

### (REFERENCE COPY - Not for submission)

# **DTV Engineering STA Application**

 File Number: 0000115802
 Submit Date: 06/04/2020
 Call Sign: WCIQ
 Facility ID: 711
 FRN: 0001750314
 State:

 Alabama
 City: MOUNT CHEAHA
 Service: DTV
 Purpose: Engineering STA
 Status: Granted
 Status Date: 06/17/2020
 Expiration Date:
 Filing Status: InActive

| General So<br>Information        | Section | Question                                                       | Response |  |
|----------------------------------|---------|----------------------------------------------------------------|----------|--|
|                                  |         |                                                                |          |  |
| Fees, Waivers,<br>and Exemptions | Section | Question                                                       | Response |  |
|                                  | Waivers | Does this filing request a waiver of the Commission's rule(s)? | No       |  |
|                                  |         | Total number of rule sections involved in this waiver request: |          |  |

## Applicant Name, Type, and Contact Information

| Applicant                                                                                                                 | Address                                                                                            | Phone                | Email              | Applicant<br>Type |
|---------------------------------------------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------|----------------------|--------------------|-------------------|
| ALABAMA EDUCATIONAL TELEVISION COMMISSION<br>Applicant<br>Doing Business As: ALABAMA EDUCATIONAL<br>TELEVISION COMMISSION | Windell L. Wood<br>2112 11TH AVE<br>South<br>Suite 400<br>BIRMINGHAM,<br>AL 35205<br>United States | +1 (205)<br>451-0132 | wwood@aptv.<br>org | Other             |

#### Authorization Holder Name

Check box if the Authorization Holder name is being updated because of the sale (or transfer of control) of the Authorization(s) to another party and for which proper Commission approval has not been received or proper notification provided.

| Contact<br>Representatives<br>(2) | Contact Name                                                              | Address                                                                                                  | Phone                | Email                         | Contact Type                |
|-----------------------------------|---------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------|----------------------|-------------------------------|-----------------------------|
|                                   | ESQ M. SCOTT JOHNSON SCOTT<br>JOHNSON , ESQ .<br>Smithwick & Belendiuk PC | M. SCOTT JOHNSON<br>5028 WISCONSIN<br>AVENUE NW<br>SUITE 301<br>WASHINGTON, DC<br>22209<br>United States | +1 (202)<br>256-5941 | sjohnson@fccworld.com         | Legal<br>Representative     |
|                                   | <b>Ryan Wilhour Wilhour</b><br>Kessler and Gehman Associates,<br>Inc.     | 507 NW 60th Street<br>Suite C<br>Gainesville, FL 32607<br>United States                                  | +1 (352)<br>332-3157 | ryan@kesslerandgehman.<br>com | Technical<br>Representative |

| Channel and<br>Facility<br>Information | Section                          | Question               | Response                  |
|----------------------------------------|----------------------------------|------------------------|---------------------------|
|                                        | Proposed Community of<br>License | Facility ID            | 711                       |
|                                        |                                  | State                  | Alabama                   |
|                                        |                                  | City                   | MOUNT CHEAHA              |
|                                        |                                  | DTV Channel            | 7                         |
|                                        |                                  | Designated Market Area | BIRMINGHAM                |
|                                        | Facility Type                    | Facility Type          | Noncommercial Educational |
|                                        |                                  | Station Type           | Main                      |
|                                        | Zone                             | Zone                   | 2                         |

| Antenna Location<br>Data | Section                           | Question                                                           | Response                              |
|--------------------------|-----------------------------------|--------------------------------------------------------------------|---------------------------------------|
|                          | Antenna Structure<br>Registration | Do you have an FCC Antenna Structure Registration (ASR)<br>Number? | Yes                                   |
|                          |                                   | ASR Number                                                         | 1036421                               |
|                          | Coordinates (NAD83)               | Latitude                                                           | 33° 29' 06.4" N+                      |
|                          |                                   | Longitude                                                          | 085° 48' 31.9" W-                     |
|                          |                                   | Structure Type                                                     | TOWER-A free standing or guyed struct |
|                          |                                   | Overall Structure Height                                           | 176.1 meters                          |
|                          |                                   | Support Structure Height                                           | 176.1 meters                          |
|                          |                                   | Ground Elevation (AMSL)                                            | 731.5 meters                          |
|                          | Antenna Data                      | Height of Radiation Center Above Ground Level                      | 126.5 meters                          |
|                          |                                   | Height of Radiation Center Above Average Terrain                   | 560.9 meters                          |
|                          |                                   | Height of Radiation Center Above Mean Sea Level                    | 858.0 meters                          |
|                          |                                   | Effective Radiated Power                                           | 8.5 kW                                |

