MINOR CHANGE APPLICATION/
NEW AUXILIARY FM ANTENNA
CENTRAL FLORIDA EDUCATIONAL FOUNDATION, INC.
WHYZ (FM) RADIO STATION
CH 216C3 - 91.1 MHZ - 4.0 KW (V)
PALM COAST, FLORIDA
August 2010

EXHIBIT B

Radio Frequency Assessment

A study has been made to determine whether this proposal is in compliance with 47 C.F.R. §1.1307 of the Commission's rules and with OET Bulletin #65, dated August 1997 ("Bulletin"), regarding human exposure to radio frequency radiation in the vicinity of broadcast towers. This study considers all nearby contributing stations, specifically the WHYZ main[1], and utilizes the appropriate formulas contained in the OET Bulletin.[2]

The proposed WHYZ auxiliary antenna system will be mounted with its center of radiation 42.7 meters (140.0 feet) above the ground at the existing tower location and will operate with an effective radiated power of 4.0 kilowatts in the vertical plane. The WHYZ auxiliary antenna will be a three bay full wavelength antenna system (FCC/EPA Type #1). At 2.0 meters above the ground at the base of the tower, the height of an average person, the WHYZ auxiliary antenna system will contribute 0.0761 mw/cm^2.[3] Based on exposure limitations for a controlled environment, 7.6% of the allowable ANSI limit is reached at 2.0 meters above the ground at the

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1) While it is unlikely the WHYZ main and auxiliary antenna systems will be operating at the same time, both were considered for a worst case review.

2) The FMModel Program was used for all calculations for the FM station contributions. The EPA single bay dipole antenna was used unless otherwise noted.

3) This level of field occurs at 8.0 meters out from the base of the tower and is considered worst case.

base of the tower. For uncontrolled environments, 38.1% of the ANSI limit is reached at 2.0 meters above the ground at the base of the tower.

The authorized WHYZ antenna system is mounted with its center of radiation 48.8 meters (160.0 feet) above the ground at the tower location and operates with an effective radiated power of 9.2 kilowatts in the horizontal and vertical planes (circularly polarized). The WHYZ antenna is a Shively Labs, 6810 series four bay full wavelength antenna system (FCC/EPA Type #6). At 2.0 meters above the ground at the base of the tower, the height of an average person, the WHYZ antenna system contributes 0.0206 mw/cm^2.[4] Based on exposure limitations for a controlled environment, 2.1% of the allowable limit is reached at 2.0 meters above the ground at the base of the tower. For uncontrolled environments, 10.3% of the ANSI limit is reached at 2.0 meters above ground at the base of the tower.

Combining the contributions of the WHYZ auxiliary and WHYZ main, a total of 48.4% is reached at 2.0 meters above the ground at the base of the existing tower. Since this level for uncontrolled environments is below the 100% limit defined by the Commission, the proposed WHYZ auxiliary antenna is believed to be in compliance with the radio frequency radiation exposure limits as required by the Federal Communications Commission. Further, CFEF will insure that there are warning signs in the vicinity of the tower warning of potential radio frequency radiation hazards at the site. In addition, CFEF will reduce the power of the proposed

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4) This level of field occurs at 21.0 meters out from the base of the tower and is considered worst case.

facility or cease operation in cooperation and coordination with other tower users, as necessary, to protect persons having access to the site, tower or antenna from radio frequency radiation in excess of FCC guidelines.