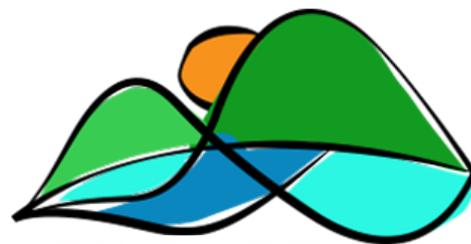


23 a 28

Fonte Colina  
Verde[Página Inicial](#) » [Inscrições Científicas](#) » [Trabalhos](#)

# Dados do Trabalho

---

## Título

SPARSE BAYESIAN MODEL OF BINARY RESPONSE WITH ASYMMETRIC LINK FUNCTION FOR TEXT CATEGORIZATION

## Resumo

A typical problem when dealing datasets with a large amount of covariates compared to small sample sizes is to satisfactorily estimate the parameters associated with each covariate. When the number of covariates greatly exceeds the sample size, the parameter estimation becomes very difficult. In various areas of application such as text categorization, it is necessary the task of selecting important covariates and avoiding the overfitting of the model. In this work, we developed a Sparse Bayesian binary regression model with asymmetric link function for text categorization. In addition, we assign a sparse prior distribution (double exponential) for regression parameters to favor sparsity and to reduce the number of covariates in the model. The performance of the proposed model is demonstrated with real data set, the Reuters R8 corpus. The dataset contains the eight most frequent classes from the Reuters-21578 collection of newswire articles. The eight classes consist of a minimum of 51 up to 3923 documents and sum up to a total of 7674 texts. Parameter estimation is performed considering Hamiltonian Monte Carlo estimation method on No-U-Turn Sampler (NUTS) extension, using the Stan software in the R package.

## Palavras-chave

Bayesian lasso, Skew link, Sparsity, Text categorization.

## Área

Inferência Bayesiana

## Autores

Hugo Miguel Agurto Mejía, Márcia D'Elia Branco

---

FECHAR

↑ (JAVASCRIPT:VOID(0))

Organização



Apoio



Patrocínio



Tecnologia para eventos

inteligência

(<http://www.inteligenciaweb.com.br>)

Formas de pagamento



Segurança



(<https://www.google.com/safebrowsing/diagnos:site=iweventos.com.br>)