



**ESTIMATION OF INTERLEUKIN-6 IN MODERATE TO SEVERE
CHRONIC PERIODONTITIS IN TYPE 2 DIABETIC PATIENTS
- A CLINICO-BIOCHEMICAL STUDY**

by

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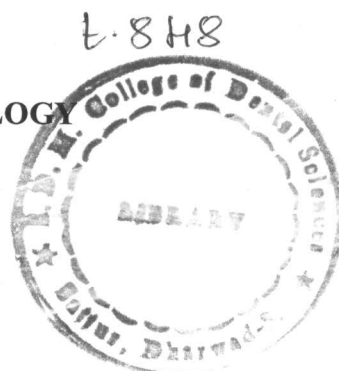
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ABSTRACT

Background and objectives: In patients with type 2 diabetes there is increased progression of periodontal disease. This study evaluated whether the biochemical changes associated with type 2 diabetes modulates the expression of interleukin-6 [IL-6] in sites with chronic periodontitis.

Material and methods: The study included a total of 48 individuals who were divided into group1- systemically and periodontally healthy subjects, group 2 - systemically healthy subjects with moderate - severe chronic periodontitis and group 3 – type 2 diabetic subjects with moderate - severe chronic periodontitis. Gingival biopsies were harvested from these subjects during extraction and periodontal surgeries. The levels of IL-6 were assessed using ELISA.

Results: The levels of IL-6 were higher in presence of periodontal disease than in absence of inflammation regardless of the systemic status. In subjects with type 2 diabetes, the levels of IL-6 were significantly higher than in systemically healthy subjects with periodontitis.

Conclusion: Within the limits of the study, it was concluded that type 2 diabetes with periodontitis was associated with increased expression of interleukin-6. This over expression may be involved in increased periodontal destruction seen in type 2 diabetics.

Key words: Type 2 diabetes, interleukin-6 and periodontal disease.