

Effectiveness of Pre Procedural Rinse with Chlorhexidine and Povidone-Iodine in Preventing Bio Aerosol Contamination during Ultrasonic Scaling – A Clinical and Microbiological Study

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Abstract

Aerosol is defined as small droplet usually 5µm or less in diameter, which can remain suspended in air for some time. The aim of the study is to compare the virtue of Chlorhexidine and Povidone-iodine solution as a pre-procedural mouth rinse in reducing bio-aerosol contamination during ultrasonic scaling. The study included 30 systemically healthy patients in different age groups. Patients were divided into two groups. Group I received pre procedural rinse with Chlorhexidine and group II with Povidone-iodine solution. The aerosols produced during the ultrasonic scaling were collected on blood agar plates and were sent for culture. Results showed that colony forming units in group I were significantly reduced compared to group II. The study concluded that pre procedural rinse with chlorhexidine significantly reduces the bio-aerosol contamination and prevent cross infections.