

Silver ANGEL

ArcGIS Server Silverlight API

NEARC
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Adgenda

- About ANGEL
- Development approach
- A look at the application
- A look at the code
- Questions

Intro / Background

- Client, ITT Space Systems Division, needs web app to disseminate data, progress, maps
- FSI to build web application to facilitate
- Ended up choosing the ESRI Silverlight API for development

About ANGEL Services

- Airborne Natural Gas Emission Lidar (ANGEL)
- Use airborne lasers to detect leaks
- Low/High altitude detection
- Shoot custom aerial photography
- Specialize GIS and software applications for processing

ANGEL Functionality

- Show client data and related imagery
 - Pipelines
 - Indications
- Report on pipeline status
- Report and view indication information
- Printing maps & reports

Development Approach

- Project came to FSI about the time the new RIA APIs (JS, Flex, Silverlight) emerged
- We started in Web ADF
- Then we rebuilt with the JS API
- Finally we settled on Silverlight API
- We just wanted to try all 3!!!

Reasons for Silverlight

- Runs in a browser plug-in
 - Pros
 - Cons
- Able to produce new web 2.0 RIA look and feel (round, bouncy, animated, etc..)
- Wanted a high-end look; not the Web ADF look
- Performance – take advantage of client-side power/processing
- Why not Flex??

A look at the application...

Silverlight Development

- Two components: XAML (mark-up code for the UI) and .NET language or choice (VB, C#)
- XAML similar to HTML, except more dynamic and easier
- Event-driven – events handled in .NET Code
- Integrates nicely with other .NET components: WCF services for data, etc...

A look at the code...

Deployment Considerations

- Typical virtual directory approach
- Must add 2 new MIME types for recognition of the XAML/XAP files
- Beware of cross-domain issues: the dreaded crossdomain.xml file!

Issues with Silverlight??

- Preview window in VS2008 is buggy and slow if it works
- ESRI map control renders slow and sometimes stope; JS API does not; Flex??
- Can produce a 'heavy' client...

Questions???

THANK YOU FOR NOT SLEEPING!!!