normal Maximum Elevation, and any special messages appropriate to a current situation. The Actual Elevations are measured at the hydro stations and are updated every 20 minutes. Actual Elevations and any special messages are also available on a toll-free telephone system.

Assumptions

1. Project operations will keep the level for each reservoir between that reservoir's Normal Maximum Elevation and Normal Minimum Elevation unless the Licensee is reacting to or operating in the Low Inflow Protocol (i.e., drought conditions) or Maintenance and Emergency Protocol (MEP).
2. Primary considerations for setting the Normal Minimum Elevations are:
    a. Low enough to allow drawing the reservoir down to some extent when substantial precipitation is expected to reduce spilling;
    b. Low enough to use portions of the reservoirs' storage during relatively dry periods without triggering the LIP frequently;
    c. High enough to ensure that all public water supply and regional power station intakes located on the reservoirs are fully usable; and
    d. High enough to ensure that most of the boat ramps at the Licensee-owned public access areas located on the reservoirs are operational.
3. The Normal Maximum Elevation will be set at the Full Pond Elevations to maximize normal useable storage capability of the reservoirs.

Related Stakeholder Team Member Interests

1. Economic Values
    1.1. Remain cognizant of how all lake levels in the basin impact the local economy. [225] [Spencer, Brown] [Anderson Chamber] [Economic Development] [2]
    1.2. Manage lake levels such that water quality, fish and wildlife habitat, recreation, and economic uses of the lake are maintained or improved. [262] [Tynan, Starker] [Upstate Forever] [Water Quantity] [2]

2. Fish Protection, Spawning

2.1. Stabilize lake levels during spawning season. [61] [Marshall, Vejdani] [SC DNR] [Aquatics] [2]

3. Habitat Maintenance, Improvement (shallow water, littoral)

3.1. Ensure lake levels that maintain shoreline habitat. [110] [Turetzky, Swank] [FOLKS] [Lake Levels] [2]

3.2. Adjust reservoir levels seasonally to optimize aquatic and terrestrial habitats and recreational needs. [37] [Cantrell] [US Fish & Wildlife Service] [2,9]

3.3. Manage lake levels such that water quality, fish and wildlife habitat, recreation, and economic uses of the lake are maintained or improved. [262] [Tynan, Starker] [Upstate Forever] [Water Quantity] [2]

4. Implications on Operations

4.1. Reduce the range of fluctuation around set levels. [109] [Turetzky, Swank] [FOLKS] [Lake Levels] [2]

4.2. Keep lake levels high. [108] [Turetzky, Swank] [FOLKS] [Lake Levels] [2]

4.3. Avoid prolonged low lake levels [303] [Davis, Clark] [NC DENR] [Lake Levels] [2]

4.4. Avoid rapid water level changes [302] [Davis, Clark] [NC DENR] [Lake Levels] [2]

4.5. Maintain system value of hydro stations for peaking, lake level variability, voltage and load support [2] [Lineberger, Huff] [Duke Energy] [2]

4.6. Minimize risks of Project operations on regional thermal power plants. [3] [Lineberger, Huff] [Duke Energy] [2,3]

5. Recreation Opportunities, Quality, or Access

5.1. Maintain sufficient water levels in Lake Jocassee for boaters. [136] [Gaines, Dudley] [SC PRT] [Public Access] [2]

5.2. Adjust reservoir levels seasonally to optimize aquatic and terrestrial habitats and recreational needs. [37] [Cantrell] [US Fish & Wildlife Service] [2,9]

5.3. Manage lake levels such that water quality, fish and wildlife habitat, recreation, and economic uses of the lake are maintained or improved. [262] [Tynan, Starker] [Upstate Forever] [Water Quantity] [2]

6. Water Quality

6.1. Manage lake levels such that water quality, fish and wildlife habitat, recreation, and economic uses of the lake are maintained or improved. [262] [Tynan, Starker] [Upstate Forever] [Water Quantity] [2]

7. Water Supply, Capacity

7.1. Ensure that water supply intake structure is operational. [246] [Bereskin, Eskridge] [Greenville Water System] [Lake Levels] [2]

7.2. Maintain lakes at suitable levels. [245] [Bereskin, Eskridge] [Greenville Water System] [Lake Levels] [2]

8. General or Incidental

8.1. Maintain Normal Operating Ranges for Project reservoirs that balance Project operating flexibility with other stakeholder interests (e.g., recreation, aquatic habitat, aesthetics, etc.) during normal conditions. [7] [Lineberger, Huff] [Duke Energy] [2]

8.2. DPR: Specific concerns include water level management, water quality, and shoreline erosion management. [299] [Davis, Clark] [NC DENR] [Recreation] [2,10,9]

3.0 Actions to Support Water User Needs

Facts

1. Except for Bad Creek and Jocassee Pumped Storage Hydro Stations, there are no water intakes on Lake Jocassee.
2. Two municipal water suppliers (Seneca and Greenville Water System) own and operate water intakes on Lake Keowee.

   City of Seneca (through its municipal water system Seneca Water and Light)

   A 1969 agreement between the Licensee and the City of Seneca permits water withdrawals from Lake Keowee, but there is no water withdrawal amount specified in this agreement. Seneca's existing intake has maximum pumping capacity of 20 Million Gallons per Day (MGD). Seneca's average daily withdrawal for 2010 was 7 MGD.

   Greenville Water System (GWS)

   A 1973 agreement (approved by the FERC in a 1974 order) between the Licensee and GWS currently permits GWS withdrawals of 100 MGD for a maximum day and 60 MGD for an average day. Beginning in 2020, the agreement permits GWS withdrawals of 150 MGD for a maximum day and 90 MGD for an average day. GWS's existing intake has a maximum pumping capacity of 60 MGD. GWS' average daily withdrawal for 2010 was 34 MGD.
3. The Existing License has no requirements for minimum flow from the Project's reservoirs except leakage flow of xx cfs from Keowee Hydro Station into Hartwell Lake.
4. The Licensee is party to an agreement with the US Army Corps of Engineers (USACE) and the Southeastern Power Administration (SEPA) that attempts to balance water storage between the Project and the USACE's downstream Hartwell and J. Strom Thurmond hydroelectric projects. The agreement defines the methodology for calculating cumulative weekly releases from the Keowee development during specified periods of time. (See Section 4.0)
5. ONS has intakes on Lake Keowee that withdraw water for its cooling. The withdrawn water is retuned at a slightly higher temperature which causes higher evaporation rates from Lake Keowee.

