

Editorial

Internet as an information grid connects users across the globe. The advent of IPv6 offers many advantages including auto-configuration mechanism. ICMPv6 is the most important protocol associated with IPv6 but vulnerable to deny network services or slowdown the network performance. In order to find a solution to the problem, a research work proposes Fuzzy Inference Classifier to detect the ICMPv6 Attacks with high accuracy.

XML assumes greater importance when it comes to web-based data-exchange and storage. To manage enormous data stored in XML documents, a study proposed XPLC protocol for XML concurrency control. The novel approach introduces the notion of child consideration in XPath locking protocols. Another paper overviews Honey pots as security tools and illustrates some types of potential attacks. The study proposed an Extended Double Honey pot System to secure Intranets that consist of more than one LAN in a very cost-efficient and beneficial manner.

Voice is the most natural way to communication. A voice based biometric system designed by a research team may suit a medium range of the security level especially in residential and company areas. Similarly, a team successfully implemented Finger-Knuckle-Print (FKP) based authentication system using Scale Invariant Feature Transform (SIFT) for efficient computation and cost; it is proven to be secure and tough resistant in authentication system. Developments also reported in allied area: Syntactic pattern recognition which has been applied in various fields including recognition of English and Chinese character, fingerprint, speech, scene analysis etc. A research team analyzed the disadvantages of associated Lyon's algorithm and proposed a new algorithm for its improvement.

One of the mandatory characteristic in Mobile Ad-hoc Networks (MANETs) is "self-configuration" which involves neighbor discovery and maintenance of neighborhood information. A research group has come up with an enhanced protocol that has outperformed the original neighbor protocol used with Connected-Dominating-Set (CDS). A team analysed efficient Randomized Waypoint along with secure mechanism using IDS for tactical mobile networks. This work improves network performance significantly by 50%. Packet classification is an important function in network management including firewalls, traffic accounting, and network address translation. An article in this issue presents a modified version of the packet classification algorithm, called DimCut Packet Classification Algorithm using Recursive Dimensional Cutting. It provides a deterministic performance, apart from providing flexibility for system designers to tradeoff the components, and thus benefits the research and design community as a whole.

Global Service for Message based LED Display Board gains popularity for real-time especially in the field of safety, security, traffic management, education & sports and trade related promotions. A research group plugs in the loopholes of the existing products and proposes for an enhanced LED Display Board.

Prof. Natarajan Gajendran
Editor

