

The Visual effects of shadow and light and their role in architectural form.

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Abstract:

Optical design is distinct process and must be seen as a single, non-recurring condition, because it considered the human psychological and physical effects by the eye responding to light as well as the effect of the aesthetic appearance, This is illustrated by the architectural formation where the manipulation of light and shade in the production of a building filled with distinctive details, which carries many visual meanings, when returning to the majority of contemporary architectural productions, we find that they consist of a set of configurations that boils down to the material, shape and light in a way that integrates Aesthetic and functional aspect together. The research has raised a question about the methods of manipulating the shadow and light and exploiting the resulting visual effects. Light may contribute to Rendering shapes to become an essential part of the artistic formation process. The natural and artificial light is combined to give a great sense of spatial depth and achieve a new effect within the design, also the falling shadows on different surfaces and materials play a role in producing significant changes in surface characteristics.

This highlights the importance of research in keeping up with the development of technologies that help achieve this integration using advanced technologies and the premise that light is one of the most important factors influencing the design and that the development of technological materials helped to employ light as a basic element of design.

Research on problem solving was based on the following axes:

The first axis: the effect of light in the beauty of architecture.

The second axis: levels of the relationship between people and the environment.

The third axis: the relationship between form, material and light is a reciprocal relationship

Keywords: (light design, architectural design, syntax space).