Assumptions

1. Additional water intakes will be developed at Lake Keowee during the term of the New License.
2. Water use demand will continue to increase during the New License period.

Related Stakeholder Team Member Interests

1. Economic Values

    1.2. Ensure that the nuclear power facility serves as a stimulus for future economic growth and not as an obstacle. [231] [Spencer, Brown] [Anderson Chamber] [Economic Development] [3]

    1.3. Maintain the adequate quantity of water needed to both serve today's needs, and provide for a prosperous future for the people of Oconee County. [190] [Holbrooks, Gadsby] [Oconee County] [Water quantity] [3]

2. Public Water Supply

    2.2. Ensure that the public's health is not jeopardized by having poor water quality or reduced supplies that reduce consumption or sanitation. [236] [Bereskin, Eskridge] [Greenville Water System] [Water Supply, Water Quality] [3, 10]

    2.3. Protect and maintain water quality and quantity for potable water supplies. [242] [Bereskin, Eskridge] [Greenville Water System] [Water Supply] [3,10]

    2.4. Serve existing and future potable water requirements for citizens of Seneca and Oconee County. [27] [Faires, Martin] [Seneca Light & Water] [Water Supply] [3]

    2.5. Maintain existing Seneca/Duke contract. [28] [Faires, Martin] [Seneca Light & Water] [Water Supply] [3]

    2.6. Ensure adequate supplies for current and future uses within the project basin and throughout the Upstate region. [266] [Tynan, Starker] [Upstate Forever] [Water Quantity] [3]

    2.7. Protect and Improve Water Supplies [272] [Tynan, Starker] [Upstate Forever] [Water Quantity] [3]

3. Natural Resource Protection

    3.2. Balance water resource user needs to protect natural resources within the Keowee-Toxaway Project and Savannah River Basin. [86] [Marshall, Vejdani] [SC DNR] [Water Quantity, Operations] [3]

    3.3. Protect and enhance water quantity and quality in the Savannah River. [41] [Brownell, Mastry] [NOAA NMFS] [3,10]

4. Water Quality

    4.2. Ensure that the public's health is not jeopardized by having poor water quality or reduced supplies that reduce consumption or sanitation. [236] [Bereskin, Eskridge] [Greenville Water System] [Water Supply, Water Quality] [3, 10]

    4.3. Protect and maintain water quality and quantity for potable water supplies. [242] [Bereskin, Eskridge] [Greenville Water System] [Water Supply] [3,10]

5. General or Incidental

5.2. Water Quantity & Supply [121] [Spencer, Brown] [Anderson Chamber] [Water Quantity, Water Supply] [3]

5.3. Improve water resource management. [84] [Marshall, Vejdani] [SC DNR] [Water Quantity, Operations] [3]

5.4. Protect water quantity. [176] [Holbrooks, Gadsby] [Oconee County] [Water Quantity] [3]

6. Information and Methodology

6.2. Base flow release regime decisions on good information. [239] [Bereskin, Eskridge] [Greenville Water System] [Flows] [3,4]

6.3. Ensure that flow releases are based on good science. [249] [Bereskin, Eskridge] [Greenville Water System] [Flows] [3]

6.4. Account for how the operation of Keowee-Toxaway influences other parts of the hydrologic basin. [227] [Spencer, Brown] [Anderson Chamber] [Environment - General] [3]

6.5. We need a good handle on the volume and needs of the basin for future planning with neighboring states that are seeking new water sources. Modeling efforts performed in the KT project can provide a good platform for future work in water resources planning in SC with buy-in from key regulatory agencies. [220] [Spencer, Brown] [Anderson Chamber] [Water Quantity, Water Supply] [3]

6.6. Improve information, plans, and procedures for making equitable water management decisions. [85] [Marshall, Vejdani] [SC DNR] [Water Quantity, Operations] [3,4]

6.7. Consider existing and potential future (e.g., 50-yr look ahead) water demands in water quantity models used to support decision making. [6] [Lineberger, Huff] [Duke Energy] [3]

6.8. Partner with other water users to improve water quantity management. [9] [Lineberger, Huff] [Duke Energy] [3,4]

6.9. Manage releases to meet the needs of and protect downstream uses while balancing upstream needs. [263] [Tynan, Starker] [Upstate Forever] [Water Quantity] [3]

7. Operations

7.2. Maintain the limited water supply to support effective operation of existing and future power generation stations while also supporting other stakeholder interests. [5] [Lineberger, Huff] [Duke Energy] [3]

7.3. Retain substantial long-term operating flexibility for the Keowee-Toxaway Project to support efficient cost-effective electric service to Duke's customers. [1] [Lineberger, Huff] [Duke Energy] [Water Quality] [3]

4.0 Low Inflow Protocol and Water Storage Coordination

Facts

1. The Existing License does not address operation during low inflow conditions.
2. The Existing License required the Licensee to enter into an operating agreement (1968 Agreement) with the US Army Corps of Engineers (USACE) and the Southeastern Power Administration (SEPA). The 1968 Agreement's objective is to equalize the percentage of remaining usable storage between Keowee-Toxaway Project reservoirs and the USACE's Hartwell and J. Strom Thurmond Reservoirs.
3. The 1968 Agreement does not account for water storage effects related to the Oconee Nuclear Station (ONS), the Bad Creek Project, or the USACE's Richard B. Russell Project which were constructed after 1968. Based on Nuclear Regulatory Commission (NRC) requirements imposed since the execution of the 1968 Agreement, ONS cannot operate at the Lake Keowee levels contemplated in the 1968 Agreement during extended drought periods.
4. Since 2009, the Licensee, USACE, and SEPA have been 1) reviewing the 1968 Agreement and its impact on the operation of ONS, the Project, and downstream resources, 2) adapting the HEC-ResSim and CHEOPS water balance models to consider operating alternatives to the 1968 Agreement, and 3) developing a Comprehensive Report that assesses the impacts of revising the 1968 Agreement. The USACE will use the Comprehensive Report as a basis for a Decision Document for revising the 1968 Agreement. The Comprehensive Report is to be finalized by December 31, 2011.
5. The Licensee has undertaken a detailed feasibility study of options to modify certain systems at ONS that would allow some limited additional lake level and water storage flexibility at Lake Keowee.
6. The Keowee-Toxaway Low Inflow Protocol (LIP) is Attachment E of the AIP.

