

FEDERAL COMMUNICATIONS COMMISSION

CLASS OF STATION Noncommercial Educational FM

The following application is submitted for action by the Chief, Broadcast Bureau

<u>FILE NO.</u>	<u>APPLICANT &amp; LOCATION</u>	<u>CALL LETTERS</u>	<u>NATURE OF APPLICATION</u>
BPED-1816	Back Porch Radio Broadcasting Incorporated Madison, Wisconsin.	N E W	Construction permit for a new noncommercial educational FM broadcast station.  Frequency: 89.7 megahertz, No. 209. Effective radiated power: 2.85 kw. Antenna height above average terrain: 149 feet.

CHANGED TO BUREAU STAFF ACTION  
PER DELEGATED AUTHORITY.

CHIEF, LICENSE DIVISION

Recommendation: Grant (X) Construction dates, Start \_\_\_\_\_ End \_\_\_\_\_

Grant in accordance with the attached specifications.

FM stencil:

- - - MADISON, WISCONSIN 89.7MHz  
 Back Porch Radio B/Cin., Inc. E  
 1kw 2.85kw 150ft ---/159  
 Lat 43-04-34 Long 89-23-09 CP

GRANTED

NOV 14 1974

NOV 14 1974

Approved \_\_\_\_\_

For Chief, Broadcast Bureau

**BPED-1816**

**Applicant:** Back Porch Radio Broadcasting Incorporated

**Station location:** Madison, Wisconsin

**Transmitter site:** 101 E. Mifflin Street, Madison, Wisconsin  
North latitude: 43° 04' 34".  
West longitude: 89° 23' 09".

**Studio site:** To be determined, Madison, Wisconsin.

**Transmitter:** RCA, Type No. BTF-3.

**Antenna system:** Gates, Type No. FMA-3, three sections,  
mounted on a mast erected on the roof  
of a building.  
Overall height above ground: 159 feet.

Obstruction marking of antenna structure not required.

Transmitter may be operated by remote control from the main studio at a site to be determined in Madison, Wisconsin.

Subject to submission of sufficient data in accordance with section 79.530 of the Commission's rules for type acceptance of the transmitter.

**Frequency:** 89.7 megahertz, Channel No. 209.

**Transmitter power output:** 1 kw.

**Effective radiated power:** 2.85 kw.

**Antenna height above average terrain:** 150 feet.

NOV 4 1974

8-30-74

NONCOMMERCIAL EDUCATIONAL FM BROADCAST

Applicant: Back Porch Radio Broadcasting Incorporated  
 Station location: Madison, Wisconsin  
 Call letters: N E W.  
 File No.: BPED-1816  
 Date filed: May 3, 1974  
 Date amended: August 16, 1974 (not a major amendment).  
 October 15, 1974 (not a major amendment).

NATURE OF REQUEST:

Construction permit for a new noncommercial educational FM broadcast station.  
 Requests: 89.7 megahertz, Channel No. 209; 2.85kw; 149 feet.

Commission Action:

Mailing Address:

Back Porch Radio Broad-  
 casting, Inc.  
 RR 2, Midtown Road  
 Madison, Wisconsin 53711

Engineering Counsel:

None.

Legal Counsel:

Robert Jay Stein  
 1712 N Street, N. W.  
 Washington, D.C. 20036

COMMUNITY WHERE STATION IS TO BE LOCATED:

The population of the city of Madison, Wisconsin, is 172,007. There presently are 5 AM, 4 TV, 4 commercial FM, and 1 other noncommercial educational FM broadcast stations in Madison. No other FM applications are pending for stations there.

(studio site: to be determined, Madison, Wisconsin).

INTERFERENCE:

Based on the F(50,50) and F(50,10) curves, operation as proposed will result in no interference with any existing or proposed FM broadcast stations involving infringement of 1 mv/m contours.

PROPOSED TRANSMITTER SITE:

Site described as: 101 E. Mifflin Street, Madison, Wisconsin.  
North latitude: 43° 04' 34".  
West longitude: 89° 23' 09".

Obstruction marking of the antenna structure is not required.

PROPOSED ANTENNA SYSTEM:

Make: Gates.  
Type No.: FMA-3.  
Sections: Three.  
Overall height above ground: 159 feet.  
Overall height above mean sea level: 1,074 feet.

