Abstract

The expanding complexity of networks and the need to make them increasingly open due to the growing emphasis on and attractiveness of the Internet as a mode for business transactions, imply that networks are exposed to increasingly more attacks, both from without and from within. One of the protective mechanisms under serious consideration is the firewall which protects a network by guarding the points of entry to it. Constantly including of new features make Firewalls becoming more sophisticated day by day; so that, in spite of the criticisms made of them and developmental trends threatening them, they are still a powerful protective mechanism. Basically, Firewall sets accept or deny action for packets by default. In this paper, researchers proposed to add Artificial Intelligence with firewall which in turn make firewall capable of exploiting traffic behavior by utilizing incoming traffic and dynamically creating some rules with itself for some exceptional packets; So no default actions need to be used.

**Index Terms**

Computer Science  
Security

**Keywords**

Firewall, Artificial Intelligence, Generation, Network