

# 2B Technologies, Inc.

*An InDevR Company*

Technical Note No. 021

## Quick Start Guide for Using the Model 202 Ozone Monitor™ to Detect Partial Discharges

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Author: Craig Williford

**Purpose:** The Model 202 Ozone Monitor has been demonstrated to be useful in detecting the presence of surface partial discharges for large rotating machines such as motors and electrical generators and for monitoring changes in the severity of such discharges.

### Quick Start Procedure:

1. Remove monitor from package.
2. If using external battery to power instrument, charge battery using the battery charger for 13-14 hours.
3. Plug power supply into instrument. If using external battery, use supplied cigarette adapter to plug into instrument. If using wall power, plug supplied AC-DC converter into instrument.
4. Turn on power.
5. The instrument is now measuring ozone. Allow approximately 20 minutes for the instrument to warm up and the readings to stabilize.
6. The LCD on the front displays the current ozone reading every 10 seconds along with the temperature and pressure of the internal cell, and the date and time of each reading. The analog output BNC connector is located on the back side of the instrument. It is set by default to output 1 Volt for 200 ppb with a maximum output of 2.5 Volts. You may adjust the scaling of the analog output and the averaging times (10 s, 1 min, 5 min, 1 hr) in the menu.
7. Connect the length of supplied tubing to begin measuring ozone from desired location. Use the inlet to make ozone measurements at various exhaust air positions to isolate regions where surface partial discharges may be occurring. Repeated measurements may be made over time to monitor changes in the severity of the partial discharge.



Example of sampling ozone from the cooling air exhaust of a generator. Arrows show a typical monitoring position.

8. Refer to the user manual for additional details on use of the Model 202 Ozone Monitor.