

PUBLIC SAFETY MANAGEMENT THROUGH ARTIFICIAL INTELLIGENCE APPLIED TO TWITTER MICROTTEXTS: #COLLABORATIVESECURITY

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Agradecimento à órgão de fomento:

Não se aplica

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Introdução

Security agencies have been striving to reduce crime in the city, through the application of security techniques, intelligence services and the use of public policies to mitigate public insecurity (Instituto de Segurança Pública [ISP], 2020). However, with the advent of the internet and especially of social networks, the opportunity for a more proactive action opens up, as it is now possible to report criminal acts in real time, maintaining a pseudo anonymity while providing collaboration between users of these social networks. T

Problema de Pesquisa e Objetivo

The article seeks to answer the following question: "How can Artificial Intelligence (AI) be used for the automatic analysis of twitter microtexts, in order to improve public security management? The study presents a post analysis process on the twitter social network that can be implemented by public security agencies, pointing out possible paths for security management. The application of AI in public policies, despite its importance, is a broad and under construction field.

Fundamentação Teórica

Nowadays, the Internet is already part of the routine and everyday life of citizens, in the same way as supermarkets and highways, and should not be overestimated in the fight against violence and crime. According to Simon (2019) and Poole e Mackworth (2017) there is no consensus about which is the best and most recognized definition about the umbrella term of Artificial Intelligence (AI), that is now hype on both the business and consumer sides, but is seventy years old as it was born in 1950, when it was understood as the science to create machines.

Metodologia

In the exploration phase, the Boolean formula used in the search engine of Capes Journals' Portal was defined as ("Public Safety" OR "Public Policy" OR "Public Management" OR "Public Sector") AND (Violence OR Crime) AND ("Social Media" OR "Data Science" OR "Artificial Intelligent") AND Twitter. This implementation was divided into four layers, each one, with tasks corresponding to their respective activities in order to cover the entire data mining life cycle.

Análise dos Resultados

Since the whole process was built around techniques of dimensional modeling, it is possible to look at data by various dimensions, like a cube. For example, when we analyze the data by week, it is possible to determine that Saturday was the most frequent day of events, which leads us to deduce that, if this continues in other samples, it can be characterized as a behavior pattern. Therefore, this information compiled into indicators can be used by governments to assist in building security agencies strategies.

Conclusão

Although security events have been undergoing variations in terms of frequency due to COVID-19 pandemic and actions from the State, this work showed the possibilities that technology can provide for security agencies in the intelligent fight against crime, in the form of indicators and behavior patterns of security events that are published on social networks, reflecting what happens in real life.

Referências Bibliográficas

Simon, J. P. (2019). Artificial intelligence: scope, players, markets and geography. Digital Policy, Regulation and Governance. Poole, D. L. & Mackworth, A. K. (2017). Artificial Intelligence: Foundations of Computational Agents (2nd. ed.). Cambridge University Press, USA.