



Departamento de
Informática

Cloud & Emerging Technologies based Solutions for the Social Sector Institutions Masters Proposal

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Context

This M.Sc. Dissertation aims at exploring effective solutions for the social sector institutions to make them more auditable, transparent, open and effective towards its stakeholders, including citizens. In particular, the research will focus on aggregating the knowledge of different technologies, like clouds and blockchain, and best practices in software engineering into working prototype models for the social sectors to use.

The prototypes must automate the working of social sector institutions, making their operations more transparent, auditable and open towards citizens by promoting citizens participation.

Objectives: The goal is to design effective algorithmic solutions for social sector institutions like charitable organisations, financial institutions, educational institutions, health departments, and others. The algorithmic solutions will be implemented as prototypes to be deployed for use by these social institutions.

Work plan and expected timeline

T1 September: Technological review and state of art.

T2 October to December: Algorithmic solutions providing auditability, transparency and openness to operations.

T3 January to February: Prototype implementation.

T4 March to April: Verification and validation of prototype using a live dataset.

T5 May to June: Thesis and paper writing (ongoing throughout the project with the final two months mostly dedicated to writing).

Expected Output

1. Masters Dissertation
2. Working prototype
3. Conference/Journal paper