



The Biomimicry Trend of Creating Contemporary Ceramic Forms for Art Education Students

A Thesis Proposal for MA Degree in Specific Education

Submitted by

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English summary :

The subject of the study revolves around the biomimicry trend to create contemporary ceramic forms for art education students. The first chapter, entitled “Research Plan,” includes the background of the research and its problem, which revolves around how art education students can benefit from the biomimicry trend to create contemporary ceramic forms .

In order to answer the research questions, the researcher assumes the benefit of analyzing forms inspired by nature using biomimicry design; as well as using the biomimicry trend to develop compositional systems for natural elements in an innovative ceramic style; and applying the biomimicry trend in teaching ceramics helps in creating contemporary ceramic forms for art education students .

This chapter also discussed the objectives of the study, its importance, limits, tools and methodology, which includes the theoretical and practical framework and research terms. The chapter ended with a group of previous studies related to the subject of the study.

The second chapter, entitled “The biomimicry Trend,” included the emergence and development of the biomimicry trend, the first artists who used this trend, the definition of the biomimicry trend, the biomimicry design methodology and its steps, the principles of the biomechanical trend, the levels of inspiration from biomimicry, the possibility of the biomimicry trend in designing ceramic shapes, and the fields in which the biomimicry trend was used.

The third chapter, entitled “Computer programs and their use in designing ceramic shapes,” dealt with computer programs that have many benefits in designing ceramic shapes and three-dimensional design programs that can be used to design innovative ceramic shapes, including programs (3dMax, Blender, Maya, and others) and the importance of these programs. In teaching art education students.

The fourth chapter, entitled “International Artists Who Used the biomimicry Trend,” included the most important architects who used the biomimicry trend in their works and some international artists who used the biomimicry trend in their artistic works, including (Leonardo davinci,

Eva Zithraeus, Judit Varga, and Pamela Sunday), and presented their artistic works in which they used the idea of biomimicry trend.

The fifth chapter, entitled “The Experimental Study,” includes the experiment’s methodology, its goal, the experiment’s sample (the method of selecting the sample and the statistical description of the sample), the research tools (the teaching unit and the contents of the unit), the place of conducting the experiment, the time of conducting the experiment, the tools used in the experiment, and the materials used in the experiment.

The sixth chapter, entitled “Research Results and Recommendations,” deals with the results that were drawn through the study and a set of recommendations recommended by the researcher, as well as Arabic and foreign references and websites, as well as a summary of the thesis in Arabic and English languages.