



**E-Map:
Denver Water's Answer to GIS for
Everyone**



DENVER WATER

What is E-Map?

- **E - Electronic**
- **M - Map**
- **A - Access**
- **P- Portal**

- **Named by our user community**

Why did we build it?

- **Legacy application was aging**
- **Not platform consistent**
- **Newer technology gave us better options to customize and provide better security**

Approach

- **Gathered requirements**
- **Prioritized and Refined requirements**
- **Project Plan**
- **Picked technology platform**
- **Hired Contractor**

Production

- **2.5 years of development prior to first release**
- **First release replaced base functionality legacy application**
- **Legacy application phased out over 1.5 year**

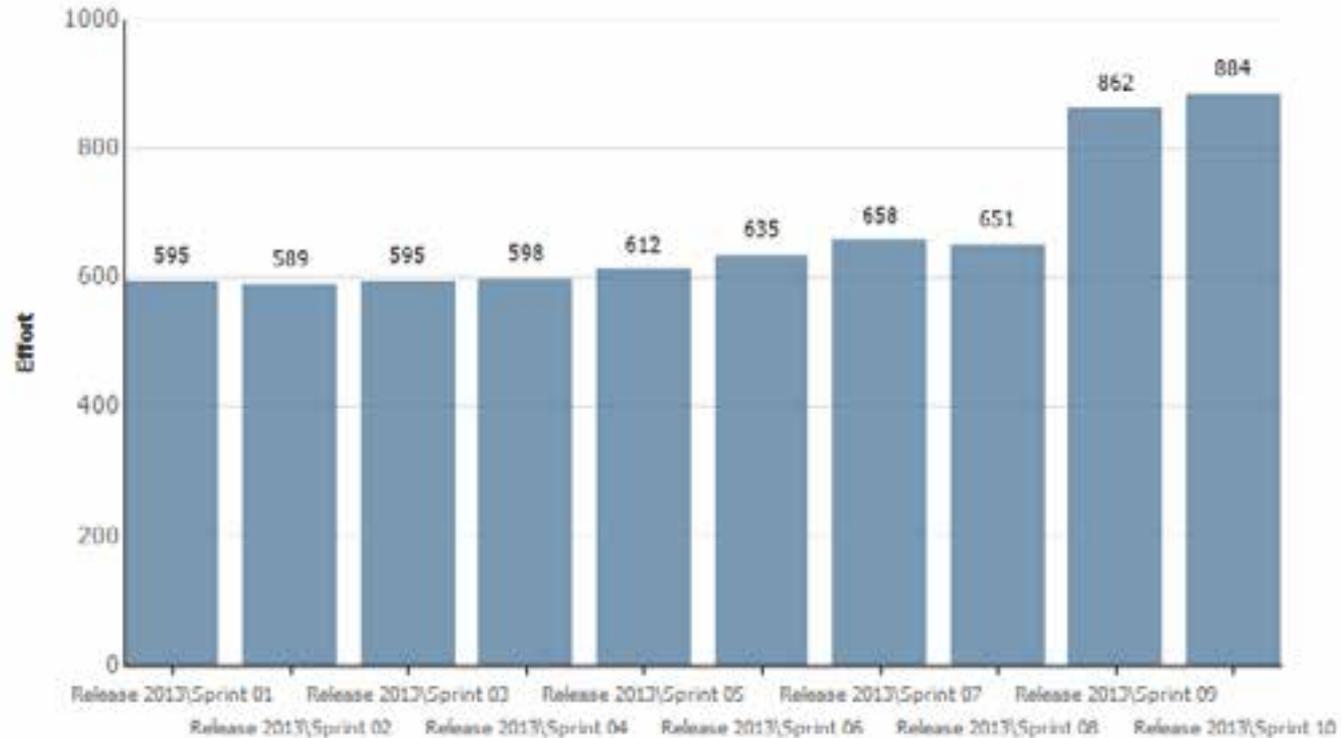
Value of a Beta Release

- **Allowed us really gain insight from users**
- **Users became more engaged**
- **Caused many more requirements to be identified**

Scope of the Project

- **The functionality that was identified as required continued to grow throughout project extending its life**
- **New requirements continue to be identified today**

How the amount of work has grown just in 2013



Best of E-Map

- **Friendly user interface**
- **Redlining**
- **Break Isolation**
- **Work order integration with Maximo**
- **Supports mobile and desktop version**
- **And a whole lot of data....**

Video demo



Methodology Changes

- **Started out with an informal iterative process**
- **Started adding some Agile Scrum principles**
- **Agile Scrum got fully implemented in September, 2011 (after first Production release)**

Agile Scrum Applied to E-Map

The Agile: Scrum Framework at a glance

Inputs from Executives,
Team, Stakeholders,
Customers, Users



Scrum = 3 Roles + 4 Artifacts + 5 Meetings

Tools utilized during Project

- Requirement Management

- Power Designer



- Excel



- TFS



What would we do differently?

- Better defined initial scope
- Be more open-minded
- Scrum application from beginning
- More emphasis on automated training
- Bigger and more dedicated team



What would we do again?

- **Business Stakeholder involvement**
- **Build for Denver Water's needs**
- **Silverlight – at the time, it was the right choice**

Where are we today?

- **Still being worked on....but we are more mature phase of development**
- **Continue to add integrations**
- **~150 users rely on E-Map daily and still growing**
- **Application is considered critical**
 - **Utilized 24/7**

Future

- Migration away from Silverlight
- More focus on mobile support





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The logo for Denver Water, featuring a stylized blue 'D' icon to the left of the text 'DENVER WATER' in a bold, green, sans-serif font. The text is positioned above a horizontal line of splashing blue water that spans the width of the page.