| Antenna        | Section                           | Question                                                                                                                                            | Response           |
|----------------|-----------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------|--------------------|
| Technical Data | Antenna Type                      | Antenna Type                                                                                                                                        | Directional Custom |
|                |                                   | Do you have an Antenna ID?                                                                                                                          | No                 |
|                |                                   | Antenna ID                                                                                                                                          | 1006874            |
|                | Antenna Manufacturer and          | Manufacturer:                                                                                                                                       | Dielectric         |
|                | Model                             | Model                                                                                                                                               | TLS-V4/VP-R        |
|                |                                   | Rotation                                                                                                                                            | 0 degrees          |
|                |                                   | Electrical Beam Tilt                                                                                                                                | 1.00               |
|                |                                   | Mechanical Beam Tilt                                                                                                                                | Not Applicable     |
|                |                                   | toward azimuth                                                                                                                                      |                    |
|                |                                   | Polarization                                                                                                                                        | Elliptical         |
|                | DTV and DTS: Elevation<br>Pattern | Does the proposed antenna propose elevation radiation<br>patterns that vary with azimuth for reasons other than the<br>use of mechanical beam tilt? | No                 |
|                |                                   | Uploaded file for elevation antenna (or radiation) pattern data                                                                                     |                    |

# Directional Antenna Relative Field Values (Pre-rotated Pattern)

| Degree | Value | Degree | Value | Degree | Value | Degree | Value |
|--------|-------|--------|-------|--------|-------|--------|-------|
| 0      | 0.640 | 90     | 0.623 | 180    | 0.640 | 270    | 1.000 |
| 10     | 0.593 | 100    | 0.618 | 190    | 0.696 | 280    | 0.995 |
| 20     | 0.561 | 110    | 0.604 | 200    | 0.756 | 290    | 0.978 |
| 30     | 0.546 | 120    | 0.584 | 210    | 0.815 | 300    | 0.952 |
| 40     | 0.549 | 130    | 0.564 | 220    | 0.868 | 310    | 0.915 |
| 50     | 0.564 | 140    | 0.549 | 230    | 0.915 | 320    | 0.868 |
| 60     | 0.584 | 150    | 0.546 | 240    | 0.952 | 330    | 0.815 |
| 70     | 0.604 | 160    | 0.561 | 250    | 0.978 | 340    | 0.756 |
| 80     | 0.618 | 170    | 0.593 | 260    | 0.995 | 350    | 0.696 |

# **Additional Azimuths**

VA Degree

| Certification | Section                             | Question                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  | Response                                                            |
|---------------|-------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|---------------------------------------------------------------------|
|               | General Certification<br>Statements | The Applicant waives any claim to the use of any particular frequency or of the electromagnetic spectrum as against the regulatory power of the United States because of the previous use of the same, whether by authorization or otherwise, and requests an Authorization in accordance with this application (See Section 304 of the Communications Act of 1934, as amended.).                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         |                                                                     |
|               |                                     | The Applicant certifies that neither the Applicant nor any<br>other party to the application is subject to a denial of Federal<br>benefits pursuant to §5301 of the Anti-Drug Abuse Act of<br>1988, 21 U.S.C. §862, because of a conviction for<br>possession or distribution of a controlled substance. This<br>certification does not apply to applications filed in services<br>exempted under §1.2002(c) of the rules, 47 CFR . See §1.<br>2002(b) of the rules, 47 CFR §1.2002(b), for the definition of<br>"party to the application" as used in this certification §1.2002<br>(c). The Applicant certifies that all statements made in this<br>application and in the exhibits, attachments, or documents<br>incorporated by reference are material, are part of this<br>application, and are true, complete, correct, and made in<br>good faith.                                                  |                                                                     |
|               | Authorized Party to Sign            | <ul> <li>FAILURE TO SIGN THIS APPLICATION MAY RESULT IN<br/>DISMISSAL OF THE APPLICATION AND FORFEITURE<br/>OF ANY FEES PAID</li> <li>Upon grant of this application, the Authorization Holder may<br/>be subject to certain construction or coverage requirements.</li> <li>Failure to meet the construction or coverage requirements<br/>will result in automatic cancellation of the Authorization.</li> <li>Consult appropriate FCC regulations to determine the<br/>construction or coverage requirements that apply to the type<br/>of Authorization requested in this application.</li> <li>WILLFUL FALSE STATEMENTS MADE ON THIS FORM<br/>OR ANY ATTACHMENTS ARE PUNISHABLE BY FINE AND<br/>/OR IMPRISONMENT (U.S. Code, Title 18, §1001) AND/OR<br/>REVOCATION OF ANY STATION AUTHORIZATION (U.S.<br/>Code, Title 47, §312(a)(1)), AND/OR FORFEITURE (U.S.<br/>Code, Title 47, §503).</li> </ul> |                                                                     |
|               |                                     | I certify that this application includes all required and relevant attachments.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           | Yes                                                                 |
|               |                                     | I declare, under penalty of perjury, that I am an authorized representative of the above-named applicant for the Authorization(s) specified above.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        | Windell L. Wood L. Wood<br>COO and Technical Director<br>06/04/2020 |

| Attachments | File Name                          | Uploaded By | Attachment Type     | Description                    |
|-------------|------------------------------------|-------------|---------------------|--------------------------------|
|             | WCIQ Engineering STA Narrative.pdf | Applicant   | General Information | WCIQ Engineering STA Narrative |