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التوثيق الالكتروني والميكروفيلم

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قسم

نقسم بالله العظيم أن المادة التي تم توثيقها وتسجيلها

علي هذه الأقراص المدمجة قد أعدت دون أية تغيرات

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تحفظ هذه الأقراص المدمجة بعيدا عن الغبار

HOSSAM MAGHRABY

Comparative Evaluation of Buccal Fat Pad and Subepithelial Connective Tissue Graft in the Treatment of Localized Recession (Randomized Clinical Trial)

Thesis

Submitted for partial fulfillment of the requirements for Master degree in Periodontology

Presented by

Shehad Wael Saad Zaghloul

BDS 2014, Ain Shams University

MfD RCSI 2016, Royal College of Surgeon Ireland

Supervisors

Prof. Dr. Ahmed Youssef Gamal

Vice Dean of Postgraduate studies 6th October University

Professor of Oral Medicine, Peridontology and Diagnosis

Faculty of Dentistry Ain Shams University

Assoc. Prof. Eman Khalil Abdelhady

Assoc.Professor of Oral Medicine, Peridontology and Diagnosis, Faculty of Dentistry British University of Egypt

Dr. Doaa Adel Khattab

Lecturer of Oral Medicine, Peridontology and Diagnosis

Faculty of Dentistry Ain Shams University

Faculty of Dentistry

Ain-Shams University

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Dedication

To my precious **Mother** who always believes in me, without her I would never achieve anything.

To my **sister**, she is my supporter system for encouragement and care.

To my dearest **husband** who always push me to the best without his continous help, support and encouragement this work wouldn’t have seen the light.

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List of abbreviations

Abb.	Full Term
GR	Gingival recession
CEJ	Cemento-enamel junction
GT	Gingival thickness
WKT	Width of keratinized tissue
CBCT	Cone beam computed tomography
MCJ	Muco-gingival junction
CAL	Clinical attachment level
CAF	Coronally advanced flap
FGG	Free gingival graft
SCTG	Sub-epithelial connective tissue graft
CT	Connective tissue
GPA	Greater palatine artery
PRF	Platelet rich fibrin
EMD	Enamel matrix derivatives
PRP	Platelet rich protein
BFP	Buccal fat pad
MSCs	Mesenchymal cells
PGA	Polyglycolic acid
PI	Plaque index
GI	Gingival index
PD	Probing depth
RD	Recession depth
RW	Recession width
MRC %	Percentage of mean root coverage
BL	Baseline
VAS	Visual analogue score
RES	Root coverage esthetic score
GM	Gingival margin
MTC	Marginal tissue contour
STT	Soft tissue texture
GC	Gingival color
CRC	Complete root coverage

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Review of Literature

Mucogingival conditions is a term used to describe any deviation from the normal morphology and anatomy between the gingival margin and the mucogingival junction. Gingival recession (GR) is one of the well-known examples of mucogingival conditions or deformities, it is an expression used to describe the apical migration of the gingiva. This migration leads to root surface exposure where the receding gingiva reach beyond the cemento-enamel junction (CEJ) [(1)].

Gingival recession can be presented alone or associated with other mucogingival conditions such as decrease or absence in the amount of keratinized tissue, aberrant frenum/muscle position and decrease in the depth of vestibule. It was noticed that GR has no preference in populations of developed and developing countries [(2)]. In addition, it could be found in all age groups, as it can start in young age, although its severity and prevalence increases with age [(1)].

Several etiological factors may cause GR such as malalignment of teeth, trauma caused by faulty toothbrushing, presence of dental calculus, trauma from occlusion, high attachment frenum attachment, bad oral habits caused by pushing hard objects against teeth and gums and detrimental eating habits such as hard and crunchy food [(3)].

A new systematic review conducted by Chambrone et al. [4] in 2015 suggesting that the presence of restorations close to the gingival margin could carry risk of gingival inflammation and recession. It was concluded that these sites with marginal restorations are not indicated for soft tissue grafting and augmentation [4]. Nevertheless, these conclusions are still considered with low evidence.

On the other hand, clinician must take risk factors for GR into considerations. The use of tobacco whether it is smokeless or smoking tobacco is an important risk factor for GR [5]. Multiple studies showed that people using smokeless tobacco have a higher tendency to express more severe gingival recession and clinical loss of attachment in comparison to non smokers [6][7].

It is known that the long-term use of tobacco has detrimental influence in many ways concerning the host immune and inflammatory responses, which consist of changes in the vascular system as well as alterations on neutrophil function. Besides, nicotine has a destructive effect on host cells such as fibroblast, by affecting its proliferative and its adhesive function on the root surfaces. These by consequences, will have a negative impact on any treatment plan intended to correct GR [8].

Moreover, diabetic patient with persistently elevated blood glucose and glycosylated hemoglobin levels considered a modifiable risk factor for GR. Clinicians must inform the patient of the necessity of a controlled