

Title: Examples of Bayesian modeling in insurance.

Abstract: A common view in insurance is to consider a risk parameter, e.g. the Poisson rate of car accidents, as varying randomly. A classical example is an insured's Poisson rate of car accidents which is often assumed to have a Gamma distribution. We consider two examples where this point of view is a key to the analysis: (i) modeling of a portfolio's size and further risk characteristics subject to changes in the premium, (ii) calculation of performance measures of a bonus-malus System such as the Bayes loss using transient rather than stationary Markov chain analysis.