## SOLVING NONLINEAR SYSTEMS OF EQUATIONS AND NONLINEAR SYSTEMS OF DIFFERENTIAL EQUATIONS BY THE MONTE CARLO METHOD USING QUEUEING NETWORKS AND GAMES THEORY

## DANIEL CIUIU\*

In this paper we will solve some nonlinear systems of equations and nonlinear systems of differential equations by the Monte Carlo method using queueing networks and some results from games theory.

**Keywords**: Monte Carlo, queueing networks, symmetric games. **AMS Subject Classification**: 60K25, 65C05, 91A05.

<sup>\*</sup> Technical University of Civil Engineering, Bd. Lacul Tei, no. 124, Bucharest, Romania, e-mail: dciuiu@yahoo.com