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COMPUTERS IN ARCHITECTURAL RECORDING: PHOTOGRAMMETRY METHOD

ABSTRACT

Architectural recording is the production of a full architectural representation of all the available architectural data of a building in a specific time. The record can be retrieved for preparation of conservation projects, archival backup and monitoring through time.

This paper is the Second among a series of papers directed towards exploring computers applications and the latest technologies in architectural recording applications. The main objective of these series of studies is to develop a comprehensive list of computer aided recording techniques suitable for architectural recording and documentation, aiming to improve the choice of technology thus improving the process of architectural recording and documentation.

The study starts by introducing a theoretical background on the basic concepts and definitions related to architectural documentation and recording, and then moves forward to identify the available technological alternatives and methods appropriate for architectural recording and documentation. Three methods are identified as suitable computer ready technologies, namely: Tacheometric methods, close range photogrammetry and close-range 3D laser scanners.

The paper then focuses on the photogrammetric method as an example of the available computer aided recording methods. A case in which this technique was used is then analysed, the study then concludes by determining the potentialities and limitations of the tacheometric method and identifies best practices for its application. Finally the study tracks the development of new techniques of computer aided photogrammetric analysis technologies.

KEYWORDS: Architectural recording, Architectural documentation, Computers, Photogrammetric method, Practice, Egypt