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An intrusion detection scheme for driverless vehicles based gyroscope sensor profiling

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Abstract:

Vehicular ad-hoc networks of self-driving vehicles are potentially exposed to both internal and external attacks. The privacy and security of these networks is paramount for effective protection of communication systems from possible attacks. We propose an intelligent intrusion detection system in this paper that is based on Integrated Circuit Metrics (ICMetrics), which has significant defensive capability against unexpected attacks. The proposed security system shows good performance in identifying and blocking malicious vehicles in vehicular ad-hoc networks of driverless vehicles and semi driverless vehicles.

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