

Forensics Data Analysis on Social Media

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Motivation of the work

CURRENT SITUATION:

- Much of the population is connected to social networks.
- There are risks in the information that is exposed in social networks.
- There is an increase in incidents of cybersecurity.
- You can observe manipulation in content propagated in social networks.

TOPIC PROBLEMS:

- **Spread** of fraudulent content on social networks.
- **Theft** of identity and information.
- **Manipulation** and falsification of information
- **Infringement** of copyright.

IMPROVEMENTS

- **Identify** suspicious behavior
- **Determine** risky or reliable content

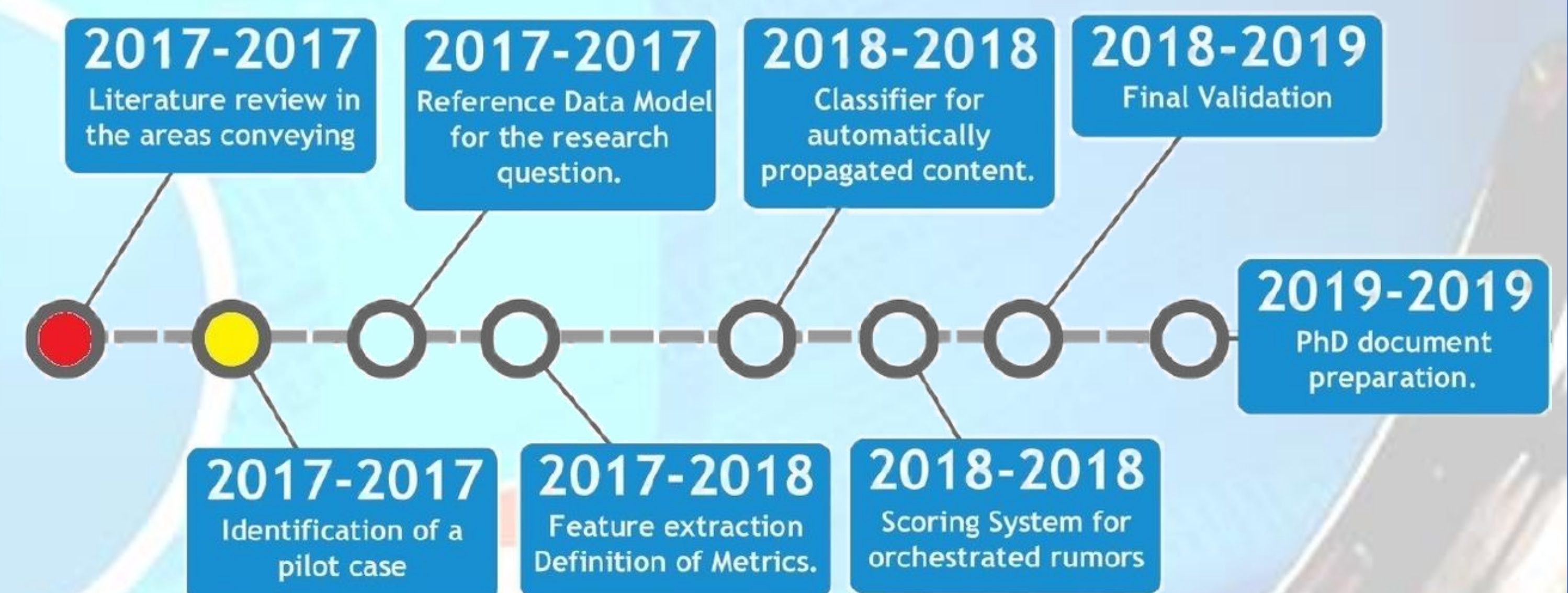
Thesis Objectives

the present research aims to contribute to the forensic analysis of data in social media by the design, development and validation of methods for the detection of

- (1) automatically propagated content in social media
- (2) rumors which are the result of an orchestrated behavior among different points in the social network structure.

Research plan

- This PhD focuses in the **forensics analysis** of social media data in order to detect irregular co-behavior of people or bots emulating people with a malicious intention



- The **identification** of this kind of coordinated behavior, and its prediction enough in advance, would imply prime benefits for individuals in different scenarios like financial market, smart grid, politic manipulation, and so on. In any of these scenarios, it is imperative to verify the contents exposed in social media to adequately determine if content is reliable or present a risk.
- **Differentiate** verified information from rumors, that is, a statement whose truth value is unverifiable or deliberately false.

REFERENCES

- [1] Clayton A. Davis, O. V. (2016). BotOrNot: A System to Evaluate Social Bots.
- [2] Michela Del Vicario, A. B. (2015). The spreading of misinformation online.
- [3] Onur Varol, E. F. (2017). Online Human-Bot Interactions: Detection, Estimation, and Characterization.

In social media, there is an increase of the bots for which it is imperative mechanisms of recognition, by human-like patterns of behavior.

"Act like human think like bot"