

Application for Special Temporary Authorization

This request for Special Temporary Authorization is made in accordance with CFR 47, FCC Part 5.56. The required information stated in 5.56(b) is as follows:

1. Name and address of applicant:

- Washington Laboratories
7560 Lindbergh Drive
Gaithersburg, MD 20879

2. Need for special action:

- Perform radiated immunity testing on industrial equipment. Size and weight of equipment necessitates performance of testing outside of shielded enclosure.
- The model name of the equipment under test is the Gas-Fired Carbon Treatment Furnace. The unit heat-treats mechanical parts.

3. Type of operation to be conducted:

- Perform radiated immunity testing from 80 MHz to 1000 MHz, as allowed.

4. Purpose of operation:

- To determine effect of RF fields on operation of subject equipment. This requirement is necessitated by the European Union EMC Directive.

5. Time and date of proposed operation:

- Testing will be conducted sometime between 12 October 1998 through 12 January 1999. Testing will be performed on a non-continuous basis for approximately 8 hours during this time. Time-of-day will be between 8:00 A.M. and 5:00 P.M.

6. Class of station, call sign of station and nature of service:

- XD FX
- Experimental

7. Location of proposed operation.

Surface Combustion, Inc.
1700 Indian Wood Circle
Maumee, OH 43527-8980

8. Equipment to be used, including manufacturer, model and number of units:

- Signal Generator (one): HP 8648C Signal Generator
- Power Amplifier (one): IFI SMX-1000
- Biconical Antenna (one): Electromechanics 3104P
- Log Periodic Antenna (one): Electromechanics 3146

9. Frequencies desired:

- 80 MHz - 1000 MHz

10. Plate power input to final RF stage:

- 1.65W ERP

11. Type of emission:

A31 (80% AM modulated 1 kHz tone)

12. Overall height of antenna structure above ground:

- 2 meters