



**STATEMENT OF WILLIAM J. GETZ  
IN SUPPORT OF AN  
APPLICATION FOR CONSTRUCTION PERMIT  
WFFH(FM) - SMYRNA, TENNESSEE  
CHANNEL 231A, 3.2 kW ERP, 93 METERS HAAT**

Prepared for: Caron Broadcasting, Inc.

I am a Radio Engineer in the firm of Carl T. Jones Corporation with offices located in Springfield, Virginia. My education and experience are a matter of record with the Federal Communications Commission.

This office has been authorized by Caron Broadcasting, Inc., licensee of FM broadcast station WFFH(FM), Smyrna, Tennessee, to prepare this statement in support of an Application for Construction Permit to change transmitter site, Effective Radiated Power (ERP) and antenna height for WFFH(FM).

Radio Station WFFH(FM) is presently licensed (FCC File No. BLH-950606KA) to operate on Channel 231A with an ERP of 3.9 kW at an antenna Height Above Average Terrain (HAAT) of 72 meters. The applicant herein requests authority to relocate to an existing support structure, 7.8 kilometers from the current WFFH(FM) transmitter site. The instant application maintains a technical facility equivalent to a 3.0 kW ERP at 100 meter HAAT Class A facility in accordance with Section 73.213(c)(1) of the FCC Rules.

### ALLOCATION CONSIDERATIONS

A complete allocation study revealed that WFFH(FM) will remain fully-spaced to all pertinent co-channel and adjacent channel, allotments, applications and assignments with the exception of WEGI(FM) and WJJM-FM.

#### WEGI(FM), Springfield, TN (Channel 232A)

The WFFH(FM) transmitter site proposed herein is 14.12 kilometers short-spaced to the WEGI(FM) licensed transmitter site (FCC File No. BLH-920703KG). On March 31, 2004, the Audio Division granted the WEGI(FM) Construction Permit (FCC File No. BPH-20040123ADB) to change transmitter site and effectuate a change in community of license to Oak Grove, Kentucky ("Oak Grove Construction Permit"). The WFFH(FM) transmitter site proposed herein is fully-spaced with the WEGI(FM) Oak Grove Construction Permit facility.

This application is filed concurrently with the WEGI(FM) Application for License to cover the Oak Grove Construction Permit. As a result, the 1992 WEGI(FM) license no longer requires protection from WFFH(FM).

#### WJJM-FM, Lewisburg, TN (Channel 232A)

The licensed WFFH(FM) transmitter site became 8.27 kilometers short-spaced to first-adjacent channel Class A station WJJM-FM, as a result of the Commission's revision of the minimum distance spacing requirements for Class A facilities (See Second Report

and Order, MM Docket 88-375, 4 FCC Rcd 6375 (1989)). Therefore, the WFFH/WJJM-FM short-spacing is governed by Section 73.213(c) of the FCC Rules.

In accordance with Section 73.213(c)(1) of the FCC Rules, the WFFH(FM) ERP/HAAT combination proposed herein produces a predicted 0.05 mV/m (34 dBu) F(50,10) field strength contour distance of 98 kilometers. The minimum distance spacings contained in Section 73.213(c)(1) of the FCC Rules, requires WFFH(FM) to be located at least 64 kilometers from WJJM-FM. The transmitter site proposed herein is 64.54 kilometers from WJJM-FM. Accordingly, WFFH(FM) satisfies the provisions of Section 73.213(c)(1) with respect to WJJM-FM.

#### TECHNICAL FACILITIES

The applicant proposes to use install a three bay, one-half wavelength spaced, nondirectional transmitting antenna on an existing tower structure. A type-accepted transmitter of adequate power for the required Transmitter Power Output (TPO) will be used.

#### PREDICTED COVERAGE CONTOURS

The predicted coverage contours were calculated in accordance with the method described in Section 73.313 of the Rules utilizing the appropriate F(50,50) propagation curves from the Rules (Section 73.333, Figure 1), effective radiated power, and antenna height above average terrain as determined for each profile radial. Average terrain data

from the proposed site was obtained from a National Geophysical Data Center 3-Second Point Topographic Database. The geographic coordinates and ground elevation at the proposed site were obtained from FCC Antenna Structure Registration data. The WFFH(FM) antenna height above average terrain, as calculated from the proposed transmitter site using the 3-second terrain database on the eight cardinal radials, is 93 meters.