Assumptions

1. The LIP will provide procedures for how the Keowee-Toxaway Hydro Project will be operated by the Licensee and how other water users should respond during periods of low inflow (i.e., periods when there is not enough water flowing into the Project reservoirs to meet the normal needs). The protocol will be developed on the basis that all parties with interests in water quantity will reduce their daily water consumption as needed and therefore share the responsibility of conserving the limited water supply. The LIP will also identify communications channels to help coordinate between water users.
2. The LIP will define several stages of increasingly severe drought conditions each with increasingly demanding water use restrictions for the Licensee and water users. The LIP will define at each stage changes in the Project operations to reduce reservoir storage depletion. The LIP will establish trigger points for moving between the identified stages that

are based both on hydrologic conditions and on the remaining water storage in the reservoir system.

Related Stakeholder Team Member Interests

1. Drought Plan

    1.2. Develop a Low Inflow Protocol for the Project to provide a coordinated response by water users (including those with large water intakes within the Project and the USACE and SEPA) to manage expectations during dry periods. [8] [Lineberger, Huff] [Duke Energy] [4]

    1.3. Ensure that the Duke drought management plan works in conjunction with the USACE's plan at Hartwell, Russell, and Thurmond reservoirs. [229] [Spencer, Brown] [Anderson Chamber] [Flows, Lake Levels] [4]

    1.4. Conserve reservoir levels and protect adequate downstream flow during drought conditions. [87] [Marshall, Vejdani] [SC DNR] [Water Quantity, Operations] [4]

    1.5. DWQ: Develop drought contingency planning that balances aquatic life needs with human needs because hydroelectric dam operation can significantly impact upstream waters during drought situations. [124] [Davis, Clark] [NC DENR] [Water Quantity, Operations] [3]

2. Drought Plan Implementation

    2.2. Improve drought response practices within basin and Upstate region as applicable. [267] [Tynan, Starker] [Upstate Forever] [Water Quantity] [4]

    2.3. Drought restriction observance [290] [Bramlette, Bailey] [USACE] [Water Supply] [4]

3. Water Storage Coordination

    3.2. Storage balance agreement. [285] [Bramlette, Bailey] [USACE] [Water Quantity] [3]

    3.3. Oconee Nuclear: Equitable pool levels for upstate lakes [293] [Bramlette, Bailey] [USACE] [3]

    3.4. Operate lakes such that appropriate storage is available to meet established obligations. [248] [Bereskin, Eskridge] [Greenville Water System] [Lake Levels] [3]

    3.5. Manage system as a whole basin: from North Carolina to Tybee Island [287] [Bramlette, Bailey] [USACE] [Water Quantity] [3]

    3.6. Oconee Nuclear: Jocassee "sacrificed" [292] [Bramlette, Bailey] [USACE] [3]

    3.7. Oconee nuclear: Infrastructure limits Keowee elevation [291] [Bramlette, Bailey] [USACE] [3]

    3.8. Greenville Interbasin Transfer [288] [Bramlette, Bailey] [USACE] [Water Supply] [3]

    3.9. Establish appropriate flow regimes. [253] [Bereskin, Eskridge] [Greenville Water System] [Flows] [3]

3.10. Keowee Releases Control: 25% of Hartwell Sub basin [286] [Bramlette, Bailey] [USACE] [Water Quantity] [3]

3.11. Establish flow protocols respond appropriately to obtain desired results. [250] [Bereskin, Eskridge] [Greenville Water System] [Flows] [3]

3.12. Ensure that all discharges downstream to Lake Hartwell are maximized. [219] [Spencer, Brown] [Anderson Chamber] [Flows, Lake Levels] [3]

5.0 Maintenance and Emergency Protocol

Facts

1. The Existing License does not address operation under abnormal conditions.
2. Keowee Hydro Station serves as an emergency backup power source for Oconee Nuclear Station.
3. The Maintenance and Emergency Protocol (MEP) is Attachment F of the AIP.

Assumptions

1. Under some emergency and equipment failure and maintenance situations, certain license conditions may be impractical to meet or may need to be suspended or modified to avoid taking unnecessary risks. The purpose of this protocol, called the Maintenance and Emergency Protocol (MEP), is to define the most likely situations of this type, identify the potentially impacted license conditions, and outline the general approach that the Licensee will take to mitigate the impacts to license conditions and to communicate with the FERC, resource agencies and affected parties.
2. Some of the situations under which the MEP may be used include:
   - Hydro Unit Outage
   - Dam Safety Emergency
   - Voltage or Capacity Emergency
   - Lake Drawdown for Maintenance Needs
   - High Water Events
   - Support for Local Emergencies
   - Oconee Nuclear Station Blackout

Related Stakeholder Team Member Interests

1. Develop a Maintenance and Emergency Protocol for the Project to manage expectations during certain abnormal conditions. [4] [Lineberger, Huff] [Duke Energy] [Operations] [5]

6.0 Historic Properties

Facts

1. For the Keowee-Toxaway Project the area of potential effects (APE) is defined as lands within the Project Boundary and lands affected by Project operations. This includes lands within the Full Pond Elevation of each reservoir, Project recreational access areas, the islands within the reservoirs, additional lands associated with each powerhouse and dam complex, and certain uplands adjoining the Full Pond Elevations. No federal or tribal lands are located with the APE.
2. The APE was defined in consultation with the Cultural Resources Resource Committee (CRRC) and was agreed to during the Committee's October 19, 2010 meeting. The CRRC includes representatives from the following entities: Eastern Band of Cherokee Indians (EBCI) Tribal Historic Preservation Office (THPO); NC Department of Cultural Resources; SC Department of Archives and History; SC Department of Natural Resources; and the SC Department of Parks, Recreation, and Tourism.
3. The Licensee is not aware of any Traditional Cultural Properties at the Project or affected by the operation of the Project.
4. The FERC, the South Carolina State Historic Preservation Office (SC SHPO), the Licensee, and the EBCI are currently parties to a Programmatic Agreement (PA) to address the potential for activities authorized under the Shoreline Management Plan's (SMP) lake use permitting program to affect Historic Properties at Lake Keowee. The Existing License does not include any requirements to address any other cultural resources.

