Session 786:
Public Works Simplified: GIS Applications for Public Works

Accessing engineering drawings in ArcGIS

Adrian Decsei
Infrastructure Analyst
City of Waterloo
Ontario
Canada
Project background

- 15 years dream
- The **chicken or the egg** causality dilemma
- Document management system promise
- Small silo of scanned documents (6672 drawings)
- Resources
Problem solved
Easy access to all engineering drawings in any given area of the city

- **Initial purpose:**
  - digitizing all assets in water, sanitary and storm SDE layers;
- **Secondary purpose:**
  - easy retrieval of drawings by internal staff.
Results

• Increased speed for data creation
• Increased confidence in accuracy of attributes
• Eliminating the space needed for the drawing cabinets
• Improved tracking of As-Constructed drawing release from consultants
• A Web based application for those that do not have access to ArcGIS
Efficiencies

- Space for about four office cubicles;
- Staff’s travel time and gas to retrieve a drawing;
- Paper and ink if they look at a digital drawing instead of printing;
- Cuts at least in half the time to draw new features and populate the attributes.
- Savings based on the lines above would be between $20,000 to $50,000
Success

Spread the word
Informative sessions delivered to various divisions
Maintenance process
How to videos

Python tool