Abstract

Wireless Sensor Networks comprise of innumerable small sensors that have limited resources. As wireless sensor networks are usually deployed in remote and unfriendly environment to transmit sensitive and crucial information, sensor nodes are vulnerable to node compromise attacks. Security issues such as data confidentiality and integrity which are of utmost importance need proper consideration in WSN. Hence, wireless sensor network protocols, as data aggregation protocol, must be designed keeping secrecy in mind. The work aims to use software agents to introduce security features in an agent based environment which is known as Secured Directed Diffusion using Mobile Agents (SDDMA). It extends the IDDMA approach by adding encryption to it. This will help to determine the sequence of target nodes to be visited by the Mobile Agent along with the encrypted data.

References

- Fei Jiang, Haoshan Shi, Zhiyan Xu, Xiangjun Dong &quot;Improved Directed
Diffused Directed Diffusion using Mobile Agents

Secured Directed Diffusion using Mobile Agents


Mitsuru Oshima, Guenter Karjoth "Aglets Specification (1.0)" IBM May 20th, 1997.


S. Misra et al. (eds.) "Guide to Wireless Sensor Networks Computer"

**Index Terms**

Computer Science  
Security

**Keywords**

Mobile Agent Directed Diffusion  
Wireless Sensor Networks  
Secure Data  
Aggregation  
Cryptography