Assumptions

1. The Licensee will develop a Historic Properties Management Plan (HPMP) addressing actions it will take to manage Historic Properties at the Project. The HPMP will be filed with the Application for a New License.

Related Stakeholder Team Member Interests

1. Complete Section 106 36 CFR 800 consultation to address archaeological and cultural topics. [301] [Howe] [Eastern Band of Cherokee Indians] [Historic Properties, Historical, Shoreline Management] [6]
2. Protect identifiable archeological and cultural sites. [213] [Smith, Schoonover] [AQDI] [6]
3. Protect cultural resources. [89] [Marshall, Vejdani] [SC DNR] [Historic Properties] [6]
4. Protect archeological and historical sites from human and natural impacts. [90] [Marshall, Vejdani] [SC DNR] [Cultural Resources] [6]
5. Increase public awareness of the history of the area prior to inundation and the archeological resources that were inundated by the lakes. [91] [Marshall, Vejdani] [SC DNR] [Historic Properties] [6]

6. Upgrade 30-plus-year-old Native American exhibits at Keowee-Toxaway State Natural Area. [164] [Gaines, Dudley] [SC PRT] [Historic Properties] [6]
7. Enhance exhibits at Keowee-Toxaway State Natural Area to showcase cultural resources of the region. [154] [Gaines, Dudley] [SC PRT] [Historic Properties] [6]
8. Enhance tribal, cultural, and public recreational opportunities of the natural resources in the project area. [36] [Cantrell] [US Fish & Wildlife Service] [6]

7.0 Public Recreation

Facts

1. The Recreation Management Plan (RMP) approved by the FERC on July 19, 2010, identifies the Licensee's requirements for providing land for public recreation and public recreational access to the Project under the Existing License.
2. The Licensee provides the following Project public recreational areas at Lake Jocassee:
   - Handpole Ridge Access Area (undeveloped)
   - Toxaway Creek (Grindstone) Access Area (undeveloped)
   - Bootleg Access Area (undeveloped)
   - Devils Fork State Park (managed by SCDPRT)
   - Double Springs Campground (managed by SCDPRT)
3. The Licensee provides the following Project public recreation areas for Lake Keowee:
   - Fall Creek Access Area
   - Crow Creek Access Area
   - Keowee Town Access Area
   - Warpath Access Area (leased by Warpath Development)
   - High Falls County Park (leased by Oconee County)
   - Cane Creek Access Area
   - South Cove County Park (leased by Oconee County)
   - Mile Creek Park (leased by Pickens County)
   - Stamp Creek Access Area
4. All of the islands located within the Project reservoirs are owned by the Licensee. These islands provide additional land (approximately 276 acres) accessible only by boat for informal public recreation.
5. The following access area upgrades are currently scheduled in the RMP:

Facility	Facility Additions or Improvements	Scheduled Completion Date
Keowee-Toxaway Natural Area	Canoe/Kayak access area at old boat ramp Parking for Canoe/Kayak access area Shoreline stabilization at Canoe/Kayak access area Additional parking at Visitors Center	Dec. 31, 2011

Facility	Facility Additions or Improvements	Scheduled Completion Date
Cane Creek Access Area	Restroom & light at southeast end of vehicle-with-trailer parking Light adjacent to turnaround at ramp Courtesy dock at ramp Road from existing vehicle-with-trailer parking to new vehicle parking on peninsula Vehicle parking midway on peninsula Restroom at vehicle parking Trail from vehicle parking to end of peninsula 6-8 picnic/bank fishing sites (2 Americans with Disabilities Act (ADA) compliant) on spur trails from vehicle parking and peninsula trail	Dec. 31, 2012
Fall Creek Access Area	North Area: Restroom with light between the natural beach area and boat ramp turnaround ADA compliant trail from ADA compliant vehicle-with-trailer parking to restroom One additional ADA compliant vehicle-with-trailer parking space Light at ADA compliant parking spaces Picnic tables between natural beach area and vehicle-with-trailer parking Paved vehicle parking along north side of vehicle-with-trailer parking One courtesy dock South Area: Restroom at vehicle-with-trailer parking Two courtesy docks Vehicle parking (40-50 spaces) for natural beach users Trail from vehicle parking to natural beach area	Dec. 31, 2012
South Cove County Park	Restroom between fishing pier parking and boat ramp turnaround ADA compliant trail from fishing pier parking to restroom Picnic tables south of fishing pier parking Repair & stripe vehicle-with-trailer parking Courtesy dock ADA compliant vehicle-with-trailer parking spaces adjacent to boat ramp turnaround (Oconee County to provide)	Dec. 31, 2013

Facility	Facility Additions or Improvements	Scheduled Completion Date
Stamp Creek Access Area	Restrooms at southeast end of vehicle-with-trailer parking Light adjacent to turn around at north ramp Picnicking between vehicle-with-trailer parking and south ramp Courtesy dock at each ramp Road from vehicle-with-trailer parking to vehicle parking on peninsula Vehicle parking approximately midway on peninsula Restroom at new vehicle parking on peninsula Trail from vehicle parking to end of peninsula 8-10 picnic/bank fishing sites (2 ADA compliant) on spur trails from vehicle parking and peninsula trail Fishing pier on north shoreline of peninsula Natural beach area on south shoreline	Dec. 31, 2014
Keowee Town Access Area	Restroom at lower end of vehicle-with-trailer parking Lighting at lower end of vehicle-with-trailer parking Picnic area between vehicle-with-trailer parking and natural beach area Courtesy dock ADA compliant picnic area on point	Dec. 31, 2014
Mile Creek County Park	Two courtesy docks	Dec. 31, 2014
Devils Fork State Park	North Remote Access Area: Extend two ramps to be useable at 1145 ft AMSL Repair asphalt ramp shoulders Relocate sign kiosk Restroom near sign kiosk South Remote Access Area: Refurbish left and middle ramps for divers/canoes Extend right ramp to be useable at 1145 ft AMSL Relocate sign kiosk Restroom near sign kiosk Main Access Area: Extend left ramp to be useable at 1145 ft AMSL Repair concrete sections of right and middle ramps	Dec. 31, 2015
Crow Creek Access Area	The Reserve will provide amenities per their FERC-approved mitigation plan and letter of understanding with Duke Energy including: Restrooms with lighting Expanded & lighted vehicle-with-trailer parking Courtesy dock Picnic area/shelter Vehicle parking Bank fishing trail	Dec. 31, 2015