The FM antenna is to be mounted on a mast erected on the roof of a building.

EQUIPMENT:

The proposed RCA, Type No. BTF-3, 3-kw transmitter is not type accepted. A grant of this application should contain a condition requiring submission of data for type acceptance of this transmitter.

ADDITIONAL ENGINEERING COMMENTS:

It is proposed that the transmitter be operated by remote control from the main studio at a site to be determined in Madison, Wisconsin.

RECOMMENDED ACTION:

It is recommended this application be granted in accordance with the following terms and conditions:

1. Frequency: 89.7 megahertz, Channel No. 209.
2. Transmitter power output: 1 kw.
3. Effective radiated power: 2.85 kw.
4. Antenna height above average terrain: 150 feet.
5. Obstruction marking of antenna structure not required.
6. Transmitter may be operated by remote control from the main studio at a site to be determined in Madison, Wisconsin.
7. Subject to submission of sufficient data in accordance with section 73.550 of the Commission's rules for type acceptance of the transmitter.

Report made by: EAD

Date: 8-16-74

Madison, Wisconsin

8-16-74

206 - OK

207 - OK

208 - OK

209 - WUWH, Milwaukee (4/140) 76 OK

WUWH pend., Milwaukee (1.5/871) 76 OK

210 - WHDF, Milton (10w) 30.7 OK

211 - OK

212 - OK

$$\begin{array}{r} 209 \\ \hline 53 \\ \hline 262 - 263 \\ \text{IF-OK} \end{array}$$

2.85/214	$\frac{1}{11.8}$	$\frac{.5}{18}$	$\frac{.1}{43}$
(max.)			

ANTENNA AND SITE INFORMATION  
(see instruction B, Section 1)

Name of applicant  
**Back Porch Radio Broadcasting, Inc**

Legal Counsel  
**Robert Stein, 1712 N St. N.W.**  
Address  
**Washington, D.C. 20036**

Purpose of application (Check appropriate box) *BPED-1816*  
 a. New antenna construction  **XXX**  
 b. Alteration of existing antenna structures   
 c. Change in location

Consulting Engineer  
**None**  
Address

2. Features of surrounding terrain  
List any natural formations or existing man-made structures (hill, trees, water tanks, towers, etc.) which, in the opinion of the applicant, would tend to shield the antenna from aircraft and thereby minimize the aeronautical hazard of the antenna.

Class of station  
**Educational FM**

Facilities requested  
**New station**

The Wisconsin State Capital building, which is over 100 feet taller than our proposed antenna and is brightly lit at all times, is located across the street - 200 feet south - from our proposed antenna site.

1. Location of antenna  
State: **Wisconsin** County: **Dane** City or Town: **Madison**

Exact antenna location (street address) (If outside city limits, give distance and direction from, and name of nearest town)  
**101 E Mifflin Street**

Submit as Exhibit No. 15 a chart on which is plotted the location of the antenna site, and also the relative location of the natural formations and/or the existing man-made structures listed above.

Geographic coordinates (to be determined to nearest second. For directional antenna give coordinates of center of array.)  
For single vertical radiator give tower location.

North latitude: **43° 4' 34"** West longitude: **89° 23' 9"**

The chart used shall be an Instrument Approach Chart (or the Landing Page or General Use Chart), or a Sectional Aeronautical Chart, choice depending upon proximity of the antenna site to landing areas. 1/ In general, the Sectional Aeronautical Chart should be used only when the antenna site is more than 10 miles from a landing area or when an Instrument Approach Chart is obtainable. 1/ These charts may be purchased from the U.S. Coast and Geodetic Survey, Washington 25, D.C. 1/ Exception - Where the proposed antenna site is within the boundary of a landing area for which an Instrument Approach is available, submit a self-made, large scale map showing antenna site, runway(s) and existing man-made structures listed above.

3. Designation, distance, and bearing to center line of nearest established airway within 5 miles  
**V-341 is 2 miles N315° from site**

4. List all landing areas within 10 miles of antenna site. Give distance and direction to the nearest boundary of each landing area from the antenna site.

