

Requirements Elicitation Mobile

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INTRODUCTION

Essential terms

Requirements elicitation - The process of discovering and collecting a project's requirements

Stakeholder - The people and organizations affected by a project.

Examples:

- Developers
- Shareholders
- Clients

We will focus on the clients

Practical Example



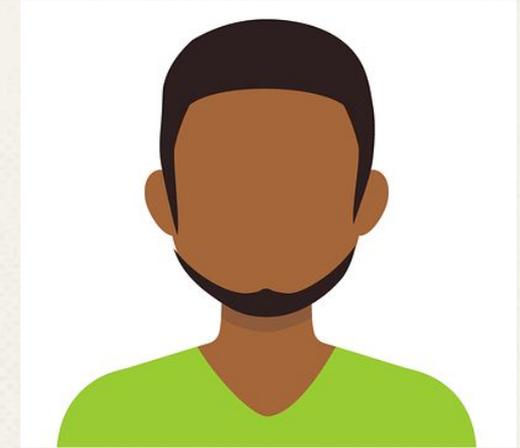
Andrew

- Stakeholder
- Defines and changes requirements



Bill

- Requirements Engineer
- Collects requirements and analyzes them



Carl

- Developer
- Writes code to suit the requirements

The Problem



Andrew is not sure about the requirements and keeps changing them



Carl has to adjust the code to adapt to the changes

Frequent changes increase confusion

The Challenge

- **Requirements can change frequently**
 - Poorly defined requirements
 - Technological evolution
 - Changing expectations
 - Requirements elicitation (RE) is moving towards a stakeholder-centric model - higher volatility
 - Mobile devices used more and more in RE
- **This can have massive implications on the development process**

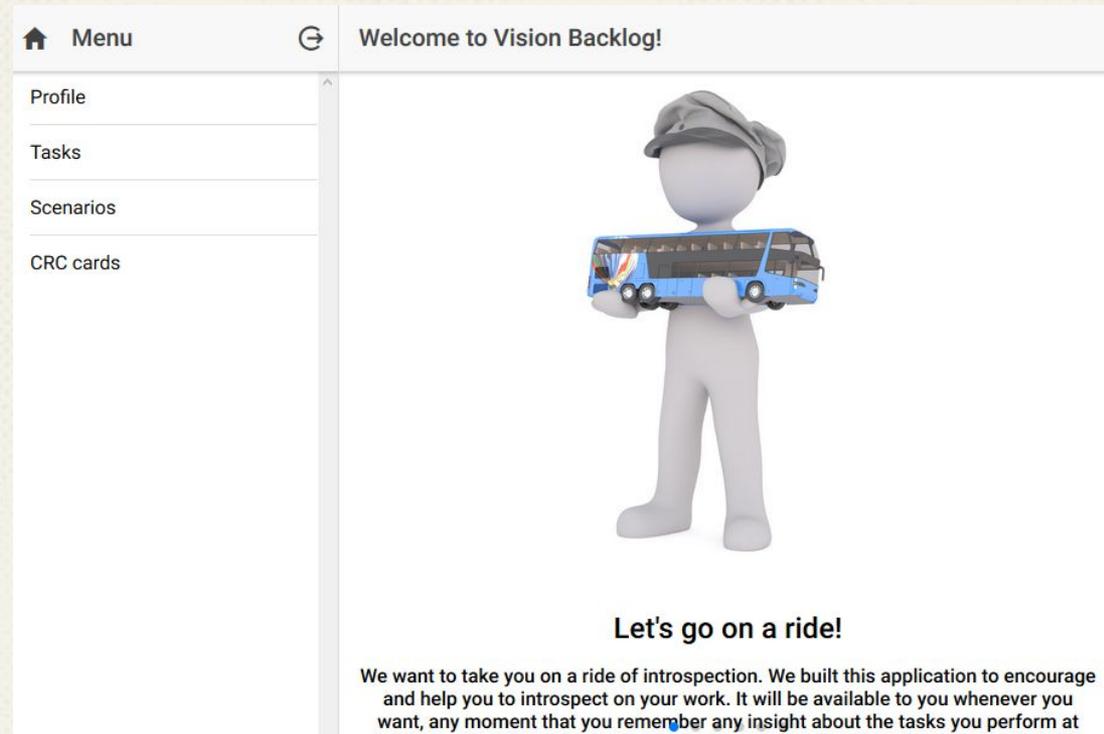
The Challenge



- Bill's role - act as a mediator between the two
- Detect the requirement changes as quickly as possible
- Convince the stakeholders what impact their actions have on the development process

Vision Backlog

- Requirements elicitation platform
- Supports mobile devices
- Define, edit and delete user stories
- Stakeholders have more initiative
- Dedicated analyst application



Vision Backlog

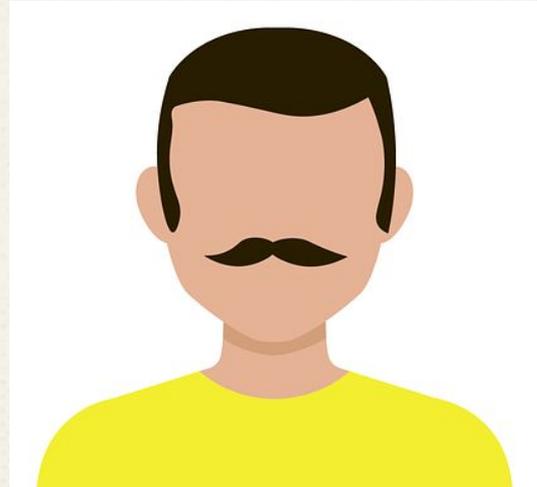
- A key functionality - identification of probable classes and methods for each requirement
 - Nouns -> classes
 - Verbs -> methods
- Changes to them are of significance to the development team
- Analysts need to keep track of these changes

Vision Backlog

- **New feature: requirement traceability**
 - Versioning of user stories
 - Overview of requirement changes
 - Visual evaluation of development process changes



An Example User Story



1. To have a live video tutorial on the website

2. To upload a video

3. To put a YouTube video on the website



LIVE DEMO

Ideas for Future Work

Social Networking

User feedback on requirements

Gamification

Score system

Threat Modeling

Identification and evaluation of assets and threats

Vulnerable assets are emphasized

Track asset changes continuously

Adjust and deploy countermeasures

Summary

Volatility

Changes likely to increase as stakeholders gain more control over requirement definition

Communication

Requirement analysts need to keep changes in check and talk to stakeholders

Visualization

Visual representation of requirement changes can be used to demonstrate impact on development process