Facility	Facility Additions or Improvements	Scheduled Completion Date
Warpath Access Area	Warpath Development will provide recreation amenities as specified in their Access Area Improvement Initiative (AAII) lease agreement with Duke Energy Campground Trails Swim beach Restrooms Picnic areas Cabins Lodge Marina and dry boat storage Conference center	Dec. 31, 2015

6. The Licensee's Access Area Improvement Initiative (AAII) provides opportunities for tribes, state and/or local governments and businesses to lease Licensee-owned access areas and manage them to provide for a variety of public recreation opportunities that enhance Project use. Prior to leasing a Licensee-owned access area under the AAII, any interested party must prepare a written plan that is acceptable to the Licensee and would result in the development and management of the site in a manner that enhances public recreational use and enjoyment of the Project reservoirs. Tribal and governmental entities can lease Licensee-owned access areas for a nominal fee. Businesses can also lease Licensee-owned access areas through the AAII to provide public recreation facilities. Businesses can lease access areas directly from the Licensee or they can sublease access areas from tribal and governmental lessees, provided the Licensee approves the terms of the sublease.

Assumptions

1. The Licensee will develop a new RMP to replace the existing RMP for the Project. The new RMP will be filed with the Application for New License.

8.0 Shoreline Management

Facts

1. The Licensee implements its Keowee-Toxaway Shoreline Management Plan (SMP) to: provide for public and private access to the Project while appropriately managing the Project's scenic, cultural, and environmental resources and protecting the Project's capability to produce electricity; comply with the Land Use Article (i.e., Article 49 for the Keowee-Toxaway Project) issued by the Federal Energy Regulatory Commission (FERC); and ensure that the existing and future public recreational needs of the Project are addressed.
2. The current SMP for Lake Keowee has been in effect since 2006; it was approved by the FERC on May 25, 2007. The current SMP for Lake Jocassee has been in effect since 2008.
3. The SMP consists of three distinct, yet related, components.
   - Lake Use Policy Statements delineate the types of access and activities that may be allowed within the Project Boundary on each reservoir based on license requirements; federal, state, and/or local regulations; and specific business management objectives
   - Shoreline Classification Maps and associated Lake Use Restrictions show various types and uses of the shoreline, including areas protected for environmental or habitat values, areas of existing development, and areas of potential future development. The classifications are based upon the characteristics of the shoreline within the Project Boundary
   - Shoreline Management Guidelines are a set of detailed procedures and criteria that regulate activities within reservoirs owned or managed by the Licensee.

Assumptions

1. Any revisions to the SMP that result from the relicensing process will be implemented when the Licensee files its Application for New License with the FERC.

9.0 Species Protection

Facts

1. This section addresses state- and federal-listed Rare, Threatened and Endangered (RTE) species and others listed as Species of Concern and Special Concern Species. These species collectively will be referred to as Special Status Species in this section.
2. This section may also address species that are not Special Status Species, but by their specific or uncertain conservation circumstances have been given a priority status by the South Carolina Department of Natural Resources' Comprehensive Wildlife Conservation Plan (http://www.dnr.sc.gov/cwcs/index.html).
3. The Existing License does not contain any specific requirements for the protection of Special Status Species or Priority Species.
4. Threatened and Endangered species are protected by state and federal regulations; Special Status Species and Priority Species have no legal protection. However, all rare aquatic species in South Carolina have protection under the South Carolina Pollution Control Act.
5. The Licensee, through field surveys conducted to date or consultation with agencies, is aware of the presence of the following Special Status and Priority Status species within the FERC Project Boundaries or within areas possibly affected by Project operations.

Species	Scientific Name	Federal Status	State Status (SC / NC)
Oconee bell	*Shortia galacifloia*	Species of Concern	Species of Concern-SC Species of Concern-NC
Green salamander	*Aneides aeneus*	Species of Concern	Species of Concern-SC Endangered-NC
Northern cricket frog	*Acris crepitans*	None	Special Concern-SC
Pickerel frog	*Rana palustris*	None	Special Concern-SC
Peregrine falcon	*Falco peregrines*	None	Endangered-SC
Bald eagle	*Haliaeetus leucocephalus*	None	Endangered-SC
Black bear	*Ursus americanus*	None	Species of Concern-SC
Redeye bass	*Micropterus coosae*	None	Priority Status-SC

6. Additional Special Status and Priority Status species may be discovered during the course of relicensing studies. Further, relicensing studies may indicate management activities that could enhance habitat for these species.

10.0 Water Quality

Facts

1. The Licensee's on-going monitoring downstream of Jocassee Pumped Storage Station and Keowee Hydro Station demonstrates that the water released by Project facilities meets state standards for Dissolved Oxygen (DO).
2. This section presents concepts and continuing activities intended to provide input into the formal 401 Water Quality Certification process to be conducted by the South Carolina Department of Health and Environmental Control (SCDHEC).
3. This AIP does not replace the required 401 Water Quality Certification process that must be administered by SCDHEC.
4. In addition to the Licensee's operation of the Project, there are a number of basin-wide factors that affect the quality of water within the Project, including but not limited to land use and development patterns and stormwater and wastewater treatment practices.

11.0 Other Resource Enhancements

Facts

1. The general philosophy of mitigating negative human impacts on a river basin's resources is to pursue the following sequential steps:
    a. Avoidance
    b. Minimization
    c. Rectification
    d. Mitigation

    The majority of this AIP involves Steps a, b and c.
2. As appropriate, this section provides protection, mitigation and enhancement measures that the Licensee will make to complement the actions specified in other sections of this AIP.

