

Since blockchain contains important information about transaction, it is important to look into the security of such transaction.

Because blockchain uses consensus algorithm to verify transactions, it is impossible for a single unit to pose a threat to the data network. A node (or unit) that begins to act abnormally can easily be identified and expunged from the network.

Problem Statement

Based on the transactions of the distributed registry of Bitcoin, to identify the moments of abnormal behavior and transactions in the market, from September to December 2018.

Problem Solution

To detect such anomalies in transactions through different outlier detection algorithm.

First an exploratory analysis of the data was performed and the required features were studied. Then we applied different outlier detection algorithms like linear models, probabilistic and outlier ensemble based methods to detect such anomalies in bitcoin transaction over a period of around 4 months.