

Development of rhythmic structure systems in the multi decorative surfaces design through theory of nature simulation Bio-mimicry

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**Abstract:**

The research problem is determined as part of the framework to reach a new way of enriching the structural design of the wall and decorative pendants, which can be achieved through understanding and inspiration structural systems, natural color with a rhythmic theme, and take advantage of the aesthetic details formalism organic micro in nature and biota of the light to simulate nature theory " Bio-mimicry ", and to clarify the possibility of drawn and simulation, and then re-introduced in the form of symbolism that can be used as a pattern form or vacuum pattern, viable structural according to specific systems iterations rhythmic, and re-coordinate the relationship constructivist" formal / vacuum "caused by the rhythmic arrangement of various different kinds of these units to enrich the design innovative structure characterized by multiple of flat levels construction and flat levels contains void shape patterns, in order to reach a production some mural pendants suitable for using in contemporary interior decorative architecture.

Therefore experimental framework is confirmed of the communication between his theories of modern scientific progress and rapid development and the composition of the entrances and experimentation with distinctive aesthetic practice, And thus it can be used through following the elements and operations of the structural and formal systems to find constriction of design forms suitable for using as new patterns bearing in character the Arab and Islamic identity to keep pace and produce designs for the mural posters with a contemporary character.

- It is that context; the researcher raises the following questions:
  - Can the introduction of the multi-level structural design so be rhythmic systems through simulation "Bio-mimicry " theory?
  - Could it apply the theory to simulate nature Bio-mimicry concepts in the design of decorative internal and external coatings to withstand the character and identity of the Islamic decorative designs?
- Research goals:
  - The application of theory to simulate nature Bio-mimicry concepts within the framework of the theory of Gestalt including enriches the decorative side of the multi-design surfaces.
  - The introduction of structural design with multiple levels of rhythmic systems through simulation "Bio-mimicry " theory carry the character and identity of the Islamic decorative designs.
- Keywords: systems - multi-rhythmic structure surfaces - the theory of Bio-mimicry .framework

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