12.0 Miscellaneous Agreements

13.0 Addition Topics to be Covered in the Relicensing Agreement

The following topics as a minimum will be covered in the Relicensing Agreement (RA) in addition to the items listed above to convert the content of this AIP into a binding contract:

1. Recitals – a series of "whereas" statements that describe the Project, identify the parties to the RA and provide the chronology of major events in the stakeholder team process.
1. Proposed license articles for the New License.
2. Monetary escalation formulas.
3. Handling of cost-share funding.
4. Responding if a Jurisdictional Body takes actions that are inconsistent with the RA.
5. Handling of any previous contractual agreements that may be replaced by the RA.
6. Handling of future RA amendments.
7. The time period covered by the RA.
8. Actions if a part of the RA is determined to be illegal or unenforceable.
9. Actions to be taken if a party breaches the RA.
10. Conditions and procedures necessary for a party to withdraw from the RA.
11. Identification of each party's authorized representative for future notices and contacts.
12. Applicability of state laws.
13. Identification of who has or does not have rights under the RA.
14. Actions if the Project should ever become unlicensed.
15. Where appropriate, the RA will note whether the actions spelled out in it are expected to be terms of the New License and/or State 401 Water Quality Certification (401 WQC) items.

14.0 Consensus Acknowledgement

14.1. Expectations for Signing the AIP

All Primary Team Members, including Duke, are expected to sign the AIP indicating, among other things, their level of consensus on the entire document. In signing the AIP, Primary Team Members will be specifying the following:

- Participation and Knowledge – They have participated in the activities of the Team and have a good understanding of the information contained in the AIP.
- Consensus Level – They will identify that, based on their then-current knowledge level and consideration of their interests and those of the Member Organizations they represent, they either (a) Agree in Consensus with the AIP (i.e., rate the document as a 1-3 on the Team's 5-point consensus rating scale), (b) Agree in Consensus with

Major Reservations with the AIP (i.e., rate the document as a 4 on the Team's 5-point consensus rating scale), or (c) Are Not in Consensus with the AIP (i.e., rate the document as a 5 on the Team's 5-point consensus rating scale).

- Obligation to Register Any Major Reservations – On the appropriate line within the signature block, they will identify the paragraph, subparagraph and page numbers of any specific element(s) of the AIP that caused them to rate the AIP as a 4 on the Team's 5-point consensus scale. In addition, they will provide a 500 or fewer-word statement describing their basic reasons for having Major Reservations with the specific element(s).
- Obligation to Register Any Dissension Statements – On the appropriate line within the signature block, they will identify the paragraph, subparagraph and page numbers of any specific element(s) of the AIP that caused them to rate the AIP as a 5 on the Team's 5-point consensus scale. In addition, they will provide a 500 or fewer-word statement describing their basic reasons for dissenting with the specific element(s).
- Relicensing Agreement (RA) Development – Organizations whose Primary Team Member rates the AIP as a 1, 2, 3, or 4 are requested to help develop and sign a binding RA not later than the Team's scheduled completion date that will convert the AIP into a binding contract (RA), subject to any changes, addition of details and terms and conditions as may be determined necessary by consensus of the parties signing the RA.
- Good-Faith Effort to Sign the RA – Organizations whose Primary Team Member rates the AIP as a 1, 2, 3, or 4 acknowledge that, based on their then-current level of knowledge, they do not know of any reason why their Member Organization would not sign the binding RA, and that they will endeavor in good faith with the other parties to develop the RA and acquire the signature of their Member Organization's authorized representative.
- No Legal Obligation – That, by signing the AIP, they are not legally obligating their Member Organization to sign the binding RA or any other stakeholder agreements.
- Filing the AIP – That Duke will file the AIP (along with any Major Reservation Statements or Dissension Statements) with its license application to the FERC and with its application for 401 Water Quality Certification to the SC Department of Health and Environmental Control.

14.2. Signature Form to Agree in Consensus

Primary Team Member

_____ _____
(Signature) (Date)

_____
(Printed Name)

_____
(Member Organization)

Consensus Level

Please circle on one level of consensus representing you rating of the AIP as a whole.

1 2 3 4

Major Reservations

Please indicate the Topic Title(s), Section(s), Subsection(s) and Page Number(s) of any AIP elements for which Team Member has Major Reservations (i.e., caused him/her to rate the AIP as a "4").

(Topic Title)	(Section / Subsection)	(Page)

14.3. Signature Form to Acknowledge not Reaching Consensus

Primary Team Member

_____ _____
(Signature) (Date)

_____
(Printed Name)

_____
(Member Organization)

Consensus Level

By signing this from, Team Member is indicated a level of consensus of "5" on the AIP as a whole. Please do not use this form if you want to indicate a consensus level other than a "5".

Dissension

Please indicate the Topic Title(s), Section(s), Subsection(s) and Page Number(s) of any AIP elements for which Team Member has dissented (i.e., caused him/her to rate the AIP as a "5").

(Topic Title)	(Section / Subsection)	(Page)

15.0 List of References

1. Keowee-Toxaway Hydroelectric Project Relicensing (FERC Project No. 2503) Stakeholder Team Charter (September 22, 2009).

16.0 List of Attachments

Attachment A:	Abbreviations, Initializations and Acronyms
Attachment B:	Definitions
Attachment C:	Keowee-Toxaway Hydro Project Relicensing Study Descriptions
Attachment D:	Critical Reservoir Elevations
Attachment E:	Low Inflow Protocol (LIP) for the Keowee-Toxaway Project
Attachment F:	Maintenance and Emergency Protocol (MEP) for the Keowee-Toxaway Project
Attachment G:	Keowee-Toxaway Public Recreation Amenities and Other Key Land Areas
Attachment H:	Shoreline Management Plan (SMP) including: a. Classification and Lake Use Restrictions for the [year] Keowee-Toxaway SMP Map Revisions and b. Shoreline Management Guidelines (SMG)

