



Federal Communications Commission
Washington, D.C. 20554

September 9, 2022

Sent via Electronic Mail

University of North Carolina
P.O Box 14900
Research Triangle Park, NC 27709
fcc_notice@pbsnc.org

Request for Experimental STA
W19DB-D, Franklin, NC
Facility ID No. 168592
File No. 0000198204

Dear Licensee:

This letter is in reference to the above captioned application for experimental authority filed the University of North Carolina (UNC), licensee of low power television translator station W19DB-D, Franklin, North Carolina (W19DB or Station).¹ For the reasons below, we grant UNC's request for experimental authority through December 30, 2022.

UNC requests experimental authority to intermittently transition the Station between ATSC 3.0 and ATSC 1.0 broadcast operations for purposes of testing an ATSC 3.0-based emergency responder paging system currently being developed pursuant to an innovation grant from the U.S. Department of Homeland Security.² UNC states that "the paging system will provide emergency responders 'with improved pager coverage capacity, quicker dispatching, and overall improved situational awareness.'"³ UNC has already conducted testing over its ATSC 3.0-licensed facilities, WUNK-TV, which covers relatively flat, coastal terrain.⁴ The proposed testing under the instant Experimental Request is aimed at testing the paging system in mountainous terrain, such as that covered by W19DB.⁵

Testing would occur for a limited period during two testing periods between September 12, 2022 and December 2, 2022.⁶ The first testing period will start on or about September 12, 2022, lasting for a period of five days.⁷ The second testing period will begin a several weeks later and last for up to two weeks.⁸

¹ See LMS File No. 0000198204 (filed Aug. 23, 2022), as amended Sept. 6, 2022 (Experimental Request).

² Experimental Request, ATSC 3.0 Request for Experimental Authority at 2.

³ *Id.* According to a DHS News Release the system will provide emergency responders "with improved pager coverage capacity, quicker dispatching, and overall improved situational awareness." News Release: DHS Awards \$981K to N. Carolina Small Business for Digital Paging Technology, U.S. Department of Homeland Security (Aug. 17, 2021) ("DHS News Release") available at <https://www.dhs.gov/science-andtechnology/news/2021/08/17/news-release-dhs-awards-981k-n-carolina-small-business>. See also Experimental Request at Exhibit A, ATSC 3.0 as a Use Case for Public Safety Communications – Development Milestones (copy of a white paper authored by UNC and its partners on the paging system).

⁴ Experimental Request, ATSC 3.0 Request for Experimental Authority at 3.

⁵ *Id.*

⁶ *Id.* at 1-2.

⁷ *Id.* at 2.

⁸ *Id.*

According to UNC the time between the two testing periods are necessary to perform updates to the software and/or hardware of the paging system in response to the initial test.⁹ During the period of “down time” between the two 3.0 transmission periods, UNC will revert the Station to full-time ATSC 1.0 operations.¹⁰ Other than the transition of the Station’s operations to ATSC 3.0 during the two testing periods, the Station will continue to broadcast with its licensed technical parameters.¹¹

UNC will not simulcast W19DB-D in an ATSC 1.0 format during the two ATSC 3.0 testing periods. However, multiple other TV translators licensed to UNC overlap the area served by W19DB.¹² Therefore, even during the ATSC 3.0 testing periods approximately 98.3 percent of W19DB’s viewers will continue to be served and receive the same ATSC 1.0 programming that would be transmitted by W19DB.¹³ The limited number of viewers that will lose ATSC 1.0 service will only be impacted for a limited duration of time and such programming will still be available via multichannel video programming distributors (MVPDs), the Internet, and various over-the-top services.¹⁴ UNC commits to notify viewers by airing daily crawls in advance of its ATSC 3.0 operations.¹⁵ UNC also states that the Station is not carried by any MVPDs and thus asserts that it is not necessary to notify any MVPD of the Station’s proposed ATSC 3.0 operations.¹⁶

Upon a review of the application, we conclude that the request complies with the Commission’s requirements for an experimental authorization and the public interest would be served by grant of UNC’s request. We find that UNC has proposed a definite program of research and experimentation; stands ready to proceed with such research; is not expected to cause any objectional interference; and the information that is likely to be gathered from the experiment is likely to be valuable to broadcasters and public safety entities in order to understand of how the ATSC 3.0 standard can be used for new and innovative services.¹⁷ Any loss ATSC 1.0 service by viewers during the limited periods of ATSC 3.0 operation will be limited and offset by viewers ability to receive the programming in an ATSC 1.0 format from other sources including commonly owned stations that overlap W19DB’s service area.

