

# Edwards Penning Gauge Cleaning Procedure

**Important, please read fully before attempting to clean the Gauge and make certain you have the required parts, a list which can be found at the end of the document.**

- 1 Switch off and vent vacuum system.
- 2 Remove mains power from system
- 3 Remove Cable from AIMX Penning Gauge.
- 4 Remove Penning Gauge electronics and cover by holding the black portion of the cover and twisting it counter-clockwise until it stops and remove by pulling apart.



- 5 Once the cover has been removed, using a large wrench, or crescent wrench, loosen the exposed nut.



- 6 At this point it will be necessary to remove the Gauge from the vacuum system by removing the six M6 nuts and bolts, using a 10mm wrench.
- 7 Once the Gauge has been removed from the system you can continue dismantling the Gauge by first removing the nut.



- 8 Next remove the ceramic spacer/insulator.



- 9 Next remove the Anode.



10 The Anode can be cleaned by using a fine abrasive paper (600 Grade) on the pin section and a fiberglass pen on the ceramic section, depending on the contamination.



11 Next remove the Copper gasket for replacement when re-assembling.





12 Next you need to turn the Gauge body over and remove the retaining Circlip using pliers, then remove the Cathode tube.



13 The body should then be turned over so the Cathode plate can be removed from the body, which should fall out.



- 14 The Cathode plate, and Cathode body both inside and out can then be cleaned using a fine abrasive paper (600 Grade).
- 15 Once everything has been cleaned you will need to re-assemble it in the reverse order in which you dismantled it, using a New Copper Gasket for the internal seal (DN-16-CF) and also for the seal to the chamber (DN-35-CF).

Parts required prior to cleaning:-

- 1 Large Wrench or Crescent Wrench
- 2 10mm Wrench (2 would be preferable)
- 3 600 Grade abrasive paper.
- 4 Fiberglass pen, available from most electronic suppliers.
- 5 Circlip pliers.
- 6 New Copper Gasket DN-35-CF (Hidden Part Number 3021015 per pack of 5)
- 7 New Copper Gasket DN-16-CF (Hidden Part Number 3021014 per pack of 5)

**If you are unable to carry out this procedure you can return the complete Gauge to our Service Department for cleaning, please contact [Ian.Tyrer@hiddeninc.com](mailto:Ian.Tyrer@hiddeninc.com) to arrange for the return.**