

## Review and Critic of Cyber Security Articles

This assignment is just to review and critic given articles and compare with the other listed articles

### Critic and Review of Cyber Security Articles

Network security is required at each layer in order to provide full protection to the end users (Frankel et. al, 2005). Various techniques for catering network security include: IPsec, Network Intrusion Detection Systems, Lightweight Intrusion Detection Systems, DNS pinning, and different sort of firewalls. Each paper portrays a different scenario for the usage of each security method. Each technique has its own strengths and weaknesses according the environment in which it is deployed. This article presents a criticism on the defensive measures that can be taken to counteract DNS rebinding attacks (Jackson et. al, 2009) and the Lightweight Intrusion detection system proposed by Paxson & Sommer (2003).

#### Review of Paper #1

##### Executive Summary:

The paper titled "Protecting Browsers from DNS rebinding attacks" highlights the attacks and problems generated by DNS rebinding in various browsers and also show how little changes to DNS pinning, plug-ins, firewalls and Webservers help to resolve these issues. DNS rebinding attacks make the browser prone to act like open network proxies and an attacker can easily access the important documents of an organization and send spam emails as well. It can also disseminate fraudulent pay-per-click advertisements and allow an attacker to directly access the network sockets. The paper put forwards the idea that "Pinning" is commonly used to counteract DNS rebinding attacks. However this measure has failed to a great extent due to the vulnerabilities introduced by browser plug-ins. These plug-ins allow socket level network access giving birth to a new class of vulnerabilities called "Multipin Vulnerabilities". Using multipin vulnerabilities an attacker can easily access the socket or any port of the host. The paper carried out various experiments to assess the severity of these attacks and found out an attacker only