

INTERNATIONAL WORKSHOP ADVANCES IN CLEANER PRODUCTION

"KEY ELEMENTS FOR A SUSTAINABLE WORLD: ENERGY, WATER AND CLIMATE CHANGE"

Saving Productive Resources through Simulation Models Studies

M. S Nogueira Neto $^{\rm a},$ R. C. Barros $^{\rm b},$ J. B. Sacomano $^{\rm c},$ J. L. A. Lima $^{\rm c}$

- a. Universidade Paulista, São Paulo, mnogueira@fei.edu.br
- b. Centro Universitário da FEI, S. B. Campo, <u>rcastrobarros@uol.com.br</u>
 - c. Universidade Paulista, São Paulo, sacomano@unip.br
 - d. Universidade Paulista, São Paulo, proflima10@gmail.com

Abstract

The necessity of sending goods produced in several different geographical positions highlights the logistics strategy so that the involved costs may become minimized. The presented study points the importance of the knowledge about simulation, using it as a support tool for the decision in the transport logistics, focusing the size of a truck's fleet. It will be added the concept of simulation with the logistics strategy, intending to improve the way of spending the resources. The research develops in a highway transporter loads station. Through simulation the actual results will be compared to the supposed one. The productivity increase in the use of different transportation ways reflects positively in the environmental preservation reducing the energy and raw materials consumption used in the production of these equipments and the fuels to move them.

Keywords: Simulation; Logistic; Environmental preservation; Productivity