Accordingly, the experimental authority requested by UNC for experimental authority **IS GRANTED through December 30, 2022**, subject to the provisions of Part 5, Subpart D of the Commission’s rules (Rules), any commitments made by UNC in the application, and the following conditions.¹⁸

1. Should any issues or conditions arise during the authorization period that prevent or inhibit the licensee from conducting its experimentation, UNC shall inform the Video Division of them at the time they occur. If experimentation is to be discontinued prior to the prior to the authorization’s expiration date, UNC must promptly notify the Video Division of the date it will be terminating its

⁹ *Id.*

¹⁰ *Id.*

¹¹ *Id.*

¹² *Id.*, Experimental Request, Amendment at 1.

¹³ *Id.* at 2 and 4.

¹⁴ *Id.* at 2.

¹⁵ *Id.*, ATSC 3.0 Request for Experimental Authority at 2.

¹⁶ *Id.*

¹⁷ See 47 CFR § 5.205; Experimental Request, ATSC 3.0 Request for Experimental Authority at 3-5.

¹⁸ See 47 CFR §§ 5.201-5.219.

experimentation. Such notifications must be sent within 10 business days via electronic mail to Kevin Harding at Kevin.Harding@fcc.gov.

2. Grant of the instant this authorization does not represent that W19DB-D would be granted a license to transmit a licensed ATSC 3.0 signal pursuant to the Commission's rules.¹⁹ To the extent UNC seeks such authority in the future, W19DB-D eligibility for an ATSC 3.0 license will be evaluated at the time of application.
3. Any broadcaster equipment or end-user devices must receive (as applicable) the necessary Commission equipment authorizations prior to use.
4. With ample time before commencing operation, UNC must make good faith effort to identify and notify health care facilities (e.g., hospitals, nursing homes, etc.) within the experimental station's service area that may potentially be affected by its operation.²⁰
5. The Station must provide on-air Public Service Announcements (PSAs) or crawls starting at least 72 hours prior to the start of any ATSC 3.0 testing period. The PSA or crawl must be aired at least (3) times per day reasonably spread-out between the hours of 7:00 a.m. and 11:00 p.m. Each PSA or crawl must be provided in the same language as a majority of the programming carried by the Station. Each PSA or crawl must provide all pertinent information to consumers, including but not limited to the approximate date(s) and times when testing is expected to occur and where viewers may find any programming that would be aired by the Station in an ATSC 1.0 format.
6. This experimental authorization is secondary and may be immediately modified or terminated if the operation causes interference to any other broadcast facility or UNC fails to comply with any conditions of grant. The Video Division may also modify the terms of or terminate this authorization for any other reason upon written notice.
7. There is no expectation of renewal of this authorization. Any request for renewal must be submitted in accordance with the requirements of Part 5, Subpart D of the Commission's rules.
8. Pursuant section 5.203(d) of the Rules,²¹ within 30 days of the conclusion of experimentation or expiration of the authorization (whichever occurs first) we require that a report be filed with the Video Division. The report must contain the information required by section 5.207(a)-(i) of the Rules.²² The report should be submitted to Kevin Harding electronic mail at Kevin.Harding@fcc.gov.

Sincerely,

/s/

Kevin R. Harding
Associate Chief, Video Division
Media Bureau

Cc (via electronic mail): Coe Ramsey, Esq.

¹⁹ See 47 CFR § 74.782.

²⁰ See 47 CFR § 15.242(a)(1).

²¹ 47 CFR § 5.203(d).

²² 47 CFR § 5.207(a)-(i).