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1.

Authors: M. Deva Priya, M. L Valarmathi, M. Deepa, K. Jaya Bharathi

Paper Title: Implementation and Evaluation of GPSR and M-LAER in Mobile WiMAX Networks

Abstract: An appropriate routing protocol is mandatory for scalable wireless networks. Various routing protocols have been proposed in the literature for mobile WiMAX networks. The reliability of a path depends on the stability of the links constituting the path. A long lasting path is desirable. Energy is an important factor that should be taken into consideration as nodes are energy contingent. In this paper, the behavior of GPSR and Modified Link-StAbility and Energy aware Routing (M-LAER) are analyzed for WiMAX environment.

Keywords: GPSR, WiMAX, LAER, Routing, Energy, M-LAER.

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2.

Authors: **K. R. Arjunadhityaa, G. Murugaboopathi, T. K. S. Rathish Babu**

Paper Title: **Implementation of Autonomous Network Reconfiguration System in Wireless Networks**

Abstract: Wireless Mesh Networks (WMNs) experience frequent link failures caused by channel interference. These link failures cause severe performance degradation in WMNs .This project is aimed towards developing an Autonomous Network Reconfiguration System (ANRS) that enables a multiradio wireless mesh networks to autonomously recover from local link failures to preserve network performance. Further we carry out simulation using Network Simulator NS-2 to compare the performance of ANRS with the existing link failure recovery methods. The metrics used for the performance evaluation are throughput, efficiency and Delay.

Keywords: Autonomous Network Reconfiguration System (ANRS), multiradio wireless Mesh Networks (mr-WMNs), Wireless link failures.

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3.

Authors: **Rajesh Nema, Rajeev Thakur, Ruchi Gupta**

Paper Title: **Design & Implementation of FPGA Based on PID Controller with Motor & Sensor**

Abstract: Proportional-Integra- Derivative controllers are universal control structure and have widely used in Automation systems, they are usually implemented either in hardware using analog components or in software using Computer-based systems. In this paper, we focused our works designing on building a multi-channel PID controller by Field Programmable Gate Arrays (FPGAs). To overcome the hardware complexity by the use of more processors for multi channel, we are using single PID controller for multi channel .Multi channel can be implemented by the use of FPGA.when the error is more it can differentiate and produce the constant output, when signal is low when compared to reference signal it can integrate it.FPGA can offer parallel processing, more speed.

Keywords: FPGA, PID, PWM, SENSOR.

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3. ISSN 0974-2190 Volume 2, Number 1 (2010), pp. 71--82 Analysis and Implementation of Discrete Time PID Controllers using FPGA
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4.

Authors: **P. Thamizharasi, D. Vinoth**

Paper Title: **Unobservable Privacy-Preserving Routing in MANET**

Abstract: Privacy-preserving routing is crucial for some ad hoc networks that require stronger privacy protection. A number of anonymous routing schemes have been proposed for ad hoc networks in recent years, and they provide different level of privacy protection at different cost. These schemes are more scalable to network size, but require more computation effort. However, existing schemes provide only anonymity and unlinkability, while unobservability is never considered or implemented by now. An obvious drawback in existing schemes is that packets are not protected as a whole. An efficient privacy-preserving routing protocol USOR that achieves content unobservability by employing anonymous key establishment based on group signature. USOR is to protect all parts of a packet's content and it is independent of solutions on traffic pattern unobservability. The unobservable routing protocol is then executed in two phases. First, an anonymous key establishment process is performed to construct secret session keys. Then an unobservable route discovery process is executed to find a route to the destination. By using NS-2 the performance analysis such as energy, bandwidth etc., are simulated.

Keywords: MANET, Privacy, Public key, Routing, Unobservable.

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5.

Authors:	**Ashwini Jarali, Jyoti Rao**
Paper Title:	**Unique LSB Compression Data Hiding Method**

Abstract: This paper presents a unique method of reversible data hiding separately in encrypted image..This work presents a new method that combines image cryptography, data hiding and LSB compressing technique for reversible data hiding separately. In this method we encrypt the original image with stream cipher algorithm. Then, a data-hider may compress the least significant bits of the encrypted image using a data-hiding key to create a sparse space to accommodate some additional data. With an encrypted image containing additional data, if a receiver has the data-hiding key, she can extract the additional data though she does not know the image content. If the receiver has the encryption key, she can decrypt the received data to obtain an image similar to the original one, but cannot extract the additional data. If the receiver has both the data-hiding key and the encryption key she can extract the additional data and recover the original content without any error by exploiting the spatial correlation in natural image.

Keywords: LSB compressing, reversible data hiding, Image encryption, data embedding, Pixel Permutation.

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Authors:	**Arun Kumar R**
Paper Title:	**Shipyard Management through Android Technology**

6.

Abstract: The purpose of paper is to provide security for user. User can store all the information about ships and loads and also the incoming and outgoing transactions in entire port information. The existing system is when user want to store the data information about all ships in port user will registered in a book to maintain all the data and operations timings about load for this they are keeping one accountant he will do accounts calculation and all the information about entire port. The proposed system our application is when user want to store the data about all the information, calculation of accounts, weighment operations user can store all accounts and also include calculator to calculation part. This is the advantage of the proposed system. Modules we can use Database, ui designing, Authentication, Barcode scanner. Android is a software stack for mobile devices that includes an operating system, middleware and key applications. The android sdk provides the tools and API necessary to begin developing applications on the android platform using the java programming language. In this application user can store all the information about ships and loads and also the incoming and outgoing transactions in entire port information.

Keywords: ANDROID, API, AUTHENTICATION, BARCODE, SHIP, SECURITY.JAVA.