Attachment A – Abbreviations, Initializations, and Acronyms

Abbreviation	Meaning	Pronunciation / Comments
401 WQC	401 Water Quality Certification	
AA	Access Area	
AAII	Access Area Improvement Initiative	
ac	acre(s)	
ac-ft	acre feet	
ADA	Americans with Disability Act	
ADQ, ADQI	Advocates for Quality Development, Inc.	
AMSL	above mean sea level	
APE	Area of Potential Effect	
CEII	Critical Energy Infrastructure Information	
CEQ	Council on Environmental Quality	
CFR	Code of Federal Regulations	
cfs	cubic feet per second	
CHEOPS™	Computerized Hydro Electric Operations Planning System	A proprietary water-balance model. Pronounced "*KEE ops*"
CWA	Clean Water Act	
DO	dissolved oxygen	
EA	Environmental Assessment	
AEP	Emergency Action Plan	
EBCI	Easter Band of Cherokee Indians	
EIS	Environmental Impact Statement	
ESA	Endangered Species Act	
FERC	Federal Energy Regulatory Commission	Pronounced "*ferk*"
FOLKS	Friends of Lake Keowee Society	
FONSI	Finding of No Significant Impact	
FPA	Federal Power Act	
ft.	foot / feet	

Abbreviation	Meaning	Pronunciation / Comments
GIS	Geographic Information System	
GWS	Greenville Water System	
HEC-ResSim	Hydrologic Engineering Center Reservoir Simulation	Pronounced "*heck rez sim*"
HP	Historic Properties	
HPMP	Historic Properties Management Plan	
IBT	Inter-Basin Transfer	
ILP	Integrated Licensing Process	
JPSS	Jocassee Pumped Storage Station	
KT	Keowee-Toxaway	
K&W	Kearns & West, Inc.	
LiDAR	Light Detection and Ranging	Pronounced "*LIE dar*"
MOU	memorandum of understanding	
MEP	Maintenance and Emergency Protocol	
MGD	million gallons per day	
MW	Megawatt	
MWh	Megawatt-hours	
MSL	mean sea level	
NA, N/A	not applicable	
NCDENR, DENR	NC Dept of Environment and Natural Resources	Pronounced "*DEE ner*"
NEPA	National Environmental Policy Act	Pronounced "*NEE puh*"
NGO	non-governmental organization	
NOAA	National Oceanic and Atmospheric Administration	Pronounced "*noah*"
NMFS	National Marine Fisheries Service	Pronounced "*nymphs*"
NOI	notice of intent	
NRC	Nuclear Regulatory Commission	
NPDES	National Pollution Discharge Elimination System	
NRHP	National Register of Historic Places	
ONS	Oconee Nuclear Station	

Abbreviation	Meaning	Pronunciation / Comments
PA	Programmatic Agreement	
PAD	Pre-Application Document	Pronounced "*pad*"
PBL	Project Boundary Line	
PDT	Project Delivery Team	
PM&E	Protection, Mitigation and Enhancement measures	
RA	Relicensing Agreement	
RC	Resource Committee	
RCC	Resource Committee Coordinator	
REA	Ready for Environmental Analysis	
RMP	Recreation Management Plan	
RTE	Rare, Threatened or Endangered Species	
RUNS	Recreation Use and Needs Study	
SCDAH, DAH	SC Dept of Archives and History	
SCDHEC, DHEC	SC Dept of Health and Environmental Control	Pronounced "*DEE heck*"
SCDNR, DNR	SC Dept of Natural Resources	
SCDPRT, PRT	SC Dept of Parks, Recreation & Tourism	
SCORP	State Comprehensive Outdoor Recreation Plan	Pronounced "*scorp*"
SD1	Scoping Document #1	
SD2	Scoping Document #2	
SEPA	Southeaster Power Administration	Pronounced "*SEE puh*"
SHPO	State Historic Preservation Office	Pronounced "*SHIP oh*"
SMG	Shoreline Management Guidelines	
SMP	Shoreline Management Plan	
TBD	to be determined	
TCP	Traditional Cultural Properties	
THPO	Tribal Historic Preservation Office	
TMDL	Total Maximum Daily Load	
USACE	U.S. Army Corps of Engineers	
USDA	U.S. Department of Agriculture	

Abbreviation	Meaning	Pronunciation / Comments
USDC	U.S. Department of Commerce	
USDOI, DOI	U.S. Department of Interior	
USEPA, EPA	U.S. Environmental Protection Agency	
USFS, FS	U.S. Forest Service	
USFWS, FWS	U.S. Fish & Wildlife Service	
USGS	U.S. Geological Survey	
WOE	Duke World of Energy in Seneca	

1

2

Attachment B – Definitions

TBD

Attachment C – Keowee-Toxaway Project Standard Nomenclature

The terms below provide names for key physical features within, upstream, and downstream of the Keowee-Toxaway Hydro Project. These terms are consistently used in all Keowee-Toxaway Hydro Project relicensing documents.

Jocassee Development – Lake Jocassee

- Jocassee Dam
- Jocassee Pumped Storage Station

Keowee Development – Lake Keowee

- Keowee Dam
- Keowee Hydro Station
- Little River Dam
    - Little River Bypassed Reach

Other

- Bad Creek Pumped Storage Project

Attachment D – Critical Reservoir Elevations

TBD

Attachment E – Low Inflow Protocol (LIP) for the Keowee-Toxaway Project

TBD

Attachment F – Maintenance and Emergency Protocol (MEP) for the Keowee-Toxaway Project

TBD

Attachment G – Keowee-Toxaway Public Recreation Amenities and Other Key Land Areas

TBD

Attachment H – Shoreline Management Plan (SMP)

TBD

OCONEE COUNTY ECONOMIC DEVELOPMENT COMMISSION

Economic Development Past, Present & Future

Oconee County Council
Planning & Economic Development Committee
November 10, 2011

What is Economic Development?

EDC Mission Statement

The Economic Development Commission will improve the Quality of Life for the citizens of Oconee County by encouraging a Diversified Economy that attracts Industrial and Commercial investment and fosters retention of Existing Business and Industry

THE PAST...

