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## **VULNERABILITY ASSESSMENT OF LAND-USE TYPES WITH RESPECT TO MAJOR ACCIDENT HAZARDS**

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### **Abstract**

A significant part of each risk informed land-use planning methodology, applied in the surroundings of Seveso installations, is the assessment of the vulnerability of all possible potential human and environmental targets. This paper focuses on the enhancement of the transparency of these methodologies, through the application of ELECTRE TRI, which is a well known and structured multi-criteria methodology. A broad set of multiple and conflicting criteria is considered, ranging from population safety and potential environmental impacts to socio-economic criteria. Additionally, a procedure for the facilitation of the inferring process of the parameters of the multi-criteria model is also presented, along with a case study, related to the statutory land-use types of the Greek Town Master Plan.

*Keywords:* ELECTRE TRI, land-use type vulnerability, Seveso directive

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