

## Chaotic Control, Masking and Secure Communication Approach of Supply Chain Attractor

**Authors :** Unal Atakan Kahraman, Yilmaz Uyaroğlu

**Abstract :** The chaotic signals generated by chaotic systems have some properties such as randomness, complexity and sensitive dependence on initial conditions, which make them particularly suitable for secure communications. Since the 1990s, the problem of secure communication, based on chaos synchronization, has been thoroughly investigated and many methods, for instance, robust and adaptive control approaches, have been proposed to realize the chaos synchronization. In this paper, an improved secure communication model is proposed based on control of supply chain management system. Control and masking communication simulation results are used to visualize the effectiveness of chaotic supply chain system also performed on the application of secure communication to the chaotic system. So, we discover the secure phenomenon of chaos-amplification in supply chain system

**Keywords :** chaotic analyze, control, secure communication, supply chain attractor

**Conference Title :** ICNDC 2015 : International Conference on Nonlinear Dynamics and Control

**Conference Location :** Amsterdam, Netherlands

**Conference Dates :** August 06-07, 2015