## SOFTWARE DEVELOPMENT PROPOSAL

### INSPECT

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# **EXECUTIVE SUMMARY**

The business problem **Inspect** will solve is the duplication of paper work created by on-site inspections. Often traditional paper forms are taken on-site and filled out, then at a later date and time, digitized and photos added. This problem of filling out traditional forms only to digitize them affects employees filling out the form and those tasked with digitizing them. The impact of which is hours of labour digitizing paperwork, spent resources used in printing, and later the secure destruction of these documents. Our solution hopes to bridge the gap between initial on-site inspection and the digitization process that occurs later and in the process saving resources, time, and money.

#### 1. Project Overview

**Inspect** is for any business that performs inspections who currently uses a traditional low tech approach. **Inspect** will streamline the inspection process considerably. Unlike traditional low tech inspection processes that rely on paper as an intermediary format between the inspection and digitization process. **Inspect** would effectively cut out the middleman (paper) and digitize the paper work immediately with the added ability to take photos to be added and manipulated with ease to the inspection end result. This would allow for additional information to be easily seen; where defects or other points of interest are accentuated, especially in cases where they may be difficult to discern.

#### 2. Obstacles

None of our team members have experience building a native android app.

#### 3. Technical Obstacles

Almost all of the technical aspects of the project are well documented, however translating our templates into correctly formatted PDFs will likely prove challenging. Finding a PDF library that has the required features has been difficult as most have dual license agreements that require your project be free and open source to use or have a commercial license that is prohibitively expensive.

#### 4. Hardware

The hardware that the proposed software will be compatible with will be mobile phones and tablets running the Android operating system.

#### 5. Software

Software technologies that will be used during development:

- Android Studio
- PDFBox library
- Java
- Github