2007 Capital Investment & Job Creation

Company	New/Expansion	Investment	Job Creation
Timken US Corporation	Expansion	$18 M	240
Itron, Inc.	Equipment Upgrade	$30 M	0
Borg Warner	Expansion	$13.5 M	90
Johnson Controls	Expansion	$8.9 M	0
Lift Technologies	Expansion	$2.5 M	10

2008 Capital Investment & Job Creation

Company	New/Expansion	Investment	Job Creation
Borg Warner	Expansion	$10 M	50
Sandvik	Expansion	$47.5 M	85
ITECH South	New	$5 M	85
Lift Technologies	New	$5 M	60

2009 Capital Investment & Job Creation

Company	New/Expansion	Investment	Job Creation
Greenfield Industries	Expansion	$18 M	85
Itron	Equipment Upgrade	$30 M	300

2010 Capital Investment & Job Creation

Company	New/Expansion	Investment	Job Creation
US Engine Valve	Expansion	$18 M	5
Schneider Electric	Equipment Upgrade	$5 M	5
Koyo Bearings	FILOT Extension	$5 M	

2011 Capital Investment & Job Creation

Company	New/Expansion	Investment	Job Creation
Altera Polymers	New	$4 M	50
Collins Craft	Expansion	$1.75 M	5
Project FLS	-	$60 M	25

Recap

- 2007-2011
  - Capital Investment **$282,150,000**
  - Job Creation **1105**
- 2009-2011 "The Downturn"
  - Capital Investment **$141,750,000**
  - Job Creation **475**

THE PRESENT…

Collins Craft

Collins Craft

Echo Hills

Blue Ridge Electric Substation

City of Walhalla Waterline Ext.

Propex VCC

SC Dept of Commerce Economic Developers Workshop

- Two Day Conference
  - Columbia, SC
- Topics Concerning:
  - Site Selection
  - Importance of Covenants
  - Development
  - Incentives
  - New Marketing Efforts
- Attended by:
  - Jim Alexander
  - Russell Johnson

Industrial Park Covenants

- Covenants tabled by Council are similar to Industrial Parks in Pickens & Greenville.
- Issues Expressed:
  - Height restriction was set at (65') to match Oconee County Ordinance (Ord. No. 2009-16, § 5, 9-1-2009)
- Exemptions to Height Restriction:
  - Belfries, Chimneys, Church spires, Communications towers, Conveyors, Cooling towers, Cupolas, Domes, Elevator bulkheads, Fire towers, Flag poles, Ornamental towers and spires, Public monuments, Public utility poles, Silos, Skylights, Smoke stacks, Stage towers or scenery lofts. (Ord. No. 2009-16, § 6, 9-1-2009)

Capital Investment & Job Creation
Oconee vs. Pickens

Oconee County			Pickens County		
2008	$67.5 M	290	2008	$7.8 M	237
2009	$48 M	235 + 150	2009	-	-
2010	$28 M	10	2010	$4.53 M	45
2011	$65.75 M	80	2011	$26.4 M	547
Total	$209.25 M	615	Total	$38.73 M	829
		765			

Mountain Lakes Business Development Corporation

- 60-65 active clients
- 9-11 ready for incubator in Walhalla
- 3 ready for incubator in Easley
- 2 ready for incubator in Anderson
- Classes at TCTC November 22nd.
- Potential for over 50 jobs
- GREAT job by Carl Cliche!!!

AOP-BIS

- Tuesday Night Opening - 250 attendees
- Wednesday and Thursday
  - 5148 Eighth and Ninth Grade Students
  - 7 School Districts from Anderson, Oconee & Pickens Counties
  - 55 Exhibitors
  - Support by Counties, Businesses and Industry
    - Many positive comments

Great Kickoff

Let the Games Begin

AOP-BIS

AOP-BIS

AOP-BIS

AOP-BIS

AOP-BIS

AOP-BIS

Thanks

- Senator Thomas Alexander
- Larry Smith of Schneider Electric
- Todd Bennington of BorgWarner
- Superintendent Mike Lucas
- ED Staff of all 3 Counties
- All of the teachers from 7 school districts
- Oconee Chambers
- Chris Lee at Wal-Mart

Feed the Troops

Other Activities

- Road Trip by Russell Johnson with Upstate Alliance
  - MI, OH --- 7 Good contacts
- Presentation to Advocates for Quality Development
  - Nov 5th at Keowee Key --30 attendees
- Water lines being installed from Walhalla to Echo Hills
- Electrical Substation under construction at Echo Hills
- Mountain Lakes Business Development Corporation
  - Need for Incubator

THE FUTURE...

Recommendations

- Echo Hills Industrial Park
  - Approve Covenants
  - Move forward with Phase 1.
- Golden Corner Commerce Park
  - Approve Covenants
  - Have a Master Plan done for the entire park.
- Mountain Lakes BDC
  - Strong possibility for use of the Brown Building.

Questions? Contact Info

Oconee County Economic
Development Commission
502 East Main Street
Walhalla, SC 29691
(864) 638-4210
www.oconeescedc.com

Jim Alexander
Director
jalexander@oconeesc.com

OCONEE
COUNTY
ECONOMIC
DEVELOPMENT
COMMISSION

SOURCE: Seneca Falls Health, Safety and Environmental Assessment by URS (April 5, 2003)
Aerial Imagery: Google, Inc., USGS (03/31/2008)
Property Boundaries: Oconee County

30' Sanitary Sewer Easement

Propex Facility

TRACT 1
31.65 Acres

TRACT 2
112.15 Acres

Marshall Ave

State Rd S-37-6

E South 6th St

Ashton St

E Ashton St

Brown St

Goddard Ave

Powell St

Jamieson Ave

E James St

E D St

E Lonsdale St

E Padgett St

Moores Rd

Vance Dr

Holly Park Dr

Holly Park Cir

Overlook Rd

E Southern Dr

N

Legend

- Proposed Soil Sample Locations
- Proposed Groundwater Sample Locations
- Rail
- Tract 2 Property Boundary
- Tract 1 Property Boundary

0 200 400 800 1,200 1,600 Feet

KLEINFELDER

GREENVILLE
Bevis Rd, Suite 302
Greenville, SC 29615
(864) 288-8383

CHARLESTON
Wil Drive, Suite 100
Charleston, SC 29492
(843) 769-0009

Date Created: 10/28/2011
Date Revised:
Project # 20203-001.01

Proposed Sample Locations

Propex Facility Undeveloped Tract - Oconee County, South Carolina

Created By: AMF
Prepared By: AMF
Checked By: CJS

FIGURE 2