

# **Plasma disinfection and the deterioration of surgical tools at atmospheric pressure plasma**

## **Abstract:**

The purpose of this paper is to present and compare disinfection effect of plasma by means of Atmospheric Pressure Glow plasma and streamer discharge. *Geobacillus stearothermophilus* was used as biological indicator for disinfection process. The effect of blades after irradiated in plasma was also studied by SEM analysis. It was found that the disinfection process was effective when the cylindrical configuration was applied. Carbon steel blade was also found to be deteriorated after immersed in plasma irradiation. Results indicate that disinfection can be achieved and at the same time deteriorations of the tools were observed.