Guidance for Submission of BPL Interference Complaints

Several commercial companies are conducting field trials of Broadband over Power Lines (BPL) in locations throughout the United States. Some of these systems may be operating within existing Federal Communications Commission Part 15 limits. However, most have been granted Part 5 experimental licenses by the FCC permitting them to use higher levels. Whether operating under Part 15 or 5, BPL operators are required to cease operation if their systems cause harmful interference.

On April 23, the FCC adopted an *Inquiry Regarding Carrier Current Systems, including Broadband over Power Line Systems*, under ET Docket No. 03-104. This Notice of Inquiry asks numerous questions how BPL could operate and seeks information about potential interference to licensed radio services. ARRL, other Amateur Radio organizations and many individual amateurs have commented in this proceeding.

Whether during the experimental trials or ongoing BPL operation, it is necessary that any instances of harmful interference to amateur receiving systems be promptly reported to the local power company and to the FCC. It is important that each interference complaint be a valid case of actual harmful interference. It is possible to misidentify other noise sources as BPL. Filing invalid reports (ie, crying wolf) could be harmful and must be carefully avoided. Amateurs having an interference complaint should preferably have the interference witnessed locally by a technically qualified observer (such as an ARRL Technical Coordinator, Technical Specialist, local-club interference committee), then ask the ARRL Laboratory to review it for technical accuracy and proper form before submitting it to the FCC.

There are several different types of BPL signals. The system in Manassas, VA is a direct-sequence, spread-spectrum system made by Main.Net. This system generally has a very staccato popping sound that has been described as sounding like a Geiger counter. Other Main.Net systems continuously occupy spectrum between 5 and 25 MHz or so. The onset vs frequency is rather abrupt, occurring near 5 MHz over about 100 kHz, and tapering off just as rapidly on the other end. In ARRL's video of BPL interference in four trial cities, "Trial Area #3" is a Main.Net system. See http://www.arrl.org/tis/info/HTML/plc/#video.

Draft complaints should be e-mailed to rfi@arrl.org or sent to the ARRL RFI Desk, 225 Main St., Newington, CT 06111. Include a recording of the interference, either on cassette tape or to a .wav file. The Laboratory staff can analyze the recording to identify it as a BPL signal.

Complaints should be sent to the FCC, as follows:

Federal Communications Commission
James R. Burtle
Chief, Experimental Licensing Branch
Telephone: 202 418-2445
E-mail: jburtle@fcc.gov

Federal Communications Commission
David H. Solomon
Chief, Enforcement Bureau
Telephone: 202 418-7450
E-mail: dsolomon@fcc.gov

Send a copy of your interference report to Riley Hollingsworth, Special Counsel, Technical and Public Safety Division, Enforcement Bureau, FCC (Gettysburg, PA), telephone 717 338-2502, e-mail rholling@fcc.gov and to the ARRL RFI desk at w1rfi@arrl.org. If you send copies to others, it is best to do so separately, so the FCC staff receiving your complaint do not mistakenly believe that they are receiving only a courtesy copy.