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7.

Authors: **Pratik Gite, Sanjay Thakur**

Paper Title: **Comparative Study and Simulation Based Analysis of MANET Routing Protocols Using NS-2**

Abstract: Mobile Ad-hoc Network is a collection of wireless devices that can be set up instantly anywhere and anytime without the needs of any pre-existing network infrastructure. It is an autonomous system in which mobile devices are connected through wireless links and free to move randomly and often act as host as well as router at the same time. The main objective of this paper is to simulation based analysis of MANET routing protocols viz. Destination Sequence Distance Vector (DSDV), Dynamic Source Routing (DSR) and Ad-hoc On Demand Distance Vector (AODV) on the basis of different performance metrics which are throughput, packet delivery ratio, routing overheads, packet drop. The simulation is performed through the simulation tool Network Simulator-2 (NS-2) due to its open source simplicity and free availability.

Keywords: Destination Sequence Distance Vector (DSDV), Dynamic Source Routing (DSR), Ad-hoc On Demand Distance Vector (AODV), Network Simulator (NS-2).

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Authors: **Ali Broumandnia, Mostafa Cheraghi, Mohsen Azararjmand**

Paper Title: **Content-Based Image Retrieval with Graph Theoretic Approach**

Abstract: The need for content-based image retrieval has increased with increment size and volume of digital images. This paper introduces the graph-based approach in order to retrieve the content-based image. In the proposed method, an image presents by a set of regions, while comparison of images are posing, each image represents by a graph, hence the estimation of the region correspondence transform into an graph matching problem. In addition, by using and image distance criteria, the difference between images obtained. Experimental results show that the proposed graph-theoretic image matching performance is acceptable.

8.

Keywords: Component: Content Based Image retrieval, Graph matching, Image segmentation, Matching Matrix.

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9.

Authors:	**Aruna Rani, R. K. Singh, Ashish Negi**
Paper Title:	**Design and Analysis of Nano Fractal Antenna Protection Chip to Overcome Crimes Against Women and Remedial Measures**

Abstract: In this paper novel technology fractal antenna structures are proposed to protect the women and girls from the crimes and brutal mishaps and to provide them a multifunctional, multiband "Nano fractal antenna protection chip". The novel antenna structures have rectangular shaped and U shaped fractals slots. The novel fractal antennas can reduce the size of antenna and chip. The multi frequencies can be generated and bandwidth can be enhanced. This chip can be easily designed, fabricated and implemented. This chip will automatically activated at the time of abnormal activity. It also gives the remedies to use this technology for women protection. The paper also presents the prototype of the technology.

Keywords: Fractal, antenna, Nano technology, protection chip, multiband antenna, rectangular, U slot.

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10.

Authors:	**Nilesh R. Rathod, Hardik J. Patel**
Paper Title:	**An Approach on Coding and Congestion Aware Routing Mechanism in MANET**

Abstract: Routing protocols for mobile ad hoc networks (MANETs) have been explored extensively in last few years. Much of this work is targeted at finding a feasible route from a source to a destination without considering current network traffic or application requirements. Routing may let a congestion happen which is detected by congestion control, but dealing with congestion in reactive manner results in longer delay, and unnecessary packet loss and requires significant overhead if a new route is needed. Routing should not be only aware of network coding, but also be aware to, network congestion. This paper present the survey of coding and congestion aware routing protocols for mobile ad-hoc network. This paper argue that network coding aware routing protocol in combination with congestion aware routing protocol allows MANET to operate in a more efficient manner and helps to deal with typical MANET issues such as . Congestion in the network and poor utilization of the network as well as various other issues that have been disregarded in previous MANET researches such as throughput and unreliable channel. By comparison and combination of coding and congestion aware routing mechanism can achieve shorter file downloading delays compared to an existing MANET protocol.

41-44

Keywords: A Mobile Ad hoc networks, congestion aware routing, Congestion metric, network coding.

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11.

Authors: **H. S. Hota**

Paper Title: **Diagnosis of Breast Cancer Using Intelligent Techniques**

Abstract: Breast cancer is a serious and life threatening disease due to its invasive and infiltrative character and is very commonly found in woman .An abnormal growth of cells in breast is the main cause of breast cancer actually this abnormal growth of cells can be of two types benign (Non-Cancerous) and malignant (Cancerous) ,these types must be diagnosed clearly for proper meditation and for proper treatment. A physician with full of experience and knowledge can deal complex problem in the breast cancer diagnosis process to identify disease but modern medical diagnosis system is totally based on data obtained through clinical and/or other test ,most of the decision related to a patient to find out disease is taken based on these data Better classification of a disease is a very crucial and challenging job , a small error can cause the problem because it is directly related to the life of a human being. In this research work ,various intelligent techniques including supervised Artificial Neural Network (ANN) ,unsupervised Artificial Neural Network ,Statistical and decision tree based have been applied to classify data related to breast cancer health care obtained from UCI repository site. The various individual models developed are tested and combined together to form ensemble model .Experimental works were done using MATLAB and SPSS Clementine software obtained results shows that ensemble model is better than individual models accuracy obtained in case of ensemble model is ,which is higher than all individual models ,however counter propogation network (CPN) is a competitive model among all other individual models and accuracy of this model is very near to that is obtained in case of I ensemble model. In order to reduce dimensionality of breast cancer data set a ranking based feature selection technique is applied with best ensemble model ,experimental result show that model has less accuracy with less number of features .Models are also analyzed in terms of other error measures like sensitivity and specificity.

45-53

Keywords: Decision Tree (DT), Supervised and Unsupervised Artificial Neural Network (ANN), Breast Cancer . Support Vector Machine (SVM).

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