ABSTRACT

Background: Type 2 diabetes mellitus is a significant public health concern. The association between Type 2 diabetes mellitus and periodontal disease is well documented. Currently, a large variety of classifications is used for periodontitis as a risk factor for other diseases. None of these classifications quantifies the amount of inflamed periodontal tissue, while this information is needed to assess the inflammatory burden posed by periodontitis. The author wants to research about periodontal inflamed surface area of patient with type 2 diabetes mellitus compare with non-diabetes mellitus using PISA measurement.

Purpose: The purpose of this research is to study the periodontal inflamed surface area of patients with type 2 diabetes mellitus compare with non-diabetes mellitus using PISA measurement.

Materials and Method: This research was held in Puskesmas Pucang Sewu Jalan Pucang Anom Timur No.72 Surabaya. Sample is divided in to two groups, 30 patients with type 2 diabetes mellitus and 30 non-diabetes mellitus. Each group is examined for their blood glucose and underwent full-mouth probing pocket depth and bleeding on probing assessment. The data will be inputted to PISA’s worksheet.

Result: The average PISA in patients with type 2 diabetes mellitus is 142,2 mm², whereas that non-diabetes mellitus is 36,9 mm². The difference between both group are significant because Mann Whitney test shows p value = 0,00 < 0,05.

Conclusion: Periodontal inflamed surface area of patients with type 2 diabetes mellitus is higher than non-diabetes mellitus.

Keywords: periodontal inflamed surface area (PISA), periodontitis, type 2 diabetes mellitus