



INITIAL PLAN - CROWD FUNDING OF CIVIC PROJECTS

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ABSTRACT

A crowdfunding platform for Civic Projects and individuals with great business ideas that promotes micro-financing, peer reviews of the ideas and gathers statistics

Module:

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– 40 credits

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Project description

There are a lot of people with a lot of great ideas in their minds, both ideas that support civic causes and business ideas having the goal of generating profit. The online environment currently presents a number of projects (websites or platform) that enable these individuals or companies to seek funding from other individuals or companies instead of from financial institutions (e.g. banks). These initiatives are formally called “crowd funding websites”, that build their reputation, revenue and functionality on a set of emotional and “social values” propositions individuals can associate with, based on a proposition made by another individual or company (that might also represent a charity or propose a civic cause). A number of such sites have emerged over the recent years. These include KickStarter, Lending Circle, Zopa Finance, Lending Works, etc.

The main problem of these websites is that they mainly promote business ideas that may or may not succeed after the initiators reach their funding goals. Some of the initiators do not even put these ideas into practice or the products that emerge out of the initiatives often differ significantly from what the people were expecting when they initially read the proposal and funded the projects. This fact leads to a major disappointment from the benefactors (users making the donations). Moreover, there are very few initiatives that focus their effort on civic projects and they are under-developed.

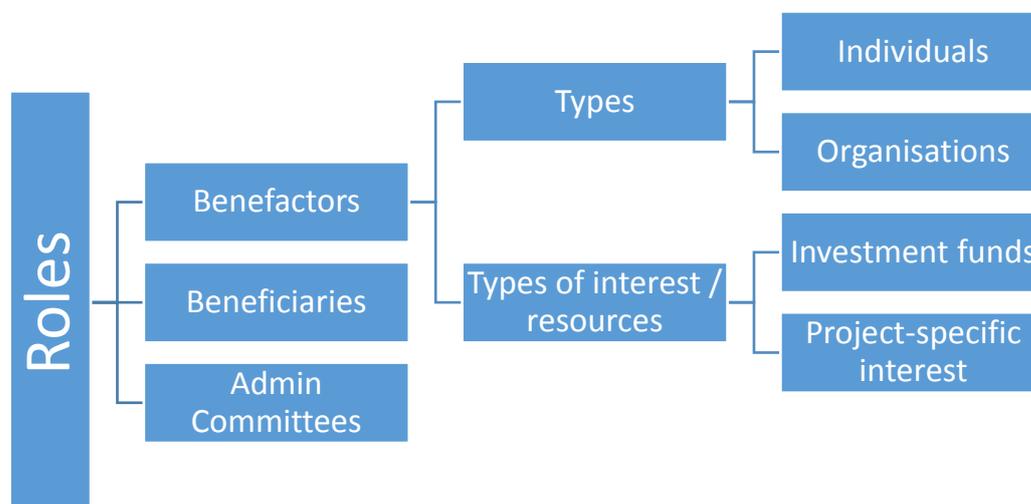


Figure 1 – User roles in the system

Another major problem that derives from here is represented by trust. Therefore, the platform I plan to develop will have three types of users: benefactors, beneficiaries and administrators. The administrators will have the right to review and disapprove (if necessary) the proposals from the beneficiaries if they do not demonstrate sufficient experience and expertise in the field of the industry their proposal is related to. The beneficiaries will have the opportunity to demonstrate this on their personal profile, that will have a structure similar to a CV. The beneficiaries will also have the opportunity to show interest in multiple projects without donating, stating the reasons

behind their motivation and the administrators will have the opportunity to suggest the project they consider the most suitable and having the most chances of success.

The aim of this project is to focus on the funding of civic projects instead and investigate how a similar crowd funding model could be used to finance projects involving civic and charity causes and also support micro-financing, in a highly moderated and transparent way.

