PROBABILISTIC LINEAR PROBLEMS WITH BIVARIATE EXPONENTIAL DISTRIBUTED RANDOM PARAMETERS

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ABSTRACT

In this paper, chance constrained programming (CCP) problems with some dependent exponential distributed random parameters are considered. Firstly, a suggested bivariate exponential distribution model is presented. This model is an important for financial, insurance, economical problems, etc.

Secondly, a proposed method to convert (CCP) problems to the equivalent deterministic programming problems in two cases: (i) for individual constraints and some L.H.S. parameters $\tilde{a}_{ij}$ follow a suggested model, (ii) for the joint (dividual) constraints and some R.H.S. random parameters $\tilde{b}_i$ follow a suggested model also.