

## Whether Chaos Theory Could Reconstruct the Ancient Societies

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**Abstract :** Since the early emergence of chaos theory in the 1970s in mathematics and physical science, it has increasingly been developed and adapted in social sciences as well. The non-linear and dynamic characteristics of the theory make it a useful conceptual framework to interpret the complex social systems behavior. Regarding chaotic approach principals, sensitivity to initial conditions, dynamic adoption, strange attractors and unpredictability this paper aims to examine whether chaos approach could interpret the ancient social changes. To do this, at first, a brief history of the chaos theory, its development and application in social science as well as the principals making the theory, then its application in archaeological since has been reviewed. The study demonstrates that although based on existing archaeological records reconstruct the whole social system of the human past, the non-linear approaches in studying social complex systems would be of a great help in finding general order of the ancient societies and would enable us to shed light on some of the social phenomena in the human history or to make sense of them.

**Keywords :** archaeology, non-linear approach, chaos theory, ancient social systems

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