Project aims and objectives

- explore the key features of crowd funding sites focusing on micro-finance and civic projects:
 - undertake a survey of existing sites and identify key features and limitations of these sites of the following type: credit unions, crowd funding, peer to peer lending, micro-finance based sites;
 - characterise features that these sites have chosen to support user engagement;
 - highlight key areas of their Customer Relationship Management (CRM) and Risk Management tools.
- develop a frontend and design a visual interface that ensures enough information is presented in an appropriate style to attract donors and maintain their “loyalty” (e.g. recurring visits and funding) and a frontend:
 - ensure that all the HCI and UX / UI principles are met;
 - ensure that an appropriate combination of colours, animations and visual effects are used;
 - ensure that the website is displayed appropriately across all the screen sizes / resolutions.
- implement a backend system (e.g. a database) that enables donor and campaign information to be kept in a secure manner and ensure scalability and growth over time:
 - implement a non-relational database;
 - implement security features that prevent hacking attempts from the users of the site and / or the administrators;
 - implement non-repudiation features for all the types of users (e.g. security keys, hashes).
- Implement features that enables statistics / information about the projects to be extracted and display all the information gathered in a dashboard:
 - Implement queries that extract statistics from the database;
 - Design and implement a “dashboard style” interface for the registered users.
- validate the system with potential users and conduct surveys on their experience of using it. The aims of the survey would be:
 - ease of use of the interface;
 - general attractiveness of the platform and willingness of recurring donations;
 - credibility of the platform in terms of whether the donated funds will reach their intended recipients and will be used towards the described goal;

- what the users consider to be lacking;
- what the users consider to be special about this platform compared to the competitors;
- other user experience factors (loading speed, suitability of animations / visual effects and colour combinations).

Work plan

The platform (suggested to be called “XpresStarter”) will be comprised both of a Frontend (GUI) and a Backend in which all the data related to users and projects will be stored. There will be both a Frontend for the users and admins, where the projects can be posted, visualised and moderated and a Dashboard Frontend with all the statistics that will only be visible to the admins. The backend will be comprised of a non-relational database (designed to be scalable) and data will be retrieved to the Frontend in the JSON format. If I have time, I also plan to develop a web service that can provide data to external services (such as finance analysis and CRM services).

