A GEOMETRIC APPROACH TOWARDS BIOPHILIC DESIGN

By

Dalia Ahmed Abou Bakr

A Thesis Submitted to the
Faculty of Engineering at Cairo University
In Partial Fulfillment of the
Requirements for the Degree of
DOCTOR OF PHILOSOPHY
In
Architectural Engineering

FACULTY OF ENGINEETRING, CAIRO UNIVERSITY
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Under the Supervision of

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Title of Thesis:

A Geometric Approach towards Biophilic Design

Key Words:

Biophilia, Biophilic Design, geometric qualities, restorative architecture.

Summary:

The current study investigates different humane architectural approaches. It focuses on biophilia and biophilic design, in an attempt to create a conceptual framework to reflect the understanding of biophilia on architectural design. It aims to reach a set of essential geometric qualities -that are assumed to have restorative effect on humans and enrich their experience of the built environment. The study uses an experimental model to examine the physiological and psychological effect of the proposed geometric qualities on users.

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Dedication

I dedicate this work to my best friend, soul mate, and husband: Ali Al-Gammal.

Thank you for your love, encouragement, and support.

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