



My Baker Instrument Company Advanced Winding Analyzer IV does not stabilize the resistance test lead readings on certain very large electric motors. The error message that comes back is:

“Resistance measurements are unstable. Check for noise sources nearby (welders, VFD’s, etc) or a free wheeling rotor”

“Instrument detecting excessive electrical noise”

This procedure may be used if the AWA works properly on any other motors and coils connected to it. It is certainly NOT going to fix a broken down or out of calibration machine. This procedure should only be performed to correct this SPECIFIC problem.

The AWA has a noise measurement algorithm in it, which is designed to allow in situ detection of free - wheeling motors, with fans and pumps connected. It is possible to confuse it in certain circumstances.

#### **Workaround:**

There are two methods available to alleviate the problem

- 1) Edit the C:\Winnt\Awa.ini file, can be done in the field. If this procedure is followed properly, will not alter the calibration in any way.
- 2) Calibrate the unit, which will edit the C:\Winnt\Awa.ini file, should only be performed by authorized technical personnel. Not recommended for field use.

#### **Item 1:**

- 1) Close the AWA application
- 2) Single RIGHT click “My Computer” – Explore
- 3) Browse to C:\Winnt\Awa.ini
- 4) Single RIGHT click Awa.ini – Copy – Paste into same folder. Will now add a file called Copy of Awa.ini. This file can be used for a backup if you mess up
- 5) Double LEFT click Awa.ini
- 6) Verify it opens in Notepad
- 7) The last line in the Awa.ini file shows: MaxPercentADC=10
- 8) \*Change this value with notepad to 30 (Now looks like: MaxPercentADC=30)
- 9) File – Save
- 10) Launch the AWA application, and re-run the test.

#### **Item 2:**

Should only be performed by authorized technical personnel, and is not recommended for field use.

**\*Baker Instrument Company recommended. Slightly smaller values between 10 and 29 may work, or larger values such as 40 may work, but larger values will excessively reduce the sensitivity of the equipment.**