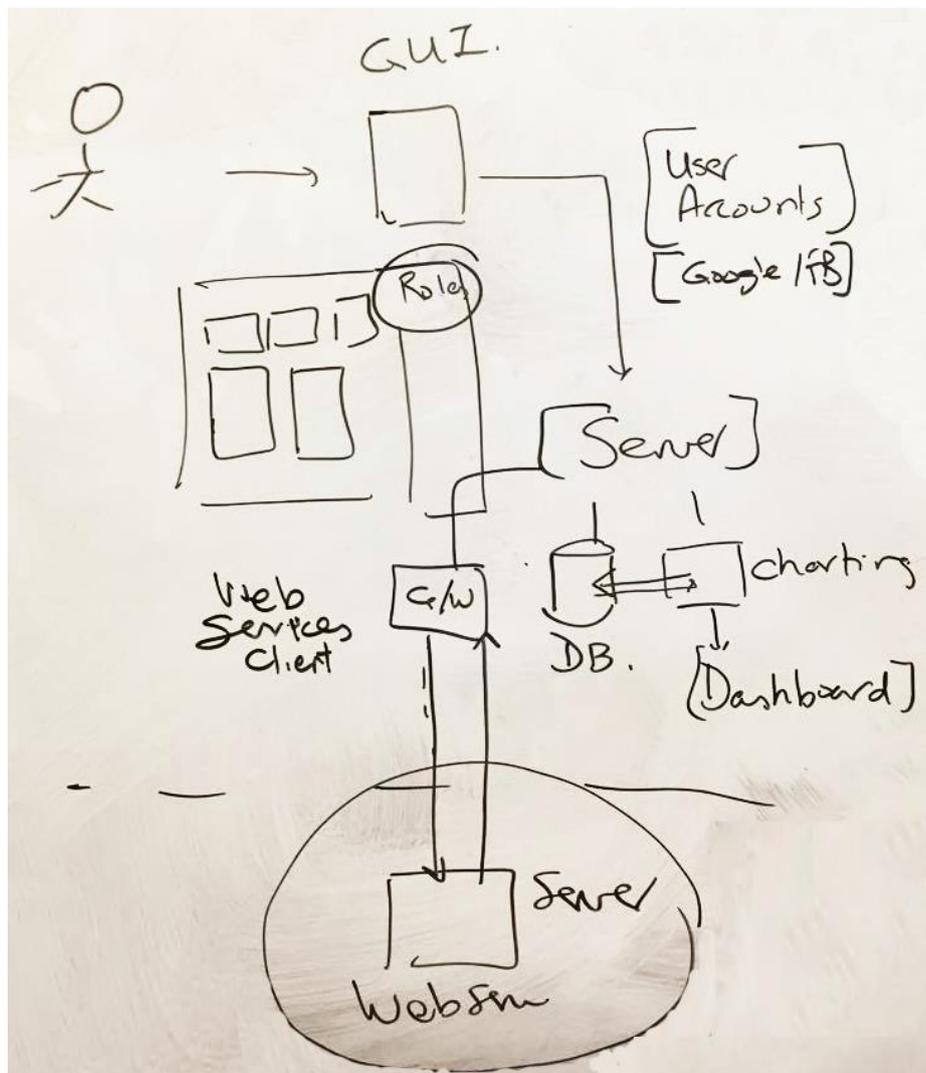


Figure 2 – General system architecture overview

Timeline plan:

Week 1 - starting the 23rd of January:

- Conduct a research / survey of similar websites and make a list which of their features could be adopted / implemented and which new features can be implemented that they lack;
- Analyse the Customer Relationship Management and Risk Assessment tools of similar websites;
- Establish the main features / modules that the platform will have;
- Make a list of technologies that can be used to implement these features.

Week 2 - starting the 30th of January:

- Build an initial set of requirements including their prioritisation (must have, should have, might have);
- Final decision on the technologies to be used both on the backend and on the Frontend;
- Sketching use cases and the UML diagram.

Week 3 - starting the 6th of February:

- **Milestone: Finishing the technical project plan** – Meeting with the supervisor for review
- Research on HCI (Human Computer Interaction) / UI (User Interface) / UX (User Experience) principles that could be applied to appeal the users visually, enhance the user experience, attract donors and eventually gain loyalty from them;
- Sketch the general Frontend Prototype;
- Implement and test the functionality of the frontend prototype using mock data.

Week 4 - starting the 13th of February:

- **Milestone: Finishing the general Frontend prototype**
- Implement a prototype for the backend related to the functionality of the main features agreed in Week 1 and requirements in Week 2.

Week 5 - starting the 20th of February:

- Implement a prototype for the backend related to the functionality of the main features agreed in Week 1 and requirements in Week 2.

Week 6 - starting the 27th of February:

- **Milestone: finishing the full prototype** - Meeting with the supervisor for review
- Review the backend and the features that could be tweaked;
- Test the functionality of the backend.

Week 7 - starting the 6th of March:

- Design surveys for User Experience;
- Promote the surveys, while collecting responses and generating statistics;

- Extensive testing of the Prototype and implementing enhancements (for performance and usability).

Week 8 - starting the 13th of March:

- **Milestone: First surveyed sent to the public** – Meeting with the supervisor for review;
- Promote the surveys, while collecting responses and generating statistics;
- Sketching the Dashboard Frontend;
- Design queries for gathering statistics from the database for the Dashboard.

Week 9 - starting the 20th of March:

- Acting upon the feedback received from the users, making changes accordingly;
- Implement the dashboard backend (REST APIs sending data in JSON format).

Week 10 - starting the 27th of March:

- Implement the dashboard Frontend (using a data visualisation library, such as D3).
- Link the backend with the Frontend for the Dashboard.

Week 11 - starting the 3rd of April:

- Testing the Dashboard;
- Conduct surveys on the Dashboard, collecting answers and generating statistics;
- **Milestone: All survey results collected and project nearly finished** – Meeting with the supervisor for review before the Easter break.

Weeks 12-14 - 10th of April – 30th of April (Easter break):

- Implement changes according to the feedback received on the Dashboard;
- Implement other global changes, optimisations, tweaks and small enhancements;
- Reviewing the project on overall and preparing for the demo;
- Working on the Final report.

Week 15 - starting the 1st of May:

- **Milestone: Project finished** – final meeting with the supervisor before the demo;
- Reviewing the Final report;
- Final testing for the demo.

References

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