



**Comparative Study of the Effect of Cross-Linked Dextran and Hyaluronic Acid Fillers on Gingival Augmentation in Albino Rats
(Histological and Immuno-histochemical Study)**

Thesis

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بِسْمِ اللَّهِ الرَّحْمَنِ الرَّحِيمِ

"قالوا سبحانك لا علم لنا إلا ما

علمنا إنك أنت العزيز الحكيم"

(البقرة - 32)

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Dedication

To the soul of my little baby El- Baraa,

To my dear parents,

To my lovely supporting husband,

And to my adorable kids Ammar and Somaya,

Thank you for being there for me.

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LIST OF ABBREVIATIONS

Abbreviation	Meaning
ADM	Acellular dermal matrix
BM	Basement membrane
BV	Blood vessel
CEJ	Cementoenamel junction
CT	Connective tissue
CTG	Connective tissue graft
CTP	Connective tissue papillae
D	Dextran
DHPMC	Cross-linked dextran in hydroxyl propyl methylcellulose
Ep	Epithelium
FDA	The United States Food and Drug Administration
GR	Gingival recession
HA	Hyaluronic acid
HPMC	Hydroxyl propyl methylcellulose
ID	Interdental
IDP	Interdental papilla
KH	Keratohyaline
LP	Lamina propria
MGJ	Mucogingival junction
PI	Post-injection
PSR	Picro Sirius red
STF	Soft tissue fillers
TGF- β	Transforming growth factor β
TNF- α	Tumor necrosis factor- α