

网络、通信与安全

基于感知学习的垃圾邮件过滤算法

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摘要 Edelman等人根据其神经元群选择学说(the Theory of Neuronal Group Selection, TNGS)提出了脑感知学习的模型,将该模型中脑对陌生事物的学习类比于垃圾邮件过滤系统中对未知邮件的学习,提出了一种新的基于感知学习的网络垃圾邮件过滤算法,并将其应用于一种基于合作式网络的垃圾邮件过滤系统模型中。系统使用改进的文本数字签名技术得到邮件文本之间的内容相似度矩阵,将其与邮件到达的行为特征等一起作为该算法的参数,最后给出了仿真实验结果。

关键词 [垃圾邮件过滤](#) [感知学习](#) [内容相似度](#)

分类号

Spam filtering method based on cognition learning

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Abstract

The cognition learning model was proposed by Edelman et al., according to his Theory of Neuronal Group Selection (TNGS) proposed by Edelman et al. presented a cognition learning model. In this paper, we consider the spam filtering problem by analogy to the learning process. In this model, a novel self-learning spam filtering method based on cognition learning is presented. The method uses an improved textual signature algorithm to calculate the similarity matrix of the email text. This matrix, together with the characteristics of email traffic, is regarded as the parameters of the spam detecting method. Finally, the simulation results are presented.

Key words [spam filtering](#) [cognition learning](#) [textual similarity](#)

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