Landing Area	Distance	Direction
(a) <b>Madison - Truax Field</b>	<b>4.7 miles</b>	<b>N 35° (NNE)</b>
(b) <b>Middleton - Morey Airport</b>	<b>7.8 miles</b>	<b>N 285° (WNW)</b>
(c)		

5. Description of antenna system (If directional, give spacing and orientation of towers).  
**Horizontally polarized ring radiators mounted on 30' steel mast.**

Type	NO OBSTRUCTION MARKING OR LIGHTING					
Description of tower(s)	Guyed		Tubular (Pole) <b>XXX</b>			
	#1	#2	#3	#4	#5	#6
Tower (height figures should include obstruction lighting)						
Height of radiating elements	159					
Overall height above ground	159					
Overall height above mean sea level	1074					

If a combination of Standard, FM, or TV operation is proposed on the same multi-element array (either existing or proposed) submit as Exhibit No. a horizontal plan for the proposed antenna system, giving heights of the elements above ground and showing their orientation and spacing in feet. Clearly indicate if any towers are existing.

Submit as Exhibit No. II a vertical plan sketch for the proposed total structure (including supporting building if any) giving heights above ground in feet for all significant features. Clearly indicate existing portions, noting painting and lighting.

Is the proposed antenna system designed so that obstruction lights may be installed and maintained at the uppermost point(s)?

6. Is the proposed site the same or immediately adjoining the transmitter-antenna site of other stations authorized by the Commission or specified in another application pending before the Commission? Yes  No

If the answer is "Yes", give: CALL LETTERS \_\_\_\_\_ FILE NUMBER \_\_\_\_\_

I certify that I represent the applicant in the capacity indicated below and that I have examined the foregoing statement of technical information and that it is true to the best of my knowledge and belief.

**2/12/74** (date) Signature *Michael...*

Technical Director  Chief Operator  Registered Professional Engineer  Consulting Engineer

BPED-1816

# Madison, Wisconsin

Eq. Const. Costs —	\$3200
Est. Ann. Oper Costs	6800
Total Req'd	<u>10,000</u>

Utilize donations, & loans —

Applicant has a loan (personal) from Mike O'Connor totaling up to \$10,000 to construct & operate —  
~~All equipment~~ — A major portion of the equipment has been donated & only \$3200 required for that purpose as shown —

M. O'Connor's Financial Statement of 1/25/74 shows adequate liquidity to meet a \$10,000 loan —  
However, the loan itself does not meet the test in that it fails to state ① Rate of interest, ② terms of repayment, ③ collateral requirement. —

APPLICANT: Back Porch Radio Broadcasting, Incorporated FILE NO.: BPEP-1, M6

LOCATION: Madison, Wisconsin

I. The applicant is:

- A. a public educational institution operating under the laws of \_\_\_\_\_, which permit the construction and operation of broadcast stations.
- B. a private educational institution organized under the laws of Wisconsin, and has articles of incorporation that permit the construction and operation of broadcast stations.
- C. an educational organization organized under the laws of \_\_\_\_\_. The articles of incorporation indicate that the organization is primarily for educational purposes and that the construction and operation of broadcast stations is permitted.

II. The applicant is governed by a Board of Directors which has 3 members, all of whom are citizens of the United States.

III. The applicant has the following broadcast interests:

<u>Station</u>	<u>Location</u>
<u>N/A</u>	

The station(s) is (are) not on deferred renewal and there are no significant unresolved complaints as of \_\_\_\_\_.

IV. The applicant's officers and directors have the following broadcast interests:

<u>Station</u>	<u>Location</u>
<u>WHA-FM</u> <u>(Employees)</u>	<u>Madison, Wisconsin.</u>

The station(s) is (are) not on deferred renewal and there are no significant unresolved complaints as of \_\_\_\_\_.

V. The applicant is ~~(not)~~ required to file a section VI, and its equal employment plan appears designed to assure nondiscrimination in recruiting, selection and hiring, placement and promotion, and other areas.

VI. Date on which the applicant's governing body authorized the filing of this application, if applicable: Dec. 17, 1973.

VII. A broadcast week of at least 90 hours is proposed. The station will be staffed by 2 fulltime and 2 parttime employees, ~~Students will also assist.~~ and volunteers.

VIII. Recommend grant: \_\_\_\_\_