As shown in Exhibit 1, the 3.16 mV/m (70 dBu) city-grade contour encompasses 81.5% of Smyrna, the WFFH(FM) community of license. Because the instant proposal would provide at least 80% of Smyrna with the required 70 dBu contour coverage, a waiver of Section 73.315(a) is not required [See John R. Hughes, 50 Fed. Reg. 5679 (February 11, 1985). Also see Southwest Communications, Inc., released July 16, 1986 (Letter from the Chief, FM Branch, Ref. 8920-HVT)].

#### BLANKETING AND INTERMODULATION INTERFERENCE

In the event that blanketing interference occurs, the applicant will take appropriate steps, as required by FCC rules, to minimize the interference within the blanketing contour. Further, the applicant accepts the responsibility to alleviate any new intermodulation interference, including receiver induced, resulting from the instant proposal combined with a broadcast facility located within ten kilometers of the proposed site.

In accordance with Commission precedent (See WKLX, Inc., 6 FCC Rcd 225 (1991)) the applicant will exclude both mobile and battery-powered receivers from Receiver

Induced Third Order Intermodulation and Blanketing Interference Resolution Requirements. In the event any type of intermodulation interference occurs with any other facilities which have not been identified, the applicant will take appropriate steps (i.e., install and maintain traps or filters) to minimize the interference in fixed receivers. The applicant will respond to complaints of blanketing interference for a period of one year in compliance with Section 73.318(b) of the Commission's Rules.

#### FAA NOTIFICATION AND TOWER REGISTRATION

The applicant proposes to side-mount the WFFH(FM) transmitting antenna on an existing support structure such that the overall height of the tower is not altered. As a result, Federal Aviation Administration notification is not necessary. The FCC Antenna Structure Registration Number for the existing tower is 1034248.

#### RADIOFREQUENCY IMPACT

Effective October 15, 1997, the FCC adopted its current guidelines and procedures for evaluating environmental effects of radiofrequency emissions. The current guidelines are generally based on recommendations by the National Council on Radiation Protection and Measurements (NCRP) in NCRP Report No. 86 (1986), and by the American National Standards Institute and the Institute of Electrical and Electronic Engineers, Inc. (IEEE) in ANSI/IEEE C95.1-1982 (IEEE C95.1-1991). The FCC guidelines provide a maximum permissible exposure (MPE) level for occupational or "controlled" situations, as well as

“uncontrolled” situations that apply in cases that affect the general public. The FCC’s Office of Engineering and Technology (OET) Commission issued technical bulletin (OET Bulletin No. 65) entitled, "Evaluating Compliance with FCC Guidelines for Human Exposure to Radiofrequency Electromagnetic Fields" (Edition 97-01, August 1997) to aid in the determination of whether FCC-regulated transmitting facilities, operations or devices comply with limits for human exposure to radiofrequency electromagnetic fields as adopted by the Commission in 1996. The OET Bulletin contains technical information for evaluating compliance with FCC policies and guidelines.

The current FCC MPE level for “uncontrolled” environments is  $200\mu\text{W}/\text{cm}^2$  for FM facilities. The MPE level for FM facilities in a “controlled” environment is  $1000\mu\text{W}/\text{cm}^2$ .

Radio station WFFH(FM) will operate with a maximum circularly polarized ERP of 3.2 kW from a nondirectional transmitting antenna with a centerline height of 53 meters above ground level (AGL). Based on worst-case considerations, the proposed WFFH(FM) facility produces a maximum predicted power density at two meters above ground level of  $82.2\mu\text{W}/\text{cm}^2$  which is 41.1% of the new FCC guideline value for “uncontrolled” environments.

#### OCCUPATIONAL SAFETY

Based on the calculations discussed above, the proposed facility would contribute a predicted power density which represents 8.2% of the FCC guideline value in “controlled” environments. WFFH(FM) will reduce power and/or cease operation during times of

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service or maintenance of the transmission systems as necessary to avoid potentially harmful exposure to personnel. The base of the tower will be fenced to preclude casual access to the tower and warning signs will be posted at appropriate intervals.

In light of the above, the proposed WFFH(FM) facility should be categorically excluded from RF environmental processing under Section 1.1307(b) of the Commission's Rules.

SUMMARY

It is submitted that the proposal described herein complies with the Rules and Regulations of the Federal Communications Commission. This statement, FCC Form 301, Section III, and the attached exhibit were prepared by me or under my direct supervision and are believed to be true and correct.

DATED: May 13, 2004

  
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William J. Getz