

Before the
FEDERAL COMMUNICATIONS COMMISSION
Washington, D.C. 20554

In the Matter of)
)
Commission's Rules to Permit)
Digital Broadcasting on) Docket No.: **99-325**
AM Broadcast Stations and on)
FM Broadcast Stations)

COMMENTS OF JOHN PAVLICA, JR.

As an American consumer, as an electrical engineer, and as a licensed Amateur Radio operator, I respectfully submit my comments and opinions regarding the iBiquity In Band On Channel (IBOC) – "HD radio" broadcasting on the existing AM band and FM band, and digital broadcasting in general, now that we have actually heard "HD" radio transmissions over the air on the AM band.

As I've said before, analog AM radio broadcasting is a great service to the general public, and remains a faithful servant during times of emergencies and disasters. The 2005 hurricane season proved just how valuable a clear channel class AM station is to people in need (WWL). An old AM transistor radio provides many hours of use on a single battery, unlike the digital receivers of today that are still very power hungry (HD-IBOC and satellite radio). AM stations have a great gift (that is to some AM stations a curse) – and that is the fantastic long-range reception available to the public at night by analog AM radio. During disasters, very large areas are afforded

coverage by a single AM station, and AM radio stations need to continue to service the public without interference from IBOC adjacent channel digital hash, noisy traffic signals not meeting FCC Part 15 requirements, or possibly even BPL.

That being said, during daylight hours I have observed the audio from WEOL (930 KHz) being 'wiped-out' by IBOC "hash" from WWJ (950 KHz). I have observed WOWO (1190 KHz) being 'wiped-out' by digital hash from 1200KHz in Detroit. I have observed CHWO (740 KHz) Toronto obliterated by digital "hash" from WJR on 760KHz until their IBOC was shut-off, then, AM740 came in 'loud and clear'. This is daytime reception – one could only imagine how horrible the digital interference would be at night if several adjacent stations were in IBOC. IBOC test transmissions on 1530 KHz from Cincinnati at night did show how devastating just a one-minute blast of IBOC can be to first and second adjacents, and even unto itself. It is clear from my simple over-the-air observations, that the current IBOC HD system from iBiquity is unacceptable and unusable in its current form on the AM broadcast band in the United States. The good of the many, outweigh the good of the one, or the few; therefore, analog broadcasting should continue on the AM band without the horrible digital hash on the 2 adjacent channel sidebands above and below the carrier frequency.

What do we do about the current state on the AM broadcast band then? May I offer the commission the following suggestions:

1) Analog AM broadcasts are too important to be polluted with digital hash; therefore, I request that the FCC prohibit any further iBiquity IBOC broadcasts, in its current form, effective immediately. AM IBOC at night is totally out of the equation due to skywave interference.

2) Perhaps there is a way that the existing iBiquity IBOC HD transmitters can be reconfigured to transmit using spectrum-friendly C-Quam AM stereo, DRM, CAM-D, or reconfigured for a very small amount of digital data on the main carrier frequency only for emergency messaging with a much narrower bandwidth and level.

3) I highly suggest that the FCC mandate a receiver standard requiring any radio with IBOC-FM to include an AM receiver section meeting AMAX specifications (7.5KHz audio bandwidth, digital noiseblanker). Perhaps that standard could even mandate an option that anyone of the following be included: C-Quam stereo, Kahn CAM-D, or DRM reception if FM IBOC is included.

4) Encourage all FM IBOC stations to give (or to rent) an FM HD2 or HD3 subchannel to AM stations in the same market.

5) AM stations be given FM stereo translator preference (but only those stations under 10KW).

It is my opinion that the current iBiquity IBOC HD radio on the AM band is too wide, too noisy and unsuitable for use on the analog AM band. Testing in Michigan and in Florida using the Boston Acoustics Receptor Radio has indicated that the 'enhanced' HD on AM works only very close to the AM transmitter, and nowhere near the range of the analog broadcast during the day. There are way too many legacy analog AM receivers that need to continue to function without digital interference. That being said, AM receiver standards must be mandated to improve AM reception when an FM-IBOC receiver is present in the same device, as well as the commission enforcing manufacturers to limit RF noise generated on the AM broadcast band by offending devices (such as LED traffic signals, power companies, etc...).

In my opinion, based on current iBiquity AM-IBOC HD over the air broadcasts, IBOC HD radio is unsuitable for the AM broadcast band, and, other options as outlined above, should be utilized.

Once again, thank you for allowing me to voice my opinions and suggestions.

Respectfully submitted,

John Pavlica, Jr.